Engineering Development Board

CGO-04/2022 DATED 16.11.2022 (LIST OF LOCALLY MANUFACTURED GOODS)

Federal Board of Revenue (FBR), vide Customs General Order (CGO)-04/2022 on November 16, 2022 has notified the List of Locally Manufactured Goods. This list is prepared and updated/revised by Engineering Development Board (EDB and is notified by FBR. Previously, this list was updated and notified in 2017 as CGO-02/2017 on 19.04.2017.

The List of Locally Manufactured Goods is a reference document to protect the local industry from concessionary imports and is used as a reference document by FBR field formations. Products covered in CGO list are treated as Engineering Goods and contains information related to product HS Code, Description, Specifications, Physical/Chemical properties and Company name. This is not an exhaustive list.

Initially this list was drawn up by FBR as an "Indicative List" based on information provided by the Ministry of Industries & Production (MoIP). EDB revised the list first time in 1998 and notified CGO-7 dated 24.03.1998 and subsequently was revised/ updated as CGO-12 in 2002, CGO-10 in 2003, CGO-11 in 2007 and CGO-02/2017.

The process of revision of the CGO list was started in 2018-19 by placing the list on EDB Website and approaching all stakeholders, associations, chambers and industries through letters, emails and newspaper for seeking comments. Accordingly, based on their comments, the list was amended / updated and placed on EDB web-site several times and finally, draft list was placed before EDB-BOM on 17.12.2021 and approved with the direction to revise/update the list biannually for new products inclusion and overall revision after every three years. Subsequently, this list was approved by the Ministry of Industries and Production in September, 2022, after consulting the FPCCI and Ministry of Commerce.

In this revision process, around 235 companies responded for inclusion of new items, deletion of old entries and/or amendments of existing entries. Companies requesting for inclusion of new products were also visited for facilities verification.

This list of goods contained in CGO-04/2022 is also placed at EDB-Web site and would now be updated bi-annually and its overall revision / updation will be made after every 3 years.

The stake-holders are advised to visit the list of products covered in CGO-04/2022 and give feedback for onward revision / updation of the list.

C.No.1/2/TARIFF-II/2006 GOVERNMENT OF PAKISTAN REVENUE DIVISION (FEDERAL BOARD OF REVENUE) ***

Islamabad, the 16th November, 2022.

CUSTOMS GENERAL ORDER NO. 04/2022

Subject:

LIST OF LOCALLY MANUFACTURED GOODS/ITEMS FOR THE PURPOSES OF CONCESSIONARY NOTIFICATIONS ETC

The goods detailed in the appended list of this CGO are manufactured locally. This list is compiled and updated by the Engineering Development Board in consultation with stakeholders. Henceforth, the appended list of locally manufactured goods is applicable for reference purposes to all the exemptions/concessionary notifications/regimes.

2. The Collectors of Customs and the staff responsible for allowing concessions under different notifications/orders are advised to follow this list for the purposes of allowing concessions from customs duties and sales tax etc. The information, if any, alongwith evidence regarding the local manufacture of goods, not indicated in the list, may be forwarded to the FBR forthwith so that the list of locally manufactured goods/items is up-dated in consultation with the Engineering Development Board.

3. The Collectors are, however, authorized to allow release of goods/items indicated in the list of locally manufactured goods/items against bank guarantee for a period of three months if the importer produces a certificate issued by the renowned local manufacturers of the disputed items from Engineering Development Board stating that the imported item is not being manufactured locally and the importer shall produce a clarification from FBR to this effect within the above stated period of three months.

4. This Customs General Order supersedes CGO 2/2017, dated 19th April, 2017 and all other instructions on the subject.

IT HUSSAIN) SECRETARY (TARIFF-II)

All Collectors of Customs

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
1 2	15200000 17023000	Glycerol (glycerin), crude Liquid Glucose (less than 1% Fructose)	Glycerol % 99 Min. Boiling point 250 Min, Iron content (ppm) C ₆ H ₁₂ O ₆	Appearance Clear white liquid, Sugar Clear Viscouse Syrup, sweet in taste	Acidity as Na ₂ O 0.00052%, Fatty Acids Baume at (100°F)-43, Dextrose equivalent-38-46, Total Solids-79-80.5, Brix-81.5-83.0, Moisture Contant-21- 19.5%, PH-4.5-5.5, So2-03ppm Max, Solubility - Soluble in water	Mijokum (Pvt) Ltd., F-48 & F-52, Sector 50-C, Habib Rice Products Ltd., 2nd Floor, UBL Building, I.I. Chundrigar Road, Karachi
3	17025000	High Fructose	C ₆ H ₁₂ O ₆ , Fructose 42%, Glucose 54%, Maltose 4%	Light Yellow Viscous Syrup having sweet taste	Brix - 69.5, PH - 3.5-4.5, Ash - 0.1%	Habib Rice Products Ltd., 2nd Floor, UBL Building, I.I. Chundrigar Road, Karachi
4	17029030	Malto dextrin	$C_6H_{12}O_6$ (10DE to 19DE)	A free flowing white powder odourless having Blend taste	Dextrose equivalent-12-19 DE, PH-5.0- 6.0 3 - Ash - 0.2%	Habib Rice Products Ltd., 2nd Floor, UBL Building, I.I. Chundrigar Road, Karachi
5	25010010	Sodium Chloride (Table Salt)	Pyrogen free grade	Salt and Pure Sodium Chloride	NaCl	Hub-Pak Salt Refinery, C-206 Hub Industrial Trading Estate Hub, Balochistan
6	25010090	Sodium Chloride	Pyrogen free grade	Salt including table salt and Pure Sodium Chloride	NaCl	Hub-Pak Salt Refinery, C-206 Hub Industrial Trading Estate Hub, Balochistan
7	25081000	Bentonite	Viscosity (Fann viscometer 600 RPM): 15 cps. min. Filtrate Loss (at 100 psi, 30 min.): 15 cc max. pH: 9-10 F36 (Excluding untreated Bentonite meeting API specifications)	Dry Particle Size: 80% < 200 mesh Wet Particle Size: 80-90% < 0.5 micron Residue 75 microns: 4% max. Moisture: 10% max.	SiO ₂ : 50-60 %, Al ₂ O ₃ : 15-20 %, Fe2O ₃ : 2-4 % MgO: 4-6 % CaO: 3-6 %, K ₂ O: 0.2-0.5 % TiO ₂ : 0.2 - 0.5 % Others: 0.5 - 1 % Moisture: 5-10 % Loss on Ignition: 10-15%	Ahmad Saeed and Company, 2nd Floor, Sindhu Trade Centre, 473, G-III, Johar Town, Lahore
8	25201010	Gypsum Powder	100 mesh Gypsum Board Grade	Fine Powder	CaSO ₄ 1/2 H ₂ O	DFB Gypsum Industries, Suit No. 105, 1st Floor, Business & Finance Center, II Chundrigar Road, Karachi
9	25202000	Plaster of Paris	100 mesh Gypsum Board Grade	Fine P+K14:K22owder Dehydrated by Calcination	CaSO ₄ 1/2 H ₂ O	DFB Gypsum Industries, Suit No. 105, 1st Floor, Business & Finance Center, II Chundrigar Road, Karachi
10	25232100	White Portland Cement	PS (1630:1984): Blane: 4887- Min 2250, CM2/gm Soundness: a) Le-Chatelier Method: 0.5 mm Max 10 mm Setting Time: Initial: 120- Min 45 minutes Final: 150 - Max 600 minutes	3 Days: 36.5 Min 12 Mpa 7 Days: 55.5 Min 19 Mpa 28 Days: 77.5 Mpa	Lime Saturation Factor: 0.94 - Min 0.66, Max 1.02 Insoluble Residual: 0.22% - Max 1.50% Iron Oxide: 0.22% - Max 1.0% Megnesia: 1.27% - Max 4% Sulphuric Anhydride: 2.77% - Max 3%	Maple Leaf Cement Factory Ltd., 42-Lawrence Road, Lahore
11	25232900	i) Ordinary Portland Cement	(PS 232-2008) R: Blane: 332-Min 225 M2/Kg Soundness: a) Le-Chatelier Method: 0.5 mm Max 10 mm b) Autoclave Method: 0.02 Max 0.80% Setting Time: Initial: 150 - Min 30 Minutes Final: 180-Max 600 Minutes	3 Days: 37.4-Min 33 Mpa PSI 7 Days: 45-Min 37 Mpa PSI 28 Days: 57.7-Min 53 Mpa PSI	Lime Saturation Factor: 0.94-Min 0.80, Max 1.02 Alumina Iron Ratio: 1.73- Min 0.66 Insoluble Residual: 0.47% - Max 1.50% Megnesia: 2.21% - Max 6% Sulphuric Anhydride: 2.76% - Max 3% Loss on Ignition: 2.71 - Max 3%	Maple Leaf Cement Factory Ltd., 42-Lawrence Road, Lahore
		ii) Sulphate Resisting Portland Cement	(PS 612:1989) Blane: 2882-Min 2500 CM2/g a) Le-Chatelier Method: 0.5 mm Max 10 mm Setting Time: Initial: 215- Min 45 Minutes Final: 270-Max 600 Minutes	3 Days: 4322- Min 2176 Mpa 7 Days: 5497 - Min 3409 Mpa 28 Days: 7252- Min 4932 Mpa	Lime Saturation Factor: 0.91-Min 0.66, Max 1.02 Alumina Iron Ratio: 0.80 Insoluble Residual: 0.38% - Max 2.0% Megnesia: 1.99% - Max 4% Sulphuric Anhydride: 2.11% - Max 2.50% Loss on Ignition: 1.12- Max 3% Tri- Calcium Aluminates: 2.11 - Max 3.50%	

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		iii) Low Alkali Cement	PS (232:1983): Blane: 2985- Min 2250 CM2/g Soundness:a) Le-Chatelier Method: 0.5 mm Max 10 mm b) Autoclave Method: 0.002 % Setting Time: Initial: 210 - Min 45 minutes Final: 260- Max 600 minutes	3 Days: 4409- Min 2200 Mpa 7 Days: 5555- Min 3400 Mpa 28 Days: 7310- Min 5000 Mpa	Lime Saturation Factor: 0.91- Min 0.66, Max 1.02 Alumnia Iron Ratio: 0.80 Insoluble Residual: 0.41% - Max 1.50% Megnesia: 1.97% - Max 4% Sulphuric Anhydride: 2.10% - Max 3% Loss on Ignition: 1.12- Max 3%	
12	27021000	Blanket repairing solution	Temporary repair for spots and indentations on lithographic offset printing blankets.	Clear liquid at room temperature. Density @ 15 °C 1.05 – 1.32 g/cm3	Synergistic mixture of hydrocarbons and emulsifiers. Swell the offset printing blanket rubber in a short period of time to enable it for reprinting.	Mijokum (Pvt) Ltd., F-48 & F-52, Sector 50-C, Korangi, Karachi.
13	27081000	i) Coatar Enamelii) Primer Synthetic Type II	BS-4164	Black Soild Smooth finsh	Hotmelt Application Coheasion Resistance	Berger Paints Pakistan Limited, 28- Km Multan Road, Lahore.
14	27101240	Narrow Boiling Range Hydrocarbon Solvent	Hydrocarbon Fluids with Aromatic content. Used as solvents or diluents in paints & coatings, waxes, varnishes/ polishes, adhesives, inks and cleaners & degreasers.	Clear colorless liquid at room temperature. Density @ 15 °C 0.77-0.80 g/cm3 Flash Point ≥ 40°C	Chemically stable and non-corrosive hydrocarbon solvent. Possess a mild odor. Fast evaporation rate.	Mijokum (Pvt) Ltd., F-48 & F-52, Sector 50-C, Korangi, Karachi.
15	27101919	Narrow Boiling Range Hydrocarbon Solvent	Hydrocarbon Fluids with Aromatic content. Used for machine and parts cleaning and diluents in waxes, cleaners & degreasers.	Clear colorless to yellow liquid at room temperature. Density @ 15 °C 0.78-0.810 g/cm3 Flash Point ≥ 60 °C	Chemically stable and non-corrosive hydrocarbon solvent. Possess a mild odor. Extended evaporation rate.	Mijokum (Pvt) Ltd., F-48 & F-52, Sector 50-C, Korangi, Karachi.
16	27101991	Mineral oil (Coning oil) (Spin Finish oil)	Density@ 20C = 0.85 - 0.88g/cm3 Flash Point = 200F and above Pour Point = -21 Water Content = 0.5% Max Viscosity at 40C = 8.5 - 10.5 CST	Colorless to slightly yellowish oily Liquid	A mineral oil is light mixtures of alkanes in the C15 to C40	Reliance Petrochem Industries (Pvt) Ltd. 1301, 13th Floor, Chappal Plaza Hasrat Mohani Road, Karachi
17	27101996	White oil	Density@20C = $0.82 \cdot 0.85g/cm3$ Flash Point = $320F$ Pour Point = -18 Color = $+30$ Doctor Test=Negative Odour = Odorless Viscosity@40C = $15 - 22$ CST (can be adjusted according to demand) Ultraviolet Absorbance, CFR 178.3620 (b) 280 to 289 nm 4.5 290 to 299 nm 3.5 300 to 329 nm 2.5 330 to 350 nm 1.1	clear oily liquid.	mixtures of paraffinic and naphthenic hydrocarbons components; consists of alkanes (isoparaffins), saturated cyclic alkanes (naphthenic), alkylated aromatics processed of sulphuric acid treatment, dewaxing and hydro treating, pure, stable, colorless, odorless, non- toxic and chemically inert. for application as industrial lubricant & process oils, cosmetics and chemical processing. 21 CFR 172.878, 21 CFR 178.3620, 21 CFR 573.680,	Reliance Petrochem Industries (Pvt) Ltd. 1301, 13th Floor, Chappal Plaza Hasrat Mohani Road, Karachi
18	28011000	Chlorine	99.9% pure chlorine	Yellow liquid with very irritating odor		 Sitara Chemical Industries Ltd., 32-KM Sheikupura Road, Faisalabad Engro Polymer & Chemicals Limited, 16th Floor, The Harbor Front Building, HC # 3, Marine Drive, Block-4, Clifton, Karachi
19	28030010	Carbon Black (Rubber Grade)	N-220, N-330, N-339, N-375, N-326, N-550, N-660 and N-77	N-220, N-330, N-339, N-375, N-550, N- 660, N-7	C % 97-98	National Petrocarbon (Pvt) Ltd., 301-304 3rd Floor Beamount Plaza behind PIDC House Karachi
20	28042100	Liquid Argon	<5 ppm Oxygen	A colourless, odorless, tasteless, noncorrosive, nonflammable and extremely cold noble gas.	Chemical formula: Ar, Mol. Weight: 39.95g/mol, Specific gravity: 1.4, B.P: - 185.8 C and Freezing point: -189.3 C	Ghani Chamical Industries Limited, 10-N, Model Town, Extension, Lahore.
21	28042900	i) Compressed Oxygen in cylinders	99.70%	Colourless, odorless and tasteless gas. 21% in air by volume.	Symbol: O2, Atomic Number: 8, Atomic mass: 15.9994	Ghani Chamical Industries Limited, 10-N, Model Town, Extension, Lahore.

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		ii) Compressed Nitrogen in cylinders	<10 ppm Oxygen	Colourless, odorless inert gas. 78% of air by volume.	Chemical formula: N2, atomic Number: 7, atomic weight: 14.0067, specific gravity: 0.97, density: 1.2506 Kg/m3	
		iii) Compressed Argon in cylinders	<5 ppm Oxygen	A colourless, odorless, tasteless noble gas. Boiling point: -185.8 C and Freezing point: -189.3 C.	Chemical formula: Ar, Mol. Weight: 39.95g/mol, Specific gravity: 1.4, density: 1.7837 Kg/m3	
22	28043000	Liquid Nitrogen	<10 ppm Oxygen	A colourless, odorless clear liquid, evaporates rapidly producing cold gaseous Nitrogen. It is denser than air.	Chemical formula: N2, Mol. Weight: 28.01 g/mol, Specific gravity: 0.808, Specific heat: 2.042 Kj/Kg and Boiling point: -195.8 C	Ghani Chamical Industries Limited, 10-N, Model Town, Extension, Lahore.
23	28044000	Liquid Oxygen	99.70%	An odorless, pale blue colour and is strongly paramagnetic. Boiling Boint: - 182.6 C and Freezing point: -218.8 C	Symbol: O2, density: 1141 g/l (slightly denser than water).	Ghani Chamical Industries Limited, 10-N, Model Town, Extension, Lahore.
24	28061000	Acid, Hydrochloric	35% (+/-1)	Colorless to yellow liquid	HCI	 Sitara Chemical Industries Ltd. 32-KM Sheikupura Road, Faisalabad Engro Polymer & Chemicals Limited, 16th Floor, The Harbor Front Building, HC # 3, Marine Drive, Block-4, Clifton, Karachi Nimir Industrial Chemicals Ltd., 14.8 KM, Sheikhupura Faisalabad Road, Lahore.
25	28070000	Acid, Sulphuric	96% and above	Specific gravity 1.84 Sour Taste Colorless Odorless Iron contents < 100 ppm Hardness < 60 ppm	Formula H ₂ SO ₄ , strong exothermic reaction when diluted, excelent dehydrating agent, reacts with metals to form metalic sulphates, (Copper sulphate, Zinc sulphate, Nickel Sulphate), strong oxidizing agent. Reacts with non metal substances to make nonmetalic sulphides. Reacts with carbon to make CO ₂ and SO ₂ . Reacts with NaCl to mak NaHSO ₄ and HCl.	 Tufail Chemical Industries Ltd., Progressive Centre, Mezz Floor, 30-A/6, PECHS, Shahrah-e- Faisal, Karachi Faras Combine Marketing Co (Pvt) Ltd.,77 D New Muslim Town Main Wahdat Road Lahore Prime Chemical (Pvt) Ltd., 18-A, Civic Centre, Faisla Town (Women Welfare Complex), Lahore Exide Pakistan Ltd., A/45, Hill Street, P.O. Box No. 3680 SITE Karachi-75400 Engro Polymer & Chemicals Limited, 16th Floor, The Harbor Front Building, HC # 3, Marine Drive, Block-4, Clifton, Karachi
26	28112100	Carbon Di Oxide	99.99% Purity	Liquified Colorless, Odorless gas	CO ₂	Sitara Chemical Industries Ltd., 32-KM Sheikupura Road, Faisalabad
27	28151100	Caustic Soda, solid	97%	Flakes and Solid	NaOH	Sitara Chemical Industries Ltd., 32-KM Sheikupura Road, Faisalabad
28	28151200	Caustic Soda, liquid	50%	Colorless solution, liquid	NaOH	 Sitara Chemical Industries Ltd., 32-KM Sheikupura Road, Faisalabad Engro Polymer & Chemicals Limited, 16th Floor, The Harbor Front Building, HC # 3, Marine Drive, Block-4, Clifton, Karachi Nimir Industrial Chemicals Ltd., 14.8 KM, Sheikhupura Faisalabad Road, Lahore.
29	28259000	Calcium Hydroxide, excluding natural	96% (by weight)	White fine powder	Ca (OH) ₂	Sitara Chemical Industries Ltd., 32-KM Sheikupura Road, Faisalabad
30	28271000	Ammonium Chloride	99.70%	White crystals	NH ₄ Cl	Sitara Chemical Industries Ltd., 32-KM Sheikupura Road, Faisalabad
31	28272000	Calcium Chloride	77% min. & 94% minimum	Granular Powder Form and Prills	CaCl ₂	Sitara Chemical Industries Ltd., 32-KM Sheikupura Road, Faisalabad
32	28273100	Magnesium Chloride	Min 46% & Max. 98%	Off White Granular Solid	MgCl ₂ .6H ₂ O	Sitara Chemical Industries Ltd., 32-KM Sheikupura Road, Faisalabad
33	28273500	Nickel Chloride	24% as Nickel	Yellowish green crystalline powder	NiCl ₂	Sitara Chemical Industries Ltd., 32-KM Sheikupura Road, Faisalabad
34	28273900	Iron / Ferric Chloride	40% (+/-2) solution	Dark red / brown liquid	Fe Cl ₃	Sitara Chemical Industries Ltd., 32-KM Sheikupura Road, Faisalabad

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
35	28281010	Calcium Hypochlorite	30% and 35% (+/-1)	White, Crystalline solid	Ca (OCl) ₂	Sitara Chemical Industries Ltd., 32-KM Sheikupura Road, Faisalabad
36	28289000	Sodium Hypochlorite	19 - 20%	Pale Greenish / yellow, Commercial grade	NaOCI	 Sitara Chemical Industries Ltd., 32-KM Sheikupura Road, Faisalabad Engro Polymer & Chemicals Limited, 16th Floor, The Harbor Front Building, HC # 3, Marine Drive, Block-4, Clifton, Karachi Nimir Industrial Chemicals Ltd., 14.8 KM, Sheikhupura Faisalabad Road, Lahore.
37	28331900	Sodium Sulphates, other	98% and above	Industrial grade for Glass, Detergent Tile	Na ₂ SO ₄ (98%)	Tufail Chemical Industries Ltd., Progressive Centre, Mezz Floor, 30-A/6, PECHS, Shahrah-e- Faisal, Karachi
38	28332100	Magnesium Sulphate	48% Min	Colorless prismatic crystals	MgSO ₄ .7H ₂ O	Sitara Chemical Industries Ltd., 32-KM Sheikupura Road, Faisalabad
39	28332200	Sulphates; aluminum	Of Aluminium 14-15%	In Lumps Form.	14-15%	 Tufail Chemical Industries Ltd., Progressive Centre, Mezz Floor, 30-A/6, PECHS, Shahrah-e- Faisal, Karachi Faras Combine Marketing Co (Pvt) Ltd., 77 D New Muslim Town Main Wahdat Road Lahore Prime Chemical (Pvt) Ltd., 18-A, Civic Centre, Faisla Town (Women Welfare Complex), Lahore Exide Pakistan Ltd., A/45, Hill Street, P.O. Box No. 3680 SITE Karachi-75400 Sitara Chemical Industries Ltd., 32-KM Sheikupura Road, Faisalabad
40	28332400	Nickel Sulphate	Nickel 22 <u>+</u> 1%	Greenish Crystals	NiSO ₄ .6H ₂ O	Sitara Chemical Industries Ltd., 32-KM Sheikupura Road, Faisalabad
41	28333000	Alum (Double Salt)	Contain 98% as AL 2 (SO4) (3) (NH4)2 SO4. 24H2	Purifies Water	Soluble in water. In alum crystals, 6 waster molecules are held by monovalent ion. 6 water molecules are held by trivalent ion. 12 water molecules are held in the crystal structure. Aqueous solution of alum are acidic due to carionic hydrolysis of trivalent cation. On heating an alum at high temperature the alum swells up in to a porous mass which is called burn alum. Alum acts as coagulants as they are effective in precipitating colloids. Alum have germicide properties. Alum is stable in air.	Exide Pakistan Ltd., A/45, Hill Street, P.O. Box No. 3680 SITE Karachi-75400
42	28362000	i) Sodium Carbonate (di-sodium)	Total Alkalinity as (Na ₂ CO ₃)= >=98% Chloride as NaCl= <=0.85% Iron as Fe ₂ O ₃ = <=0.007% Matter Insoluble In Water = <=0.15% Sulphates a Na ₂ SO ₄ = <=0.08%	White Crystalline powder packed in 50Kg or 1000Kg polypropylene bags Pouring Density = 450 to 600 gms / Liter for Light Ash grade and Pouring Density = 950 to 1200 gms / liter for Dense Ash grade	Purity or Total Alkalinity as Na₂CO₃ >=98%	ICI Pakistan Limited, Soda Ash Business, ICI Pakistan Limited, 63, Mozang Road, Lahore 54000

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		ii) Sodium Carbonate (Light)	Name: Soda Ash – Light Grade Specifications: As per Pakistan Standard (PSS 10-1979)	CAS No:497-19-8, EC No: 207-838-8 <u>DETAILS:</u> Chemical Formula: Na2CO3 Appearance: A white granular hygroscopic powder. Bulk Density (g/L): 450 – 600 Boiling Point (°C): Decomposes Melting Point (°C): 854 Flash Point (°C): None pH of a freshly prepared 1% Solution: 11.3	Chemical Properties Soda Ash (Light) <u>DETAILS:</u> Chemical Formula: Na2CO3 Purity as Na2CO3 (%): 98.0 minimum Chloride as NaCl (%): 0.85 maximum Iron as Fe2O3 (%): 0.007 maximum Sulphate as Na2SO4 (%): 0.08 maximum	Olympia Chemicals Ltd., 25-A, Davis Road, Lahore
		iii) Sodium Carbonate (Dense)	Name: Soda Ash – Dense Grade Specifications: As per Pakistan Standard (PSS 10-1979)	CAS No:497-19-8, EC No:207-838-8 <u>DETAILS:</u> Formula: Na2CO3 Appearance: A white granular hygroscopic powder. Bulk Density (g/L): 950 – 1200 Boiling Point (°C): Decomposes Melting Point (°C): 854 Flash Point (°C): None pH of a freshly prepared 1% Solution: 11.3	Chemical Properties Soda Ash (Light) <u>DETAILS:</u> Formula: Na2CO3 Purity as Na2CO3 (%): 98.0 minimum Chloride as NaCl (%): 0.85 maximum Iron as Fe2O3 (%): 0.007 maximum Sulphate as Na2SO4 (%): 0.08 maximum	
43	28363000	Sodium bicarbonate	Purity as NaHCO ₃ = >=99% Insoluble substance = 1gm in 20ml water gives clear solution pH of 1% solution at 25° C = 8.5	CAS No:144-55-8, EC No: 205-633-8 Description: Refined Sodium Bicarbonate (free flowing white powder) DETAILS: Formula: NaHCO3 Appearance: A white fine crystalline hygroscopic powder. pH of a freshly prepared 5% Solution: 8.6 maximum White granular powder packed in 25Kg Laminated Polypropylene Bags	DETAILS: Assay (%): 99.0 – 100.5 CO3 (%): 0.23% maximum Ammonium NH4: 20.0 mg/kg maximum Arsenic As: 2 mg/kg maximum Calcium Ca: 100 mg/kg maximum Chloride Cl: 150 mg/kg maximum Heavy Metals (as Lead Pb): 5 mg/kg maximum Iron Fe: 20 mg/kg maximum Sulphate SO4: 150 mg/kg maximum	 ICI Pakistan Limited, Soda Ash Business, ICI Pakistan Limited, 63, Mozang Road, Lahore 54000 Olympia Chemicals Ltd., 25-A, Davis Road, Lahore
44	28365000	Calcium Carbonate/ Precipated Calcium Carbonate (natural, un coated)	(2.5 - 100) microns Top Cut 3 μm-50 μm Natural Calcium Carbonate, grinded & converted into fine powder state	White Powder / Solid Powder form Reactive under acidic condition	CaCO ₃	 Shaheen Grinding Mills, 9-KM, Raiwind Road, Lahore Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore Omya Pack (Pvt) Ltd., Kot Radha Kishan Road, Kasur
45	28470000	Hydrogen Per Oxide	35%, 50%, 60% w/w Concentration and all other Concentrations	Clear Color Less, odour less liquid. Density 1.13-1.24kg/m3 Mol weight34.01 Kmol/Kg	Viscosity @25oC1-1.11cp, Boiling Point @101.3KPA is 108-120 oC, Melting Point -33 to-62 oC, Heat of Decomposition is 233.1 to 334.7 Kcal/Kg	 Descon Oxychem Limited., 18-Km, Ferozpure Road, Lahore Sitara Peroxide Limited., 26-Km, Sheikhupura Road, Faisalabad.
46	28491000	Calcium Carbide				Sino Pak Electrochemical Industries Ltd., Plot No. DSU-20, Zulfiqarabad, Bin Qasim, Karachi (Pipri)
47	29012990	Dissolved Acetylene in cylinders	99.70%		-	Ghani Chamical Industries Limited, 10-N, Model Town, Extension, Lahore.
48	29049900	i) Reserver Salt ii) Oxydizing Agent (Textile grade)	Drying Agent	White Powder Yellow Powder	Drying Agent	 S & F Enterprises, Plot No. F-22, Qabail Colony, Block 11, Gulberg Town, F.B. Area, Karachi Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
49	29054400	Sorbitol Powder	$C_6H_{14}O_6$	White crystalline powder	1 - PH - 50 - 70 - 4	Habib Rice Products Ltd., 2nd Floor, UBL Building, I.I. Chundrigar Road, Karachi
50	29054500	Glycerol (Glycerine), refined	Concentration: 98.5 % min, Specific Gravity: 1.258-1.266 @20°C	Clear water white Liquid	C ₃ H ₈ O ₃	Nimir Industrial Chemicals Ltd., 14.8 KM, Sheikhupura Faisalabad Road, Lahore.
51	29151100	Acid, formic	85% and above	Transparent Liquid Form	HCOOH 85%	 Tufail Chemical Industries Ltd., Progressive Centre, Mezz Floor, 30-A/6, PECHS, Shahrah-e- Faisal, Karachi Faras Combine Marketing Co (Pvt) Ltd., 77 D New Muslim Town Main Wahdat Road Lahore
52	29153100	Ethyl Acetate	99.50%	Coloursless	Acetic acid and Ethanol	PureChem (Pvt) Ltd., 550-551E, Sundar Industrail State, Lahore
53	29153300	N-Butyl Acetate / Sabutol Acetate	99.50%	Coloursless	N-Butanol or subotol and Acetate Acid	PureChem (Pvt) Ltd., 550-551E, Sundar Industrail State, Lahore
54	29153930	Sec-Butyl Acetate	99.50%	Coloursless	Sec- Butanol and Acetic Acid	PureChem (Pvt) Ltd., 550-551E, Sundar Industrail State, Lahore
55	29153940	Mehtyl Acetate	99.50%	Coloursless	Acetic acid and Methanol	PureChem (Pvt) Ltd., 550-551E, Sundar Industrail State, Lahore
56	29153990	N-Propyl Acetate / Iso-Butyl Acetate	99.50%	Coloursless	N-Propanol / Iso- Butanol and Acetic Acid	PureChem (Pvt) Ltd., 550-551E, Sundar Industrail State, Lahore
57	29157010	Acid, stearic, chemically pure	IV 1.0 ~ 3.0, Acid Value 198 ~ 206, Sponification Value 199 ~ 206, Specific Gravity 0.86, Molecular wt 284.47	Color White, Appearance Small Flakes, Melting point61 ~ 65	C ₁₇ H ₃₅ COOH	 Nimir Industrial Chemicals Ltd., 14.8 KM, Sheikhupura Faisalabad Road, Lahore. Gamalux Oleochemicals (Pvt.) Ltd. A-8, NWIZ, Port Qasim Industrial Area, Bin Qasim, Karachi
58	29163910	Ibuprofen	 Current pharamacopoial BP/EP, USP Specifications White or almost white crystalline powder or colorless crystals. 	Solid (Powder) (1)Melting Point: 75.0°C — 78.0°C (2) LOD NMT 0.5% (3) Density 1.03 gm/cc	 Propionic Acid Derivative nonsteroidal anti-inflammatory drug used for relief of symptoms of arthritis, fever, as an analgesic for pain, 	 Pharmagen Ltd., 34-Km Ferozepur Road, Lahore Zenith Chemical Industries (Pvt) Ltd., Village Dhonday Pajian Road, Raiwind Lahore
59	29171400	Maleic anhydride	Solidification point: 52.4c Maleic Acid (%): <0.1 Purity By G.C (%Wt): Min. 99.0 Colour (APHA): Max. 15 - 20 Citraconic Acid %: <0.1 Benzoic Acid %: <0.1 Ortho Toulaldhyde %:<0.1	A colorless crystalline needles, flakes, pellets, rods, briquettes, lumps or a fused mass with pungent odour. Chemical Name: 2 – 5 Furandione Molecular Korght: C4H2O3 Molecular Weight: 98.06 Melting Point: 52.4 °C Boiling Point: 202 °C Thermal Decomposition Temp: > = 200 °C Solubility in water: Soluble in water.	 Moderately toxic white solid chemical. Reacts vigorously on contact with oxidizing materials and exothermically with water or steam. Undergoes violent exothermic decomposition reactions, producing carbon dioxide, in the presence of strong bases (sodium hydroxide, potassium hydroxide, calcium hydroxide), alkali metals (lithium, sodium, potassium), aliphatic amines (dimethylamine, trimethylamine), aromatic amines (pyridine, quinoline) at temperatures above 150° C. The presence of a residue of weak sodium hydroxide solution in a pressure vessel caused maleic anhydride to decompose in a runaway explosive reaction. 	Nimir Chemicals Pakistan Ltd., 14.8 Km, Sheikhupura-Faisalabad Road, Mouza Ghikki Distt. Sheikhupura

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S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company	Annex-
60	29173200	Dioctyl Orthophthalates (DOP)	Acid value 0.02%, MC 0.05% Colour 15 APHA		It emits acid smoke and irritating fumes on heating. It reacts with acids to liberate heat along with alcohols and acids. Strong oxidizing acids may cause a vigorous reaction that is sufficiently exothermic to ignite the reaction products. Heat is also generated by the interaction with caustic solutions. Flammable hydrogen may be generated by mixing with alkali metals and hydrides. It can generate electrostatic charges by swirling or pouring. It is incompatible with Strong oxidizing agents. DOP is an indirect food additive for use only as a component of adhesives.	 Nimir Chemicals Pakistan Ltd., 14.8 Km, Sheikhupura-Faisalabad Road, Mouza Ghikki Distt. Sheikhupura AHN Colloids Chemicals (Pvt) Ltd., 10- Abbott Road, Lahore A.T.S Synthetic (Pvt) Ltd., 4-Km, Kacha Road, Kahna Nau, Lahore. 	
61	29173410	Di-Butyl Phthalate	99.5% Purity	Appearance: clear, color APHA: 30-40, MC%: 0.1, Acid Value (mgKOH/gm): 0.1		Nimir Chemicals Pakistan Ltd., 14.8 Km, Sheikhupura-Faisalabad Road, Mouza Ghikki Distt. Sheikhupura	
62	29173500	Phthalic anhydride (PA)	Solidification point: 130.9 Colour (APHA): 20 Heat Hazen at 250 C (APHA): 40 Purity By G.C (%Wt): Min. 99.85 Benzoic Acid %: 0.05	A colorless to white lustrous solid in the form of needles with a mild distinctive odor. Forms a corrosive solution when mixed with water. Chemical Name :1, 2 Benzene Di Carboxylic Acid Anhydride ($C_8H_4O_3$) Molecular Weight : 148 Melting Point: 131.9 °C Boiling point: 284.5 °C Vapor pressure : 5.17X10-4 mm Hg at 25 °C Vapor density: 6.6 (Air = 1) Water solubility : 6,000 mg/L at 25 °C Slightly soluble: in ethyl ether Soluble in Ethanol, acetone, benzene	Hydrolyzes rapidly in the presence of water forming Phthalic Acid. Incompatible with acids, strong oxidizing agents, alcohols, amines, and bases. Reacts with strong oxidants, strong acids, strong bases and reducing agents. Reacts violently with copper oxide and sodium nitrite on heating. This generates explosion hazard. Attacks many metals in the presence of water. Naphthoquinones (byproduct of Naphthalene) reacts with iron salts of phthalic acid & iron sulfides to form fire & explosion. The material is stable at normal conditions even under fire exposure conditions and do not react with water.	Nimir Chemicals Pakistan Ltd., 14.8 Km, Sheikhupura-Faisalabad Road, Mouza Ghikki Distt. Sheikhupura	
63	29173610	Purified Terephthalic Acid	-	White, free flowing crystalline powder		Lotte Chemical Pakistan Ltd., Eastern Industrial Zone, EZ/1-P-4, Port Qasim Road, Karachi	
64	29242910	Paracetamol	Current pharamacopoial BP/EP, USP Specifications	Solid (Powder)	Para Aminophenol Derivative	Pharmagen Ltd., 34-Km Ferozepur Road, Lahore	
65	29315999	Booster Agent	Textile grade			Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900	
66	29319090	Sequester agent	Textile grade			Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900	
67	29321900	Empagliflozin	current pharamacopoial BP/EP, USP Specifications	Solid (Powder)	Sugur derivatives	Pharmagen Ltd., 34-Km Ferozepur Road, Lahore	
68	29333990	Omeprazole (Powder/ Pellets) - Esomeprazole (Powder/ Pellets)	Current pharamacopoial BP/EP, USP Specifications	Solid (Powder)	Benzimidazole Derivative	Pharmagen Ltd., 34-Km Ferozepur Road, Lahore	

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
69	9 29334990	i) Moxifloxacin	 current pharamacopoial BP/EP, USP Specifications Light yellow or yellow, slightly hygroscopic powder or crystals 	 Solid (Powder) Solutbility: Sparingly soluble in water, slightly soluble in ethanol (96 per cent), practically insoluble in acetone Water MAX 4.5% pH 3.9 – 4.6 	 Quinolones derivatives hydrochloride salt of a fluoroquinolone antibacterial antibiotic. It binds to and inhibits the bacterial enzymes DNA gyrase (topoisomerase II) and topoisomerase IV, resulting in inhibition of DNA replication and repair and cell death in sensitive bacterial species 	 Pharmagen Ltd., 34-Km Ferozepur Road, Lahore Zenith Chemical Industries (Pvt) Ltd., Village Dhonday Pajian Road, Raiwind Lahore
		ii) Moxifloxacin HCL	BP & USP Specifications	Light Yellow or Yellow Powder or crystals, slightly hygroscopic.	Active Pharmaceutical Ingredient (API) Solubility sparingly soluble in water, slightly soluble in Ethanol (96%), Practically insoluble in Acetone <u>PH</u> : (3.9-4.6), <u>Water</u> : K/F 4.5 <u>Chemical Formula</u> : C21H25CIFN3O4 <u>Molecular Weight</u> : 437.9	Zenith Chemical Industries (Pvt) Ltd., Village Dhonday Pajian Road, Raiwind Lahore
		iii) Montelukast Sodium	White or almost white, hygroscopic powder	 (1)Solutbility Freely soluble in water and in methylene chloride, freely soluble to very soluble in ethanol (2) Water Max 2.0% 	Orally bioavailable monosodium salt of montelukast, a selective cysteinyl leukotriene receptor antagonist with anti- inflammatory and bronchodilating activities. Blocks the cysteinyl leukotriene 1 (CysLT1) receptor, preventing binding of the inflammatory mediator leukotriene D4 (LTD4). Inhibition of LTD4 activity results in inhibition of leukotriene-mediated inflammatory events including: migration of eosinophils and neutrophils; adhesion of leukocytes to vascular endothelium, monocyte and neutrophil aggregation; increased airway edema; increased capillary permeability; and bronchoconstriction	
70	29335930	Ciprofloxacin Hydrochloride	 Current pharamacopoial BP/EP, USP Specifications A pale yellow, Crystalline, Hygroscopic powder 	 ¹- Solid (Powder) Soluble in water, slightly soluble in methanol, very slightly soluble in anhydrous ethanol, practically insoluble in acetone, in ethyl acetate and in methylene Chloride LOD MAX 6.7%, - pH 3.5 – 4.5 	Fluoroquinolone derivative, used to treat a wide variety of infections, including infections of bones and joints, endocarditis, gastroenteritis, malignant otitis externa, respiratory tract infections, cellulitis, urinary tract infections, prostatitis, anthrax, and chancroid.	 Pharmagen Ltd., 34-Km Ferozepur Road, Lahore Zenith Chemical Industries (Pvt) Ltd., Village Dhonday Pajian Road, Raiwind Lahore
71	29335990	Cetirizine dihydrochloride	White or almost white powder	 (1)Solutbility: Freely soluble in water, practically insoluble in acetone and in methylene chloride (2) LOD MAX 0.5% (3) pH 1.2 – 1.8 	A synthetic phenylmethyl-piperazinyl derivative, antihistaminic Cetirizine is a metabolite of hydroxyzine and a selective peripheral histamine H1- receptor antagonist. It is used for symptomatic treatment of seasonal and perennial allergic rhinitis and for chronic urticaria. (NCI04)	Zenith Chemical Industries (Pvt) Ltd., Village Dhonday Pajian Road, Raiwind Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
72	29339990	i) Sitagliptin Phosphate	Phosphate White or almost white powder (1) Solubility: Soluble in water, very slightly soluble in anhydrous ethanol, practically insoluble in heptane Chemical Name: 4-oxo-4-(3-(triflu dihydro(1,2,4)tria (2) Water: (Limit .3.3 – 3.7%) 7(8H)-yl)-1-(2,4,5) 2-amine Sitagliptin is an o peptidase-4 (DPP conjunction with improve glycemic with type 2 diabet of this medication dependent increas decreases in gluca 3.1		4-oxo-4-(3-(trifluoromethyl)-5,6- dihydro(1,2,4)triazolo(4,3-a)pyrazin- 7(8H)-yl)-1-(2,4,5-trifluorophenyl)butan-	Zenith Chemical Industries (Pvt) Ltd., Village Dhonday Pajian Road, Raiwind Lahore
		ii) Vildagliptin	current pharamacopoial BP/EP, USP Specifications	Solid (Powder)	Sugur derivatives	Pharmagen Ltd., 34-Km Ferozepur Road, Lahore
73	29349910	Furazolidine	Active Pharmaceutical Ingredient (API) & Feed grade	Yellow Powder		Alpha Chemicals (Pvt) Limited, 430-GI, Johar Town Lahore
74	29349990	i) Levofloxacin hemihydrate	 Light yellowish-white or light yellow, crystalline powder Current pharamacopoial BP/EP, USP Specifications 	 (1)Solutbility: Sparingly soluble in water, freely soluble 111 acetic acid, sparingly soluble in methanol, slightly soluble 111 anhydrous ethanol. (2) Water 2.0 - 3.0 % (3) Solid (Powder) 	 Fluoroquinolone derivative Levofloxacin is a broad-spectrum, third-generation fluoroquinolone antibiotic and optically active L-isomer of ofloxacin with antibacterial activity. Levofloxacin diffuses through the bacterial cell wall and acts by inhibiting DNA gyrase (bacterial topoisomerase II), an enzyme required for DNA replication, RNA transcription, and repair of bacterial DNA. Inhibition of DNA gyrase activity leads to blockage of bacterial cell growth 	 Pharmagen Ltd., 34-Km Ferozepur Road, Lahore Zenith Chemical Industries (Pvt) Ltd., Village Dhonday Pajian Road, Raiwind Lahore
		ii) Sofosbuvir iii) Ofloxacin	Manufacturer Specifications Pale yellow or bright yellow, crystalline powder.	Solid (Powder) (1)Solutbility: Slightly soluble in water, soluble in glacial acetic acid, slightly soluble or soluble in methylene chloride, slightly soluble in methanol. (2) LOD MAX 0.2% (3) Optical Rotation: -0.10 to + 0.10	Antiviral Used to treat a wide variety of infections, including infections of bones and joints, endocarditis, gastroenteritis, malignant otitis externa, respiratory tract infections, cellulitis, urinary tract infections, prostatitis, anthrax, and	
75	29359030	Sulfamethoxazole	Current pharamacopoial BP/EP, USP Specifications	Solid (Powder), Almost White Crystalline	chancroid. Sulfonamide Derivative Solubility: Practically insoluble in water, freely soluble in Acetone, sparingly soluble in Ethanol (96%). Melting Point: 169 °C-172°C LOD: Not more than 0.5 % Assay:99.0 %-101.0 %	 Pharmagen Ltd., 34-Km Ferozepur Road, Lahore Alpha Chemicals (Pvt) Limited, 430-GI, Johar Town Lahore
76	29372200	Betamehasone Valerate	Current pharamacopoial BP/EP, USP Specifications	Solid (Powder)	Glucocorticoid derivative	Pharmagen Ltd., 34-Km Ferozepur Road, Lahore
77	29394100	Ephedrine Hydrochloride / Ephedrine Sulphate	Active Pharmaceutical Ingredient (API)	White Crystalline Powder		Alpha Chemicals (Pvt) Limited, 430-GI, Johar Town Lahore
78	29394200	Pseudoephedrine Hydrochloride / Pseudoephedrine Sulphate	Active Pharmaceutical Ingredient (API)	White Crystalline Powder		Alpha Chemicals (Pvt) Limited, 430-GI, Johar Town Lahore
79	29411000	 Amoxycillin Trihydrate AmpicillinTrihydrate Cloxacillin Sodium 	Current pharamacopoial BP/EP, USP Specifications	Solid (Powder)	Penicillin Derivatives	Pharmagen Ltd., 34-Km Ferozepur Road, Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
80	29415000	Clarithromycin	current pharamacopoial BP/EP, USP Specifications	Solid (Powder)	Macrolide derivatives	Pharmagen Ltd., 34-Km Ferozepur Road, Lahore
81	29419010	Cephalexin hydrate	Current pharamacopoial BP/EP, USP Specifications	Solid (Powder)	Cephalosporins (I-st Generation)	Pharmagen Ltd., 34-Km Ferozepur Road, Lahore
82	29419040	Cephradine	Current pharamacopoial BP/EP, USP Specifications	Solid (Powder)	Cephalosporins (I-st Generation)	Pharmagen Ltd., 34-Km Ferozepur Road, Lahore
83	29419060	Cefixime	Current pharamacopoial BP/EP, USP Specifications	Solid (Powder)	Cephalosporins (III-rd Generation)	Pharmagen Ltd., 34-Km Ferozepur Road, Lahore
84	29419090	i) Cefadroxil / Cephradine-L- Arginine Sterile ii) Cefaclor iii) Ceftriaxone Sodium Sterile	Current pharamacopoial BP/EP, USP Specifications	Solid (Powder)	 i) Cephalosporins (I-st Generation) ii) Cephalosporins (II-nd Generation) iii) Cephalosporins (III-rd Generation) 	Pharmagen Ltd., 34-Km Ferozepur Road, Lahore
85	30045090	Medicaments containing vitamins	Soya based vitamin and minerals Instant beverage	Food grade		Matrix Pharma Pvt. Ltd., Plot 12, Secotr 15 Korangi Industrial Area, Karachi
86	30049092	Paracetamol	White or almost white, crystalline powder.	 (1)Melting Point: 168.0°C — 172.0°C (2) LOD NMT 0.5% (3) pH 5.3 - 6.5 at 25°C (4) Density 1.293gm/cc 	Paracetamol (p-Hydroxyacetanilide) undergoes usual reaction of Phenols because of the presence of its hydroxyl functional groups. It undergoes reactions such as acetylation, oxidation, reacts with sodium hydroxide and it gives a positive test to iron (iii) chloride test based on the presence of the phenolic group	Zenith Chemical Industries (Pvt) Ltd., Village Dhonday Pajian Road, Raiwind Lahore
87	30051010	Surgical Tape (Woven/ Cloth type)	Thickness from 15 microns to 500 microns	White colour or with any colour		 Khawaja Adhesive Tapes (Pvt) Ltd., 4-H, Gulberg-III, Lahore Osaka Electric & Industrial Co., Ground Floor, Plot No. Dp-10, Sector 12-D, North Karachi Industrial Area, Karachi
88	30051090	Surgical Tape (Paper / PET / Non Woven Type)	Thickness from 15 microns to 150 microns	White colour or with any colour		 Khawaja Adhesive Tapes (Pvt) Ltd., 4-H, Gulberg-III, Lahore Osaka Electric & Industrial Co., Ground Floor, Plot No. Dp-10, Sector 12-D, North Karachi Industrial Area, Karachi
89	32021000	Synthetic organic tanning substances	Tanning is the process of treating skins and hides of animals to produce leather. The substance used to achieve the desired affect are known as tanning substances.	May be solid or liquid at room temperature	Crosslinking of the protein structure of skin, making it more durable and less susceptible to decomposition.	 Chemical Process Ind. (Pvt) Ltd., 103- Habitat, Shadman-II, Jail Road Lahore Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900 SRC (Pvt) LTD, 3-KM Bulhar Road, off 22- km Ferozpur Road, Rohi Nala, Lahore
90	32029010	Tanning preparations	used to achieve the desired affect are known as tanning substances.	May be solid or liquid at room temperature	Crosslinking of the protein structure of skin, making it more durable and less susceptible to decomposition.	 Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900 Chemical Process Ind. (Pvt) Ltd., 103- Habitat, Shadman-II, Jail Road Lahore Industrial Chemicals (Pvt.) Ltd., D-29 SITE, South Avenue, Manghopir Road, Karachi SRC (Pvt) LTD, 3-KM Bulhar Road, off 22- km Ferozpur Road, Rohi Nala, Lahore
91	32029090	Bates, artificial	In the bating process, proteases are used to remove scud and unwanted proteins. The process also deswells swollen pelts. The result of bating with the use of enzymes is a clean, smooth and soft hide surface.	May be solid or liquid at room temperature	Enzymes	 BASF Pakistan (Pvt.) Ltd., 46-A, Block – 6, P.E.C.H.S, Karachi – 75400 Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900 SRC (Pvt) LTD, 3-KM Bulhar Road, off 22- km Ferozpur Road, Rohi Nala, Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
92	32041120	Disperse dyes and preparations (Liquid)	Water-insoluble dyes that are used for the dyeing of polyester and acetate fibers. Normally comes with a dispersing agent to disperse them in water.	semi-solid or liquid at room temperature	Water-insoluble dyes	Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900
93	32041190	Disperse dyes and preparations (Other)	Water-insoluble dyes that are used for the dyeing of polyester and acetate fibers. Normally comes with a dispersing agent to disperse them in water.	May be solid, semi-solid or liquid at room temperature	Water-insoluble dyes	Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900
94	32041200	i) Dyes, acid ii) Acid Dyes for Leather	Water soluble dyes used for the dyeing of silk, wool, nylon and modified acrylics	May be solid, semi-solid or liquid at room temperature	Water soluble dyes	 Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900 Sardar Chemical Industries, Suit # 9, 2nd Floor, Hafeez Centre, Main Boulevard, Gulberg- III, Lahore Sardar Dyes & Chemical Industries, Chemi-Dystuff Industries (Pvt) Ltd., Nimir Resins Ltd., 14.5 KM, Lahore - Sheikhupura Road, Lahore Sandal Dystuffs Industries, 305-308, 2nd Floor, The Business Center, 8/8 New Civil Lines Faisalabad Chemical Process Ind. (Pvt) Ltd., 103- Habitat, Shadman-II, Jail Road Lahore SRC (Pvt) LTD, 3-KM Bulhar Road, off 22- km Ferozpur Road, Rohi Nala, Lahore BASF Pakistan (Pvt.) Ltd., 46-A, Block – 6, P.E.C.H.S, Karachi – 75400
95	32041300	Basic Dyes	Textile grade			Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900
96	32041400	Direct dyes and preparations	Water soluble substantive dyes that have affinity for cellulosic fibres			 Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900 Sandal Dyestuff Industries Ltd., 4 KM Chak Jhumra Sangla Hill Road, Faisalabad
97	32041510	Indigo Blue	Textile grade			Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900
98	32041600	Reactive dyes and preparations	primarily used for tinting textiles, that attach themselves to their substrates by a chemical reaction by forming a covalent bond between the molecule of dye and that of the fibre.	May be solid or liquid at room temperature	Water soluble organic substances that are attached to the fibers through a dyeing process with the help of certain chemicals	 Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900 Sandal Dyestuff Industries Ltd., 4 KM Chak Jhumra Sangla Hill Road, Faisalabad
99	32041710	Pigments and preparations	Pigments are water insoluble and are applied as finely ground solid particles through a liquid matrix. Pigments may be organic.	May be solid, semi-solid or liquid at room temperature	Main organic pigment includes azo pigments and Copper phthalocyanines.	 Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900 Mobil Master Batch Industries (Pvt) Ltd., 92- Main Ravi Road, Lahore BASF Pakistan (Pvt.) Ltd., 46-A, Block – 6, P.E.C.H.S, Karachi – 75400 Sandal Dyestuff Industries Ltd., 4 KM Chak Jhumra Sangla Hill Road, Faisalabad Bin Rasheed Color & Chemical Mfg Co., 10 Abbot Road, Lahore - 54000 SRC (Pvt) LTD, 3-KM Bulhar Road, off 22- km Ferozpur Road, Rohi Nala, Lahore
100	32041720	i) Pigments Blue (15:0 & 15:03), Yellow, Reds, Pinks & Oranges	Pigment Dye for Textile Industries	Blue, Yellow, Red, Pink & Orange (odorless Liquid)	Copper Ptha locyn ine Pigment Diazo Pigment	M.N CHEMICAL INDS. (PVT) Ltd., M.N Plaza West Canal Road, Skan College Faisalabad
		ii) Liquid Masterbatch Organic Colors	Liquid Colorants for PU, PVC, W/B & S/B, Paints, Textile printing	Liquid color components viscosity of 900-3500cps	Combination of organic resins, solvents and organic pigments	Bin Rasheed Color & Chemical Mfg Co., 10 Abbot Road, Lahore
		iii) Pigments in Liquid form	Textile grade			Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900
101	32041790	Solid Masterbatch Organic Colors	Plastic granulated Colorants for PE, PET, PC, ABS, PS etc., Textile	Solid plastic color component melting range 150-280	Combination of plastic resins, additives and pigments	Bin Rasheed Color & Chemical Mfg Co., 10 Abbot Road, Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
102	32041910	Dyes Sulphur	Textile grade			Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900
103	32042000	Synthetic organic products of a kind used as fluorescent brightening agents	Optical brighteners, optical brightening agents (OBAs), fluorescent brightening agents (FBAs) or fluorescent whitening agents (FWAs) are chemical compounds that absorb light in the ultraviolet and violet region (usually 340-370 nm) of the electromagnetic spectrum, and re-emit light in the blue region (typically 420-470). These additives are often used to enhance the appearance of fabric and paper, causing a "whitening" effect"; they make intrinsically yellow materials look less so, by compensating the deficit in blue and purple light reflected by the material, with the blue and purple optical emission.	May be solid or liquid at room temperature		 Sardar Dyes & Chemical Industries, Sandal Dystuffs Industries, 305-308, 2nd Floor, The Business Center, 8/8 New Civil Lines Faisalabad Chemi-Dystuff Industries (Pvt) Ltd., Chemical Process Ind. (Pvt) Ltd., 103- Habitat, Shadman-II, Jail Road Lahore, Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900 Sardar Chemical Industries, Suit # 9, 2nd Floor, Hafeez Centre, Main Boulevard, Gulberg- III, Lahore Nimir Resins Ltd., 12-B, New Muslim Town, Lahore S & F Enterprises, Karachi SRC (Pvt) LTD, 3-KM Bulhar Road, off 22- km Ferozpur Road, Rohi Nala, Lahore
104	32049000	Whitening agent	Textile grade	May be solid, semi-solid or liquid at room temperature		 Sardar Dyes & Chemical Industries, Sandal Dystuffs Industries, 305-308, 2nd Floor, The Business Center, 8/8 New Civil Lines Faisalabad Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900 Chemi-Dystuff Industries (Pvt) Ltd., D/4, South Avenue, S.I.T.E Karachi-75700 Nimir Resins Ltd., 14.5 KM, Lahore - Sheikhupura Road, Lahore Sardar Chemical Industries, Suit # 9, 2nd Floor, Hafeez Centre, Main Boulevard, Gulberg-III, Lahore Chemical Process Ind. (Pvt) Ltd., 103-Habitat, Shadman-II, Jail Road Lahore, SRC (Pvt) LTD, 3-KM Bulhar Road, off 22-km Ferozpur Road, Rohi Nala, Lahore
105	32061900	Pigments and preparations	Textile/Leather grade Preparations containing less then 80% titanium dioxide, include dispersions in plastics, natural rubber, synthetic rubber or plasticizers, used for colouring plastics and rubber etc in the mass.	May be solid, semi-solid or liquid at room temperature	Mainly inorganic pigment based on TiO ₂ .	 BASF Pakistan (Pvt.) Ltd., 46-A, Block – 6, P.E.C.H.S, Karachi – 75400 Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900 Mobil Master Batch Industries (Pvt) Ltd., 92- Main Ravi Road, Lahore Bin Rasheed Color & Chemical Mfg Co., 10 Abbot Road, Lahore – 54000 SRC (Pvt) LTD, 3-KM Bulhar Road, off 22- km Ferozpur Road, Rohi Nala, Lahore
106	32062010	Chrome Yellow for oil Paint, Industrial Paints, Master Batches, Artificial Leather, NC Paints and printing Inks	Chrome Yellow Pigments (Inorganic) 95%	Appearance Yellow Colour	PH. Value 5.7 to 7.8, PbCrO4 <68 to < 90%, S.P. Gravity 5.6 to 6.1, Fastness to Heat 180 °C to 240 °C, Moisture 0.5%, Timing strength 100 + 5%, Fineness: 325 to 450 Mesh	Poplon & Company (Pvt) Ltd., 34-N, Gulberg II, Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company	
107	32064290	Masterbatches	Based on Lithopane/ Zinc Sulphide:	Solid form	Dispersion of Lithopane and Zinc Sulphide in polymers	 Clariant Chemicals Pakistan (Pvt) Ltd. Sector Korangi Industrial Area, Karachi. Bin Rasheed Color & Chemical Mfg Co., 10 Abbot Road, Lahore - 54000 Mobil Master Batch Industries (Pvt) Ltd., Main Ravi Road, Lahore 	
108	32064910	Masterbatches	Master Batches - Solid	Solid form	Organic and inorganic in nature, resistance to solvents, nature is acidic /alkali	 Clariant Chemicals Pakistan (Pvt) Ltd., 1- A/1, Sector 20, Korangi Industrial Area, Karachi. Bin Rasheed Color & Chemical Mfg Co., 29- G/5, Model Town, Lahore Mobil Master Batch Industries (Pvt) Ltd., 92- Main Ravi Road, Lahore Intra-Keck (Pvt) Ltd., 112/2, Q.I.E., Kot Lakhpat, Lahore-54770 	
109	32064990	Masterbatches	Master Batches- Liquid	Paste form	Organic and inorganic in nature, resistance to solvents, nature is acidic /alkali	 Clariant Chemicals Pakistan (Pvt) Ltd., 1- A/1, Sector 20, Korangi Industrial Area, Karachi. Bin Rasheed Color & Chemical Mfg Co., 29- G/5, Model Town, Lahore Mobil Master Batch Industries (Pvt) Ltd., 92- Main Ravi Road, Lahore Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900 Intra-Keck (Pvt) Ltd., 112/2, Q.I.E., Kot Lakhpat, Lahore-54770 	
110	32081010	Paints and varnishes (including enamels and lacquers)	Based on polyesters:	Stoving Type	Polyester + Melamine Base	 Berger Paints Pakistan Limited, 28- Km Multan Road, Lahore. Intra-Keck (Pvt) Ltd., 112/2, Q.I.E., Kot Lakhpat, Lahore-54770 	
111	32081090	i) Stoving clear Coats	Polyester based	Clear Coat for Glossy Finish.	UV resistant, water Resistant &	1) Kansai Paint (Pvt) Ltd., 139-CCA, Sector	
		") 41 · · · · · · · · · · · · · · · · · ·		Clear coat (Baking)	Proctective Clear coat.	DD, Phase IV, Defence Housing Authority, Lahore	
		ii) Aluminium Paintsiii) Metallic / Pearl basecoat (Baking	Polyester based	Metal finishing Colored properties with Mica &	Metallic effect finishes. To give assorted colors.	 Berger Paints Pakistan Limited, 28- Km 	
		Paint)	(Resins with Alumnium & Mica).	Aluminium.	To give assorted colors.	Multan Road, Lahore.	
		,	Polyester based	Give color & Protection.	Corossion resistant.	3) Intra-Keck (Pvt) Ltd., 112/2, Q.I.E., Kot	
		v) Stoving Primer/ Intermediate Coat		- For Smooth finish & good adhesion.	- Anti corrosive property.	Lakhpat, Lahore-54770	
				- Liquid coloured paint with anti- chipping property	- Mild Acid/Alkali resistant middle coat		
		Paint)	Polyester based	Coloured liquid paint for automotive vehicles	Protection & good appreance.		
			Acrylic based CED paint (Two Component- Baking paint) - F-1 Pigment Paste & F-2 Resin Emulsion	i) Coloured liquid paint ii) Milky liquid emulsion paint	Anti-corrosive paint		
112	32082090	i) Plastic Parts Clear Coat	Special synthetic Acrylic Polyol based resin.	Clear Coat for Glossy Finish.	UV resistant, water Resistant.	1) Kansai Paint (Pvt) Ltd., 139-CCA, Sector	
		ii) Clear coat (Baking paint)	Acrylic Melamine based Resin.	Clear Coat for Glossy Finish.	UV resistant & Proctective Clear coat.	DD, Phase IV, Defence Housing Authority, Lahore	
		iii) Stoving clear Coats	Acrylic based	Clear Coat for Glossy Finish. Clear coat (Baking)	UV resistant, water Resistant & Proctective Clear coat.	 Berger Paints Pakistan Limited, 28- Km Multan Road, Lahore. 	
		iv) Aluminium Paints	Acrylic based	Metal finishing	Metallic effect finishes, Based on acrylic or vinyl polymers:		
		 v) Metallic / Pearl basecoat (Baking Paint) 	Acrylic based (Resins with Alumnium & Mica).	Colored properties with Mica & Aluminium. Metal finishing	To give assorted colors. Based on acrylic or vinyl polymers:		
		vi) PU Clears Paints	Polyurethane (PU) Polyol /Acrylic Urethane (AU) Resin based.	Clear Coat for Glossy Finish.	UV resistant, water resistant & good weatherability.		

5. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		vii) Primer / Base Coat for Plastic Parts	Special synthetic Acrylic Polyol based resin.	Pigmented Colored Paint. Pigmented color for Automitive vehicles. Clear Coat for Glossy Finish.	For Smooth surface adhesion & Finish. To give assorted colors. UV resistant, water Resistant.	
		viii) PU Enamels / PU Primers	Polyurethane (PU) Polyol /Acrylic Urethane (AU) Resin based.	Give color & Protection. For Smooth finish & good adhesion.	Protect against weather. UV resistant, water Resistant & good adhssion to the substrate.	
		ix) Intermediate Coat	Acrylic based	 Liquid coloured paint with anti- chipping property 	- Mild Acid/Alkali resistant middle coat	
		 x) Paints and varnishes (including enamels and lacquers) 	Based on acrylic or vinyl polymers:	For Smooth finish & good adhesion.	Stoving & Air drying,	
		xi) Stoving enamels	Acrylic based	Give color & Protection.	Based on acrylic or vinyl polymers:	
13	32089090	i) Primer Surfacer / Intermediate Coat (Baking Paint)	Polyester/Melamine resin based paint for automotive	Liquid coloured paint with anti-chipping property	Mild Acid/Alkali resistant middle coat	 Kansai Paint (Pvt) Ltd., 139-CCA, Sector DD, Phase IV, Defence Housing Authority,
		ii) Stoving clear Coats	Alkyd Melamine Based Resin.	Clear Coat for Glossy Finish. Clear coat (Baking)	UV resistant, water Resistant & Proctective Clear coat.	Lahore 2) Berger Paints Pakistan Limited, 28- Km
		iii) Aluminium Paints	Alkyd Melamine Based Resin.	Metal finishing	Based on varnishes	Multan Road, Lahore.
		iv) Metallic / Pearl basecoat (Baking Paint)	Alkyd Melamine Based (Resins with Alumnium & Mica).	 Colored properties with Mica & Aluminium. Metal finishing 	To give assorted colors.Based on varnishes	
		v) Stoving enamels	Alkyd Melamine Based Resin.	Give color & Protection.	Corossion resistant, Based on varnishes	
		vi) Stoving Primer/ Intermediate Coat	Alkyd Melamine Based Resin.	 For Smooth finish & good adhesion. Liquid coloured paint with anti- chipping property Give color & Protection. 	 Anti corrosive property. Mild Acid/Alkali resistant middle coat Based on varnishes 	
		v) Solid Colour Topcoat (Baking Paint)	Alkyd Melamine Based Resin.	Coloured liquid paint for automotive vehicles	Protection & good appreance. Based on varnishes	
		vi) PU Clears Paints	Polyurethane (PU) Polyol /Acrylic Urethane (AU) Resin based.	Clear Coat for Glossy Finish.	UV resistant, water resistant & good weatherability.	
		vii) Primer / Base Coat for Plastic Parts	 Special synthetic Acrylic Polyol based resin. Based on varnishes 	Pigmented Colored Paint.	 For Smooth surface adhesion & Finish. Based on varnishes / To give assorted colors. 	
		viii) PU Enamels/Primers	Polyurethane (PU) Polyol /Acrylic Urethane (AU) Resin based.	Give color & Protection. For Smooth finish & good adhesion.	Protect against weather. UV resistant, water Resistant & good adhssion to the substrate. Based on varnishes	
		Primer (CED)	Modified Epoxy resin based CED paint (Two Component- Baking paint) - F-1 Pigment Paste & F-2 Resin Emulsion	i) Coloured liquid paint ii) Milky liquid emulsion paint	Anti-corrosive paint	
		x) PU (Polyurethane Resin)	Sp. Gravity : 1.30, Acid Value;, <1 NCO value: 1, Viscosity: 100,000 Cps	Colorless thick Liquid	Reaction Mixture of polyol, pure MDI and additives	A.T.S Synthetic (Pvt) Ltd., 4-Km, Kacha Road, Kahna Nau, Lahore.
14	32091090	i) Road Marking Paint Material	Water Base	PVA Base	Drying Application	Berger Paints Pakistan Limited, 28- Km Multan
		ii) Cathodic Electro-	Acrylic based CED paint	Coloured liquid paint	Anti-corrosive paint	Road, Lahore.
5	32099090	i) Deposition Primer (CED)	Modified Epoxy resin based CED paint (Two Component- Baking paint) - F-1 Pigment Paste & F-2 Resin Emulsion	ii) Milky liquid emulsion paint		Berger Paints Pakistan Limited, 28- Km Multan Road, Lahore.
		ii) Aerosol Paint	Aerosol paint is a type of paint that comes in a sealed pressurized container. Spray paint leaves a smooth, evenly coated surface.	Colored liquid at room temperature Relative Density @ 15 °C 0.7 – 0.8	Ingredients in aerosol paint can include petroleum distillate solvents, propellent, pigments and corrosion inhibitors	Mijokum (Pvt) Ltd., F-48 & F-52, Sector 50-C, Korangi, Karachi.
116	32100010	Other paints and varnishes (including enamels, lacquers and distempers); prepared water pigments of a kind used for finishing leather.	Distempers	For Smooth finish	Water Base	Berger Paints Pakistan Limited, 28- Km Multan Road, Lahore.

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
117	32100020	Prepared water pigments	For Textile	May be solid, semi-solid or liquid at room temperature		 Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900 BASF Pakistan (Pvt.) Ltd., 46-A, Block – 6, P.E.C.H.S, Karachi – 75400 Gulf Chemicals ((Pvt) Limited, Plot No. 80, Sector 7-A, Korangi Industrial Area, Karachi
118	32110090	Dryers, prepared	For paints	Liquid	Dryer for Paints	Nimir Resins Ltd., 14.5 KM, Lahore - Sheikhupura Road, Lahore
119	32131000	Water Color Sets/ Poster Color Sets	Semi Liquid Filled in plastic tubes			Indus Pencil Industries, B-54, Manghopir Road SITE Karachi
120	32149010	Silicon Sealant	Acetoxy & Neutral Cure Sealants	For use in Construction, Automotive, Solar Panels, Home Appliances, Electronics, Textiles, Glass Processing, Sanitary, and others	Sealant made using, but not solely comprising of, silicone polymer [-Si-O- Si-] backbone	Harris Silicones & Glass (Pvt.) Ltd., Farooque Industrial Estate, Anam Road, 20km Ferozepur Road, Lahore
121	32151110	Rolling coating printing ink	Rolling coating printing ink	(Fexo, Grevier & Off Set)	Solvent Base Water Base	Berger Paints Pakistan Limited, 28- Km Multan Road, Lahore.
122	32151190	Black - Flexographic, Rotogravure & Offset Sheet fed Printing inks	Prinitng inks for packaging, lithography	Liquid/Paste	Water based / Solvent Based / Oil Based	 DIC Pakistan Ltd, Shahrah-e-Roomi, P.O. Amer Sidhu, Lahore Pakistan Coating Chemicals (Pvt) Ltd., 10- Abbot Road, Lahore
123	32151920	Digital printing inks	Prinitng inks for textile application	Liquid/Paste	Water based / Solvent Based	Pakistan Coating Chemicals (Pvt) Ltd., 10-Abbot Road, Lahore
124	32151990	Colored - Flexographic, Rotogravure & Offset Sheet fed (lithographic) Printing inks, screen printing inks	Prinitng inks for packaging, lithography, plastic substrates	Liquid/Paste	Water based / Solvent Based / Oil Based	DIC Pakistan Ltd., Shahrah-e-Roomi, P.O. Amer Sidhu, Lahore
125	32159010	Inks for ball point, pens, fine liner and fiber tips	Colored inks for stationery	Liquid/Paste	Water based / Solvent Based / Oil Based	Pakistan Coating Chemicals (Pvt) Ltd., 10-Abbot Road, Lahore
126	32159090	i) Ink	Fountain Pens inks in Bottles, Sachets and Catridges	Colour: Black, Blue, Red, Green, Form: Liquid, Boiling Point (at 760 mmHg): 99°C, PH:5.46~7.85, Specific Gravity: 1.004~1.017gm/cm ³ , Viscosity at 25°C: 3.3~4.72cps, Surface Tension: 51.813~65.944dyne/cm		Dollar Industries (Pvt) Ltd., D-85, SITE, Karachi – 75700
		ii) Inkjet inks	Solvent based inks for advertisement bill boards, flex printing	Liquid/Paste	Water based / Solvent Based	 Intra-Keck (Pvt) Ltd., 112/2, Q.I.E., Kot Lakhpat, Lahore-54770 Pakistan Coating Chemicals (Pvt) Ltd., 10- Abbot Road, Lahore
127	33051000	Hair Shampoo	Designed to protect hair from breakage, drying & damage. Improve moisture retention and elasticity. Suitable for all hair type.	Milky white creamy texture at room temperature. Relative Density @ 25 °C ≥ 0.90	Blend of surface-active materials, salt & moisturizer. It is effective for all types of hair for shining & moisturizing from root to tip.	 Mijokum (Pvt) Ltd., F-48 & F-52, Sector 50- C, Korangi, Karachi. Nimir Industrial Chemical Limited, 14.8 KM/ Sheikhupura- Faisalabad Roaod ,Bhikhi,Dist. Sheikhupura
128	33059090	Hair Conditioner	Designed to protect hair from breakage, drying & damage. Improve moisture retention and elasticity. Suitable for all hair type.	Milky white creamy texture at room temperature. Relative Density @ 25 °C ≥ 0.90	Blend of surface-active materials, salt & moisturizer. It is effective for all types of hair for shining & moisturizing from root to tip.	 Mijokum (Pvt) Ltd., F-48 & F-52, Sector 50- C, Korangi, Karachi. Nimir Industrial Chemical Limited, 14.8 KM/ Sheikhupura- Faisalabad Roaod ,Bhikhi,Dist. Sheikhupura
129	33072000	Body Sprays / Deodorants	Deodoriser/Perfume for personal care in form of Aerosol spray - 120ml to 250ml	Filled in aluminium cans of various dia (40-65mm) and various heights (110- 205mm)	Ethanol/Perfume based in Gas & Non Gas variant	Nimir Industrial Chemicals Ltd., 14.8 KM, Sheikhupura Faisalabad Road, Lahore.

5. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
130	33074900	Air Freshener	Emit fragrance when sprayed or dispersed in air. May be used indoors in residential, commercial, hospitality, medical facilities and public arenas.	Colorless liquid at room temperature Relative Density @ 15 °C 0.60 – 0.80	Ingredients in air fresheners can include fragrances, aerosol propellants, corrosion inhibitors, preservatives, and solvents.	 Mijokum (Pvt) Ltd., F-48 & F-52, Sector 50- C, Korangi, Karachi. Nimir Industrial Chemical Limited, 14.8 KM/Sheikhupura- Faisalabad Roaod, Bhikhi, Dist. Sheikhupura
131	34011100	Soap for Toilets use (including medicated products)	Moisture = 11.0- 19% FFA= % 1.5 max. Sod. Chloride = 0.85 max Na2O % = 0.10 max TFM 74.0 Min	White Soap Noodles	Sodium salt of fatty acids	Nimir Industrial Chemicals Ltd., 14.8 KM, Sheikhupura Faisalabad Road, Lahore.
132	34011990	Hand Sanitizer	W.H.O compliant Instant Sanitizer. Kills most bacteria, fungi and enveloped viruses such as Coronaviruses and influenza. Its strong smelling formula evaporates completely with no rinsing required.	Clear to colorless viscous gel at room temperature. Density @ 25 °C 0.85 - 0.95 g/cm3 pH Conc. @ 25 °C 6 - 8	Blend of alcohol & humectants. Reduces population of bacteria, fungi, and enveloped viruses.	 Mijokum (Pvt) Ltd., F-48 & F-52, Sector 50- C, Korangi, Karachi. Nimir Industrial Chemical Limited, 14.8 KM/Sheikhupura- Faisalabad Roaod, Bhikhi, Dist. Sheikhupura
133	34012000	Soap Noodles	Moisture: 11.0-19%, FFA: 1.5% max, Sod. Chloride: 0.85% max, Na2O: 0.10% max, TFM: 74.0 Min	White Soap Noodles	Sodium salt of fatty acids	 Mijokum (Pvt) Ltd., F-48 & F-52, Sector 50- C, Korangi, Karachi. Nimir Industrial Chemical Limited, 14.8 KM/Sheikhupura- Faisalabad Roaod, Bhikhi, Dist. Sheikhupura
134	34013000	Hand Wash/Face Wash/Body Wash	It is designed for safe, simple and effective hand hygiene, cleansing of face and body	Creamy/gel liquid at room temperature. Density @ 25 °C 1.00 ± 0.1 g/cm3	Blend of surface-active materials, moisturizer and other chemicals.	 Mijokum (Pvt) Ltd., F-48 & F-52, Sector 50- C, Korangi, Karachi. Archroma Pakistan Ltd., I-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900
135	34023100	Linear Alkyl Benzene Sulphonic Acid	96% & 90%	Liquid		Tufail Chemical Industries Ltd., Progressive Centre, Mezz Floor, 30-A/6, PECHS, Shahrah-e- Faisal, Karachi
136	34023900	 i) Sodium Lauryl Ether Sulphate ii) Sodium Lauryl Sulphate iii) Wetting Agent (for textiles) 	70%	Powder & Paste		 Tufail Chemical Industries Ltd., Progressive Centre, Mezz Floor, 30-A/6, PECHS, Shahrah-e- Faisal, Karachi Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900
137	34024110	Organic surface Active Agent other than Soap (cationic)	Pharmaceutical Grade			Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900
138	34024190	Levelling Agent	For Textile Industry			Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900
139	34024200	Non Ionic Surface-active agents	Surfactants are compounds that lower the surface tension (or interfacial tension) between two liquids or between a liquid and a solid. Surfactants may act as detergents, wetting agents, emulsifiers, foaming agents, and dispersants.	May be solid or liquid at room temperature	Surfactants that do have an ionic character	 Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900 Nimir Resins Ltd., 14.5 KM, Lahore - Sheikhupura Road, Lahore
140	34024990	Car Shampoo	Car Care Products	Cleaning Agents		Harris Silicones & Glass (Pvt.) Ltd., Farooque Industrial Estate, Anam Road, 20km Ferozepur Road, Lahore
141	34025000	i) Engine Cleaner	Car Care Products	Cleaning Agents		Harris Silicones & Glass (Pvt.) Ltd., Farooque Industrial Estate, Anam Road, 20km Ferozepur Road, Lahore
		ii) Toilet cleaners	Organic surface- active agents (other than soap); surface- active preparations, washing preparations (including auxiliary washing preparations) and cleaning preparations, whether or not containing soap,	Thick Liqued Blue color	Acid solution with additive	 Berger Paints Pakistan Limited, 28- Km Multan Road, Lahore. Mijokum (Pvt) Ltd., F-48 & F-52, Sector 50- C, Korangi, Karachi.
		iii) Glass Cleaner	Designed to give a streak free shine to glass, mirrors and washable surfaces, removes dirt, dust, fingerprints, smudges, lint, grime, bugs and other contamination from glass.	Clear liquid at room temperature. Density @ 25 °C 0.90 - 1.05 g/cm3	Blend of surface-active materials & organic actives suitable for effective cleaning with a streak free shine & fast- drying formula.	Mijokum (Pvt) Ltd., F-48 & F-52, Sector 50-C, Korangi, Karachi.
		iv) Roller deglazer and cleaner	Cleaning and rejuvenating paste for lithographic offset inking rollers; removes stubborn deposits on older inking rollers; for use on dismantled rollers; suitable for NBR and EPDM compounds. To be used in sheet fed, web offset heatset printing machines	Yellow to light brown paste at room temperature. Density @ 15 °C 0.95 – 1.05 g/cm3	Cleaning paste for inking rollers. Quickly removes the ink from rubber rollers and blanket. Suitable for conventional ink.	 Mijokum (Pvt) Ltd., F-48 & F-52, Sector 50- C, Korangi, Karachi. Nimir Industrial Chemical Limited, 14.8 KM/Sheikhupura- Faisalabad Roaod ,Bhikhi,Dist. Sheikhupura

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
142	34029000	i) Surface Active Preparations and cleaning agents	Mainly act as detergents, wetting agents, emulsifiers, foaming agents or dispersants. Surfactants of various nature may be blended for the synergistic effect.	May be solid or liquid at room temperature	the formulation.	 BASF Pakistan (Pvt.) Ltd., 46-A, Block – 6, P.E.C.H.S, Karachi – 75400 Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900 S & F Enterprises, Plot No. F-22, Qabail Colony, Block 11, Gulberg Town, F.B. Area Karachi SRC (Pvt) LTD, 3-KM Bulhar Road, off 22- km Ferozpur Road, Rohi Nala, Lahore Berger Paints Pakistan Limited, 28- Km Multan Road, Lahore.
		ii) Glass cleaners / Floor Cleaner	Organic surface- active agents (other than soap); surface- active preparations, washing preparations (including auxiliary washing preparations) and cleaning preparations, whether or not containing soap,	Liqued blue color solution of cleaning additives. Milky Liqued	additives solution in water and alcohal. Solution of Pine oil , disinfectant and additives in Water.	Berger Paints Pakistan Limited, 28- Km Multan Road, Lahore.
143	34031110	Preparation	Preparations are intended to prepare leather and give it dersirable properties.			 Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900 BASF Pakistan (Pvt.) Ltd., 46-A, Block – 6, P.E.C.H.S, Karachi – 75400 Chemical Process Ind. (Pvt) Ltd., 103- Habitat, Shadman-II, Jail Road Lahore SRC (Pvt) LTD, 3-KM Bulhar Road, off 22-km Ferozpur Road, Rohi Nala, Lahore Gulf Chemicals ((Pvt) Limited, Plot No. 80, Sector 7-A, Korangi Industrial Area, Karachi
144	34031910	i) Silicone Grease	Greases	For lubricating and preserving rubber parts		Harris Silicones & Glass (Pvt.) Ltd., Farooque Industrial Estate, Anam Road, 20km Ferozepur Road, Lahore
		ii) Grease	ASTMD 217, ASTMD 2265, ASTMD 2270, ASTMD 942, ASTMD 1743, ASTMD 2509, ASTMD 2596, Visual= Color, Visual= Appearance	NLGI=0,1,2,3 Used for Lubrication of Automotive & industrial Bearings, Bushing & slides.	Lithium Soap Contaning Lithium Hydro Oxide &12 Hydroxyls Steric Acid Or Hydrogenated Castor Oil & Base Oil	Guard Friction (Pvt) Ltd., 8th KM Raiwand Road Lahore.
145	34039110	Preparation	Fat Liquor	Mainly liquid at room temperature	Reduce friction and enhance smoothness/ slippage property.	 Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900 BASF Pakistan (Pvt.) Ltd., 46-A, Block – 6, P.E.C.H.S, Karachi – 75400 Chemical Process Ind. (Pvt) Ltd., 103- Habitat, Shadman-II, Jail Road Lahore SRC (Pvt) LTD, 3-KM Bulhar Road, off 22- km Ferozpur Road, Rohi Nala, Lahore
146	34059000	Car Wax Protectant	Car Care Products	Wax & Polish for Cars & Motorbikes		Harris Silicones & Glass (Pvt.) Ltd., Farooque Industrial Estate, Anam Road, 20km Ferozepur Road, Lahore
147	35051090	Dextrene and other modified starch (Preparations)	For Textile Industry			Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900
148	35061000	Adhesive Glue	PVA Base Glue Water & Solvent Based	White, Transparent or any colour	Adhesive	 Berger Paints Pakistan Limited, 28- Km Multan Road, Lahore. Indus Pencil Industries, B-54, Manghopir Road SITE Karachi Khawaja Adhesive Tapes (Pvt) Ltd., 4-H, Gulberg-III, Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
149	35069110	Hot Melt Adhesive	SU-600 SU-900	White Pellets & Light Yellow Pellets	Viscosity Thermosel, Temperature 170 C, 160 C Average (cps) 3500	 Pak Daehan, H. No. 29, Bhagat Pura Hussain Bakhsh Park New Shad Bagh, Lahore Intra-Keck (Pvt) Ltd., 112/2, Q.I.E., Kot Lakhpat, Lahore-54770
150	35069190	Hot Melt Adhesive	SU-600 SU-900	White Pellets & Light Yellow Pellets	Viscosity Thermosel, Temperature 170 C, 160 C Average (cps) 3500	Pak Daehan, H. No. 29, Bhagat Pura Hussain Bakhsh Park New Shad Bagh, Lahore
151	35069990	Pressure Sensitive Adhesive Glue	Water & Solvent Based	Transparent or any colour	Adhesive	Khawaja Adhesive Tapes (Pvt) Ltd., 4-H, Gulberg-III, Lahore
152	35079000	Enzymes	Textile grade			Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900
153	36020000	Prepared Explosive: (Super Balster, Balster, Super Breaker, Seismic, eplosive, Pre-Splitter	-	-	-	Biafo Industries Ltd., 1st Floor Biafo House, Plot No. 23, St No. 38-40, I&T Centre, G-10/4, Islamabad
154	36031000	Safety Fuse	-	-	-	Biafo Industries Ltd., 1st Floor Biafo House, Plot No. 23, St No. 38-40, I&T Centre, G-10/4, Islamabad
155	36032000	Detonators: (Plain, Electric, Seismic Electric, Milli Second Delay Electric, Half Second Delay Electric / Non Electric, Milli Second Delay Non Electric Detonator)	-	-	-	Biafo Industries Ltd., 1st Floor Biafo House, Plot No. 23, St No. 38-40, I&T Centre, G-10/4, Islamabad
156	36033000	Two Way Delays Relays	-	-	-	Biafo Industries Ltd., 1st Floor Biafo House, Plot No. 23, St No. 38-40, I&T Centre, G-10/4, Islamabad
157	36034000	Detonating Cord	-	-	-	Biafo Industries Ltd., 1st Floor Biafo House, Plot No. 23, St No. 38-40, I&T Centre, G-10/4, Islamabad
158	37013020	CTP/CTCP Printing plates	Aluminum Plates Lithographic	H18, H19, A1050, A1052	Si 0.037,Mn0.007, Cu 0.003 Fe0.30, Mg0.001, Zn 0.007, Al 99.56.	DuTech (Pvt) Limited, Plot No.18, Sector No. 28, Korangi Industrial Area, Karachi
159	37013030	Presensitized printing plates	Aluminum Plates Lithographic Thickness ranging from 0.15mm to 0.30mm. Packing in Corrugated cartons	Thickness 0.15mm: 450mm x 370mm (100 Plates); 500mm x 400mm (100 Plates); 900mm x 715mm (50 Plates) 900mm x 715mm (50 Plates) Thickness 0.20mm: 645mm x 510mm; 745mm x 585mm; 760mm x 603mm; 840mm x 603mm; 840mm x 603mm; 840mm x 625mm (all in 50 Plates). Thickness 0.24mm; 650mm x 550mm 715mm x 603mm; 650mm x 550mm x 550mm (50 Plates); 715mm (50 Plates); 715mm x 605mm (50 Plates); 715mm x 625mm (30 Plates); 914mm x 625mm (30 Plates); 914mm x 625mm (30 Plates); 914mm x 586mm (30 Plates); 914mm x 586mm (30 Plates); 914mm x 625mm (30 Plates); 914mm x 625mm (30 Plates); 914mm x 625mm (30 Plates); 915mm x 715mm (30 Plates); 915mm x 715mm (30 Plates); 925mm x 715mm (30 Plates); 914mm x 625mm (30 Plates); 1030mm x 70mm (20 Plates); 1030mm x 70mm (20 Plates); 1030mm x 70mm (20 Plates); <td>Si 0.037,Mn0.007, Cu 0.003 Fe0.30,Mg0.001,Zn 0.007, Al 99.56.</td> <td>DuTech (Pvt) Limited, Plot No.18, Sector No. 28, Korangi Industrial Area, Karachi</td>	Si 0.037,Mn0.007, Cu 0.003 Fe0.30,Mg0.001,Zn 0.007, Al 99.56.	DuTech (Pvt) Limited, Plot No.18, Sector No. 28, Korangi Industrial Area, Karachi
160	38062000	Sodium Resinates	рН 9 -12	Dark Brown Paste	Sodium Resinate	Nimir Resins Ltd., 14.5 KM, Lahore - Sheikhupura Road, Lahore
161	38069000	Thermoplastic Road Marking Paint Material	Solvent Base	Theromoplastic Resin Base	Hotmelt Road Marking Paint	Berger Paints Pakistan Limited, 28- Km Multan Road, Lahore.

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
162	38089110	i) Insecticides	Insect killer for flying & crawling types of insects in aerosol spray - 300 - 600ml	Filled in tin cans of various dia (52- 65mm) and various heights (170-320mm)	Active insecticide ingredients/Solvent and gas based	Nimir Industrial Chemicals Ltd., 14.8 KM, Sheikhupura Faisalabad Road, Lahore.
		ii) Aerosol Contact Insecticide/ Household Insecticide	Insecticide Aerosols are meant to kill flying and crawling insects when sprayed or dispersed in air.	Colorless liquid at room temperature Relative Density @ 15 °C 0.60 – 0.80	Mixtures of petroleum distillate solvents, corrosion inhibitors, insecticide actives & propellants. Contains actives that kill insects.	Mijokum (Pvt) Ltd., F-48 & F-52, Sector 50-C, Korangi, Karachi.
163	38089400	i) Hand Sanitizers & Disinfectant Spray ii) Multi-Surface Cleaner & Disinfectant	Hand & skin care germicide disinfectant in aerosol spray - 50ml - 300ml Cleaning agent for all hard washable surfaces with protection of Home & office from invasive viruses & germs.	Filled in aluminium/tin cans of various dia (35-53mm) and various heights (88- 240mm), Clear to variant colors liquid at room temperature. Density @ 25 °C 0.95 - 1.10 g/cm3	Ethanol/Germicides/Vitamins and gas based Alcohal Based Aqueous blend of surface-active materials & anti-bacterial agents suitable for cleaning & disinfecting hard surfaces.	 Nimir Industrial Chemicals Ltd., 14.8 KM, Sheikhupura Faisalabad Road, Lahore. Berger Paints Pakistan Limited, 28- Km Multan Road, Lahore. Mijokum (Pvt) Ltd., F-48 & F-52, Sector 50- C, Korangi, Karachi.
164	38099110	Printing gum	Main use is in printing applications where gums are used to increase the medium viscosity enabling localized coloration.	May be solid or liquid at room temperature	Food grade Non-toxic Non-corrosive Chemical resistant	 ASF Pakistan (Pvt.) Ltd., 46-A, Block – 6, P.E.C.H.S, Karachi – 75400 Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900 Nimir Resins Ltd., 14.5 KM, Lahore - Sheikhupura Road, Lahore ICI Pakistan, 63, Mozang Road, Lahore 54000 Universal Chemicals, B-45, Estate Avenue, S.I.T.E, Karachi
165	38099190	Dyeing Auxiliaries and Finishing Agents	Dyeing and Finishing agents are used to impart desired effect on textiles. Use of agents facilitate the dyeing and finishing of the fabrics.	May be solid or liquid at room temperature	Improve the performance of the dyeing process and imparts desirable aesthetic to the treated fabric.	 BASF Pakistan (Pvt.) Ltd., 46-A, Block – 6, P.E.C.H.S, Karachi – 75400 Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 4900 Nimir Resins Ltd., 14.5 KM, Lahore - Sheikhupura Road, Lahore
166	38099200	Paper Chemicals (Surface Sizing Agent)/Finishing Agents	 15 - 20% NVM, Sizing agent for various types of papers i.e. packaging paper, white board coated paper and food packaging etc. Finishing agents (dye-carriers) for textile and paper industry 	White Thin Emulsion Light / Dark Brown liquid	AKD Emulsion/ Cationic Styrene Acrylic emulsion	 Nimir Resins Ltd., 14.5 KM, Lahore - Sheikhupura Road, Lahore Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900
167	38099300	Finishing agents	Finishing agents are used to impart desired effect on textiles. Use of agents facilitate finishing of the fabrics.	May be solid or liquid at room temperature	Imparts desirable aesthetic to the treated fabric.	 BASF Pakistan (Pvt.) Ltd., 46-A, Block – 6, P.E.C.H.S, Karachi – 75400 Archroma Pakistan Ltd. 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900 Gulf Chemicals ((Pvt) Limited, Plot No. 80, Sector 7-A, Korangi Industrial Area, Karachi Intra-Keck (Pvt) Ltd., 112/2, Q.I.E., Kot Lakhpat, Lahore-54770
168	38123900	PVC Liquid Stabilizer - Barium Cadmium zinc - Barium Zinc - Potassium Zinc Kicker	Sp. Gravity : 9.5, Acid Value;, <1	Yellowish Liquid	Metal Salts of Barium, Cadium, potassium, and zinc	A.T.S Synthetic (Pvt) Ltd., 4-Km, Kacha Road, Kahna Nau, Lahore.
169	38140000	Organic Composite Solvents and Thinners	Organic Hydrocarbon Compound.	Dilution & smooth application.	Rehology control & adjustment of the Paint according to various enviornment.	 Kansai Paint (Pvt) Ltd., 139-CCA, Sector DD, Phase IV, Defence Housing Authority, Lahore Berger Paints Pakistan Limited, 28- Km Multan Road, Lahore.
170	38159000	Catalyst	Sp. Gravity: 1.10, Acid Value;, <1 OH value: 216, Viscosity: 100 Cps	Slightly Yellowish Liquid	Mixture of Amine and short chain glycol	A.T.S Synthetic (Pvt) Ltd., 4-Km, Kacha Road, Kahna Nau, Lahore.

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
171	38160000	Refractory cements, mortars, concretes and similar compositions, other than products of heading 38.01.	Tap Hole Repair Mass & Mastic Tubes	Tap Hole Repair Mass: Specific Gravity:3.0 min Cold Crushing Strength (kg/cm2):250 min Grain Size:0 - 3 mm Bulk density (Kg/dm3): 2.70 min Mastic Tubes: LOI(%):45 max Maximum Grain Size:(-) 60 BS Mesh	$\begin{array}{l} \hline { Tap \ Hole \ Repair \ Mass:} \\ MgO(\%): 91 \ min, \ Al_2O_3(\%): 0.8 \ max, \\ Fe_2O_3(\%): 1.8 \ max, \ CaO(\%): 2.5 \ max, \\ SiO_2(\%): 4.5 \ max \\ \hline { Mastic \ Tubes:} \\ C(\%): 25 \ min, \ Al_2O_3(\%): 30 \ min, \\ SiC \ (\%): 03 \ min, \ SiO_2(\%): 15 \ max \\ K_2O + Na_2O(\%): 0.2 \ max \\ \end{array}$	Bhanbhore Ceramics Industries, Plot DSU-18, Pakistan Steel Down Stream Industrial Estate, Bin Qasim Karachi
172	38231100	Acid, stearic	IV 1.0 ~ 3.0, Melting point 61 ~ 65, Specific Gravity 0.86	Small Flakes, colour: White	С ₁₇ H ₃₃ COOH	 Nimir Industrial Chemicals Ltd., 14.8 KM, Sheikhupura Faisalabad Road, Lahore. Gamalux Oleochemicals (Pvt.) Ltd. A-8, NWIZ, Port Qasim Industrial Area, Bin Qasim, Karachi
173	38231910	Acid oils for refining	Palm fatty acid distillate (PFAD)	Colour 5 ~ 6, -1, Melting point48 ~ 52	Acid Value 190 Min.	Gamalux Oleochemicals (Pvt.) Ltd. A-8, NWIZ, Port Qasim Industrial Area, Bin Qasim, Karachi
174	38231930	Acid oils for refining	Fatty Acid Distilled (FAD) 92% to 99%, IV 30 ~ 55	Colour 5 ~ 6, -1, Melting point 45 ~ 58	Acid Value 190 Min.	 Nimir Industrial Chemicals Ltd., 14.8 KM, Sheikhupura Faisalabad Road, Lahore. Gamalux Oleochemicals (Pvt.) Ltd. A-8, NWIZ, Port Qasim Industrial Area, Bin Qasim, Karachi
175	38231990	Distilled Fatty Acid	Acid Value: 200-215, Iodine Value: 38-44, Melting Point: 50±2, Saponification Value = 200-216.	White solid material	Distilled fatty acid blend	Nimir Industrial Chemicals Ltd., 14.8 KM, Sheikhupura Faisalabad Road, Lahore.
176	38244000	Concrete Curing Compound	Concrete curing compound are suitable for spray application to freshly poured concrete. The resultant film retains sufficient moisture in the concrete to ensure full hydration of the cement; essential for optimum strength development.	Milky liquid at room temperature. Density @ 25 °C 0.95 - 1.05 g/cm3	Synergistic mixture of aqueous wax emulsion & surface-active materials. It is recommended on freshly poured concrete surfaces for high curing efficiency.	Mijokum (Pvt) Ltd., F-48 & F-52, Sector 50-C, Korangi, Karachi.
177	38246000	Sorbitol Solution	$C_6H_{14}O_6$	A Clear Viscouse Syrup having sweet taste	H - 5.0 - 7.0, Brix - 66 - 68, Ash - 0.1%	Habib Rice Products Ltd., 2nd Floor, UBL Building, I.I. Chundrigar Road, Karachi
178	38249950	Correction Pen	With liquid ink			Indus Pencil Industries, B-54, Manghopir Road SITE Karachi
179	38249993	Coated or Precipated Coated or Treated Calcium Carbonate	Top Cut 3 μm-50 μm	Fine Powder	CACO3	 Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore Omya Pack (Pvt) Ltd., Kot Radha Kishan Road, Kasur
180	38249999	i) Antifoaming Agent/Defoamer	A mineral oil based defoamer for aqueous systems. It is typically applied in aqueous coating systems, wood stains, varnishes, printing inks, textile & adhesive	Opaque white to pale yellow liquid at room temperature. Density @ $25 ^{\circ}$ C 0.85 - 0.95 g/cm3	defoaming efficiency.	Mijokum (Pvt) Ltd., F-48 & F-52, Sector 50-C, Korangi, Karachi.
		ii) Filler Masterbatch	Mineral filler e.g. CaCO ₃ based plastic granulated material	Solid plastic color component melting range 150-280	Combination of plastic resins, additives and mineral fillers	Bin Rasheed Color & Chemical Mfg Co., 10 Abbot Road, Lahore
181	39012000	HDPE Fittings Butt Fusion type	63mm to 315mm Dia Piping	- Strong - Light weight - Easy jointing - Durable	Food grade Non-toxic Non-corrosive Chemical resistant	New Tech, Suit 4 & 5, 2nd Floor, Rehman Plaza, I-10 Markaz, Islamabad.
182	39031100	Polystyrene expansible, in primary forms	(i) Plastic foaming grade(ii) Plastic moulding grade(iii) Plastic extrusion grade	Resins and Granules	Polymer	Pak Petrochemical Industries (Pvt) Ltd., Polymer House, Survey No. 136, 25th km, on Main National Highway, Karachi-75030
183	39031910	General purpose polystyrene (GPPS)	(i) Plastic moulding grade (ii) Plastic extrusion grade	Resins and Granules	Polymer	Pak Petrochemical Industries (Pvt) Ltd., Polymer House, Survey No. 136, 25th km, on Main National Highway, Karachi-75030
184	39031920	High Impact Polystyrene (HIPS)	(i) Plastic moulding grade (ii) Plastic extrusion grade	Resins and Granules	 Polymer with more than 95% styrene Co polymer with less than 95% styrene 	Pak Petrochemical Industries (Pvt) Ltd., Polymer House, Survey No. 136, 25th km, on Main National Highway, Karachi-75030

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
185	39032000	Styrenated Acrylic	Stryenated Acrylic Emulsion , used for a wide range of products like paint, coatings etc	Liqued at room temperature	Acrylate polymers upon drying form films that yield desired properties on the substrate	Berger Paints Pakistan Limited, 28- Km Multan Road, Lahore.
186	39039010	Styrene Acrylic Emulsion	49 - 51 % NVM in Water	Milky white thick liquid	Styrene Acrylic binder for emulsion paints, Opacifying agent, Mortor Modifier & Textile printing binder.	Nimir Resins Ltd., 14.5 KM, Lahore - Sheikhupura Road, Lahore
187	39041090	Poly Vinyl Chloride (PVC) Resin	Suspension	Appearance Color White Volatile Matter 0.4% wt max Particle size 40 mesh pass 100% wt min Particle Size 270 mesh pass 3% wt max	Polyvinyle Chloride , C_2H_3Cl , is an inert material, it does not react with most chemicals and solvents. Resistant to Acids, bases, slats and most solvents. Partially soluble in acetone.	Engro Polymer & Chemicals Limited, 16th Floor, The Harbor Front Building, HC # 3, Marine Drive, Block-4, Clifton, Karachi
188	39042200	PVC not mixed with other substances, plasticised PVC Compound (Plasticized)	(PVC Compound) International /National Standard (Cable Grade only)/ BSS 7655	Granules	C ₂ H ₃ C ₁	 Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore Atlas Rubber & Plastic Industries, 9th Floor, Textile Plaza, Mumtaz Hassan Road Karachi – 74000 Bismillah Plastic Works, Sohail Manzil, Street No. 30 Sector "F" Allama Iqbal Road, Manzoor Colony Karachi Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore Pakistan Cables Limited, B-21, SITE, P.O. Box No.5050, Karachi - 75700
189	39051200	Vinyl Acetate Copolymers	Vinyl acetate-acrylic copolymers, emulsion products that are used for a wide range of applications including paints, bond coats, binders, pigmented paper coatings, textiles, and nonwovens	Liquid at room temperature	Crosslink to form film that imparts desirable properties to the treated surface.	 Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900 Nimir Resins Ltd., 14.5 KM, Lahore - Sheikhupura Road, Lahore SRC (Pvt) LTD, 3-KM Bulhar Road, off 22-km Ferozpur Road, Rohi Nala, Lahore Berger Paints Pakistan Limited, 28- Km Multan Road, Lahore.
190	39052100	Polyvinyl acetate	Polyvinyl acetate polymers, emulsion products that are used for a wide range of applications including paints, bond coats, binders, pigmented paper coatings, textiles, and nonwovens	Liquid at room temperature	Crosslink to form film that imparts desirable properties to the treated surface.	 Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900 SRC (Pvt) LTD, 3-KM Bulhar Road, off 22- km Ferozpur Road, Rohi Nala, Lahore Berger Paints Pakistan Limited, 28- Km Multan Road, Lahore. Nimir Resins Ltd., 14.5 KM, Lahore - Sheikhupura Road, Lahore
191	39053000	Polyvinyl Alcohol	For paint and wood furniture industry			Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900
192	39059990	Glue/Adhesives/Binders	For paint, wood furniture and paper industry			Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900
193	39069030	Pigment thickener	Pigment thickener			 1) BASF Pakistan (Pet,) Ltd., 46-A, Block – 6, P.E.C.H.S, Karachi – 75400 2) Nimir Resins Ltd., 14.5 KM, Lahore - Sheikhupura Road, Lahore 3) Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900 4) ICI Pakistan Limited, 63, Mozang Road, Lahore 54000 5) T & N Chemical, 12.5 KM Sitara Road, Faisalabad
194	39069040	Dispersing Agent	20-45 % NVM	Light yellow to yellow clear liquid	Polyacrylate and Styrene/Maleic anhydride based	 Nimir Resins Ltd., 14.5 KM, Sheikhupura Road, Lahore Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company	
195	39069090	i) Acrylic polymers	Belong to a group of polymers based on acrylic acid, methacrylic and their esters. They are noted for their transparency, resistance to breakage, and elasticity. They are also commonly known as acrylics or polyacrylates.		form films upon drying that yield desired properties on the substrate	 Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900 Nimir Resins Ltd., 14.5 KM, Lahore - Sheikhupura Road, Lahoree BASF Pakistan (Pvt.) Ltd., 46-A, Block – 6, P.E.C.H.S Karachi – 75400 Sandal Dyestuff Industries Ltd., 4 KM Chak Jhumra Sangla Hill Road, Faisalabad SRC (Pvt) LTD, 3-KM Bulhar Road, off 22- km Ferozpur Road, Rohi Nala, Lahore Berger Paints Pakistan Limited, 28- Km Multan Road, Lahore. 	
		ii) Acrylic Resins (2 Component Resins)	50 - 70% NVM in aromatic solvents	Clear Colourless thick Liquid	Thermoset, Thermoplastic & Acrlic Polyol for 2-k Coatings	Nimir Resins Ltd., 14.5 KM, Lahore - Sheikhupura Road, Lahore	
		iii) Acrylic Emulsions	49 - 51 % NVM in Water	Milky white thick liquid	Acrylic binder for emulsion paints		
196	39073000	 Epoxide in primary forms 	Electrostatic Coating Powder			 Oxyplast Pakistan (Pvt.) Ltd., Silver House, 11/E, Block-6, P.E.C.H.S., Karachi. Nimir Resins Ltd., 14.5 KM, Lahore - Sheikhupura Road, Lahore 	
		ii) Fusion Bonded Epoxy (FBE)	Jotapipe & Corro-Coat (Anti-Corrosion Coating for Piping)	1350-1500G/L >0.5% Moisture Contents Hardness Avg. 85 (ASTM. STD)	Polarized Cracking Pass Impact resistance >1.5J	 Jotun Powder Coatings Pakistan (Pvt) Ltd., 2 KM Defence Road, Off 9 KM Raiwind Road, Adj. Valancia Homes Gate, Lahore Nimir Resins Ltd., 14.5 KM, Lahore - Sheikhupura Road, Lahore Berger Paints Pakistan Limited, 28- Km Multan Road, Lahore. 	
		iii) Epoxy Resin ER-12P, ER-20P	Solid Epoxy Resin	Granular Solid	Epoxide	Premier Coating Resin (Pvt) Ltd.; C-42, SITE	
			Liquid Epoxy Resin	Liquid	Epoxide	Super Highway Industrial Area Scheme # 33, Karachi	
197	39075000	Resins, alkyd, in primary forms	Viscocity 3-1000 poises Acid Value less than 12	Colour Max 10GH	Esters	 Nimir Resins Ltd., 14.5 KM, Lahore - Sheikhupura Road, Lahore Nimir Chemicals Pakistan Ltd., 14.8 Km, Sheikhupura-Faisalabad Road, Mouza Ghikki Distt. Sheikhupura Berger Paints Pakistan Limited, 28- Km Multan Road, Lahore. 	
198	39076110	Polyethylene terephthalate in primary (Having a viscosity number of 78 ml/g or higher)	Polyester Chips - Yarn and Film grade	Yarn and Film Grade		 Gatron (Industries) Limited, 11th Floor, G&T Tower No. 18, Beaumont, Civil Lines – 10, Karachi. Novatex Ltd., Ground Floor, G&T Tower # 18, Beaumont Road, Civil Lines - 10, Karachi - 75530 	
199	39076120	(Having a viscosity number of 78 ml/g or higher)	Polyester Chips - Bottle grade (Pet Resin)	Bottle grade (Pet Resin)		 Gatron (Industries) Limited, 11th Floor, G&T Tower No. 18, Beaumont, Civil Lines – 10, Karachi. Novatex Ltd., Ground Floor, G&T Tower # 18, Beaumont Road, Civil Lines - 10, Karachi - 75530 	
200	39076910	Other Yarn and Film Grade (Having a viscosity number of 78 ml/g or higher)	Polyester Chips Yarn and Film Grade	Yarn And Film Grade	Polyester Resin made from PTA & MEG with I.V. 0.6 to 0.68 in Amorphous form capable of being upgraded to PET Bottle Grade.	 Gatron (Industries) Limited, 11th Floor, G&T Tower No. 18, Beaumont, Civil Lines – 10, Karachi. Novatex Ltd., Ground Floor, G&T Tower # 18, Beaumont Road, Civil Lines - 10, Karachi - 75530 Nimir Resins Ltd., 14.5 KM, Lahore - Sheikhupura Road, Lahore 	

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
201	39076920	Other Bottle Grade (having a viscosity number of 78 ml/g or lower)	Polyester Chips - Bottle grade (Pet Resin)	Bottle grade (Pet Resin)		 Gatron (Industries) Limited, 11th Floor, G&T Tower No. 18, Beaumont, Civil Lines – 10, Karachi. Novatex Ltd., Ground Floor, G&T Tower # 18, Beaumont Road, Civil Lines - 10, Karachi - 75530
202	39076990	Other (having a viscosity number of 78 ml/g or lower)	Polyester Chips Amorphous	Plastic Resin in Granules		 Novatex Ltd., Ground Floor, G&T Tower # 18, Beaumont Road, Civil Lines - 10, Karachi - 75530 Nimir Resins Ltd., 14.5 KM, Sheikhupura Road, Lahore
203	39079100	Polyesters, unsaturated, in primary forms	60 - 70 % NVM in Monomers	Clear & Hazy Yellow Thick Liquid	Thermoset Unsaturated Polyester Resins	 BASF Pakistan (Pvt.) Ltd., 46-A, Block – 6, P.E.C.H.S, Karachi – 75400 Nimir Resins Ltd., 14.5 KM, Sheikhupura Road, Lahore
204	39079900	i) Powder Coating Pure Polyester	Corro-Coat PE (Exterior Polyester Powder Coating	Film Hardness >70 (EN ISO 2815) 100% Adhesion	Exceed 5mm without Film Cracking Salt Spray Resistance Excellent	1) Jotun Powder Coatings Pakistan (Pvt) Ltd., 2 KM Defence Road, Off 9 KM Raiwind
		ii) Epoxy Polyester Hybrid	Corro-Coat MX (Interior Hybrid Powder Coating	Film Hardness >80 (EN ISO 2815) 100% Adhesion	Exceed 60 Inch Pounds without film	Road, Adj. Valancia Homes Gate, Lahore
		iii) PE – F Polyester Facade	Corro-Coat PE-F (Exterior Durable Polyester Powder Coating	Film Hardness >80 (EN ISO 2815) 100% Adhesion	2.5 Nm without film cracking	 Nimir Resins Ltd., 14.5 KM, Lahore - Sheikhupura Road, Lahore
		iv) Polyol (Polyurethane Pre- Polymer for PU Sole)	Sp. Gravity : 1.18, Acid Value;, <1 OH value: 80, Viscosity: 1000 Cps	Slightly Yellowish Liquid	Adipate of Dicarboxic acid	A.T.S Synthetic (Pvt) Ltd., 4-Km, Kacha Road, Kahna Nau, Lahore.
		v) Polyester Resin (50:50, 70:30, 93:07, 60:40, 80:20, 90:10)	Saturated Polyester Resin	Granular Solid	Carboxlated Terminated	Premier Coating Resin (Pvt) Ltd. C-42, SITE Super Highway Industrial Area Scheme # 33, Karachi
205	39089000	Polyamide Resin (H-140, H-115, H- 125)	Liquid Hardener for Epoxy	Liquid	Amine	Premier Coating Resin (Pvt) Ltd. C-42, SITE Super Highway Industrial Area Scheme # 33, Karachi
206	39091090	Urea Formaldehyde Resin	58-62 % NVM	Water white thick liquid	Butylated Urea formaldehyde resin in solution form	Nimir Resins Ltd., 14.5 KM, Lahore - Sheikhupura Road, Lahore
207	39092000	Resins , melamine, in primary forms	Viscosity 75 Poises Acid Value less than 2	Colour Water White	Amino	 Nimir Resins Ltd., 14.5 KM, Lahore - Sheikhupura Road, Lahore Berger Paints Pakistan Limited, 28- Km Multan Road, Lahore.
208	39094000	Phenolic Formaldehyde Resin	69-71 % NVM	Reddish thick liquid	Phenol formaldehyde resin in solution form	Nimir Resins Ltd., 14.5 KM, Lahore - Sheikhupura Road, Lahore
209	39095000	Isocynate (Polyurethane Pre-Polymer for PU Sole)	Sp. Gravity : 1.15, Acid Value;, <1 NCO value: 23, Viscosity: 400 Cps	Slightly Yellowish Liquid	Oligimers of polyol, pure MDI and Modified MDI	 A.T.S Synthetic (Pvt) Ltd., 4-Km, Kacha Road, Kahna Nau, Lahore. A.T.S Synthetic (Pvt) Ltd., 4-Km, Kacha Road, Kahna Nau, Lahore.
210	39100000	Antifoam Silicon Base	10 - 20 % NVM in Water	Milky white thick liquid	Defoamer Silicon base	 Nimir Resins Ltd., 14.5 KM, Sheikhupura Road, Lahore Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900
211	39119000	Fixing Agent	For Textile			Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900
212	39122090	Nitrocellulose in primary forms	Used in leather industry to impart special finish	Mainly liquid at room temperature.	Based on Nitrocellulose	 Archroma Pakistan Ltd., 1-A/1, Sector 20, Korangi Industrial Area, Karachi – 74900 BASF Pakistan (Pvt.) Ltd., 46-A, Block – 6, P.E.C.H.S, Karachi – 75400 SRC (Pvt) LTD, 3-KM Bulhar Road, off 22- km Ferozpur Road, Rohi Nala, Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
213	39172100	i) Tubes, Pipes & Hoses, Rigid of Polymers of Ethylene	ISO4437 ISO 4427 DIN 8074 ASTM 2513	Dial 20mm to 630mm and ¾" to 12" Length of coils as per customer requirement or straight lengths upto 40 feet	Ethylene	 Dadex Eternit Ltd., Dadex House, 34-A/1, Block-6, P.E.C.H.S. Shahrah-e-Faisal Karachi Sun International Co. (Pvt) Ltd., 62 CMA Colony Street #4, Lahore Cantt. Lahore Premier Cables (Pvt) Ltd., 43-E, Block 6, P.E.C.H.S., Behind FedEx, Off Razi Road, Shahrah-e-Faisal, Karachi
		ii) PE Gas/Water Pipe Fittings	SNGPL Spec, ASTM-2513, ASTM-D-2683 SSGC Spec. ISO-4437 ISO-8085 EN-1555	Dia: 3/4 inch to 6 inch Length: 12 inch to 36 inch PE Spec: PE-80/100 Steel Spec: ASTM & API 5L Dia: 20mm to 180mm Length: 12 inch to 36 inch PE Spec: PE-80/100 Steel Spec: ASTM & API 5L	Melt Flow 0.8 gm/10mn, Density >0.940 to 0.947 to gm/cm ³ Melt Flow 1.55 gm/10mn, Density >0.940 to 0.955 to gm/cm ³	 Mechfit Industries, 124-IV, E-Block Model Town, Lahore Swabis Polyplast, A-496, St No. 9, Block "N", North Nazimabad Karachi Premier Cables (Pvt) Ltd., 43-E, Block 6, P.E.C.H.S., Behind FedEx, Off Razi Road, Shahrah-e-Faisal, Karachi
		iii) Blow Moulded Cans/ Jars	HDPE Material	0.25, 0.5 and 1 litre sizes	Density 942	
		iv) High Density/Medium Density Polyethylene (HDPE/MDPE) pipes	12 mm to 1600 mm diameter 1.8 mm to 103.7 mm	As per Standard	As per Standard	International Industries Ltd., LX 15-16, Landhi Industrial Area, Karachi
214	39172200	 Hoses, polypropylene, rigid 	Din 8077	Diameter 20mm to 110mm		 Sun International Co. (Pvt) Ltd., 62 CMA Colony Street #4, Lahore Cantt. Lahore Premier Cables (Pvt) Ltd., 43-E, Block 6, P.E.C.H.S., Behind FedEx, Off Razi Road, Shahrah-e-Faisal, Karachi
		ii) Poly propylene random co- polymer (PPRC) Pipes for Hot and Cold/Chilled water	20 mm to 630 mm diameter 2.8mm to 35.7 mm Wall Thickness	As per Standard	As per Standard	International Industries Ltd., LX 15-16, Landhi Industrial Area, Karachi
		iii) PPF Water Filter Cartridge 10' S,20' S, 30' S, 40' S, 20' Jumbo		Melt Folw 23% Density 0.9	PP TANSEE	International Caps Company, F-202, Phase II, SITE II, Super High Way, Karachi
215	39172390	Glass resinforced Polyester (GRP) Pipe	Pipe Size Range 300 mm to DN 2000 mm			Hi-Tech Pipe & Engineering Industries (Pvt) Ltd., Plot # X-22, Extension Area, S.ITE, Kotri, Sindh
216	39172900	i) Glass Reinforced Epoxy (GRE) Pipes	20 ft. upto: 18" dia (Pipe Size Range 300 mm to DN 2000 mm) For Tube Well Pipes etc.	Food Grade & other grades		 Creative Engineering (Pvt) Ltd., 160/ S, Q.I.E. Kot Lakhpat Lahore Hi-Tech Pipe & Engineering Industries (Pvt) Ltd., Plot # X-22, Extension Area, S.ITE, Kotri, Sindh
		ii) Fiber Reinforced Polyester (Fiberglass) Ladder	Straight Ladder up to 16 ft Extendable Ladder ranging from 10ft to 70 ft A-Frame Ladder with light, medium & heavy duty	As per standard	As per standard	 Creative Engineering (Pvt) Ltd., 160/ S, Q.I.E. Kot Lakhpat Lahore Fibre Craft Industries, Canal Bank Hanif Park, Harbanspura Lahore - 54850
217	39174000	Fittings, plastic/ PPRC	Joints, elbows, flanges etc. ASTM 2513	As per API 5LB for steel As per ASTM 2513 for Polyethylene	As per API 5LB for steel As per ASTM 2513 for Polyethylene	 Swabis Polyplast, A-496, St No. 9, Block "N", North Nazimabad Karachi International Industries Ltd., LX 15-16, Landhi Industrial Area, Karachi
218	39181000	Polyvinyl Chloride floor covering	PVC Flooring			 A.T.S Synthetic (Pvt) Ltd., 4-Km, Kacha Road, Kahna Nau, Lahore. Green Earth Recycling Pakistan, 208/A Street # 5, Cavalry Grounds, Cantt. Lahore
219	39191010	Double Sided Tape	Foam type: Thickness 200 to 1200 microns PET Type: Thickness 15 to 500 microns	White colour or with any colour		 Khawaja Adhesive Tapes (Pvt) Ltd., 4-H, Gulberg-III, Lahore Osaka Electric & Industrial Co., Ground Floor, Plot No. Dp-10, Sector 12-D, North Karachi Industrial Area, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
220	39191020	PVC Electric Insulation Tape - Width not exceeding 20 cm - (Retail Packing)	Thickness from 15 microns to 200 microns	Black, red, yellow, blue & white colour		 Khawaja Adhesive Tapes (Pvt) Ltd., 4-H, Gulberg-III, Lahore Osaka Electric & Industrial Co., Ground Floor, Plot No. Dp-10, Sector 12-D, North Karachi Industrial Area, Karachi
221	39191030	Stationery Tape	Thickness from 15 microns to 80 microns	Transparent / with any colour		 Khawaja Adhesive Tapes (Pvt) Ltd., 4-H, Gulberg-III, Lahore Osaka Electric & Industrial Co., Ground Floor, Plot No. Dp-10, Sector 12-D, North Karachi Industrial Area, Karachi
222	39191090	i) Detectable Underground Tape	LDPE Sheet with Aluminium foil	Thickness 4-7 mils, Elongation 80%, Tensile 20 lb/ inch	Al thinkness 0.3 mils	Mechfit Industries, 124-IV, E-Block Model Town, Lahore
		ii) Sef Adhesive Tape	Thickness from 15 microns to 80 microns	Transparent/ with any colour		Khawaja Adhesive Tapes (Pvt) Ltd., 4-H, Gulberg-III, Lahore
223	39199010	Self Adhesive (Transparent/ BOPP/OPP) Tape	Thickness from 15 microns to 80 microns	Transparent / with any colour		 Khawaja Adhesive Tapes (Pvt) Ltd., 4-H, Gulberg-III, Lahore Osaka Electric & Industrial Co., Ground Floor, Plot No. Dp-10, Sector 12-D, North Karachi Industrial Area, Karachi
224	39199090	i) Self Adhesive BOPP/OPP Tape - Width exceeding 20cm-Log Rolls	Thickness from 15 microns to 80 microns	Transparent / with any colour	-	 Khawaja Adhesive Tapes (Pvt) Ltd., 4-H, Gulberg-III, Lahore Osaka Electric & Industrial Co., Ground
		ii) PVC Electric Insulation Tape -Width exceeding 20cm - (Log Roll)	Thickness from 15 microns to 200 microns	Black, red, yellow, blue & white colour		Floor, Plot No. Dp-10, Sector 12-D, North Karachi Industrial Area, Karachi
225	39202010	Biaxially Oriented Polypropylene (BOPP) film, all category except metallized		BOPP Films	Polymer	Tri-Pack Films Limited, House No 18, Sir Abdullah Haroon Road, Adjacent Marriot Hotel, Karachi
226	39202020	Biaxially Oriented Polypropylene (BOPP) film, printed		BOPP Films	Polymer	Tri-Pack Films Limited, House No 18, Sir Abdullah Haroon Road, Adjacent Marriot Hotel, Karachi
227	39202030	i) BOPP Film	Capacitor grade: width of roll 30mm to 120mm Thickness: 04 to 12 microns	Metallized	Ash contents ≤ 30 PPM	Khawaja Electronics (Pvt) Ltd., 4-H, Gulberg-III, Lahore
		ii) Biaxially Oriented Polypropylene (BOPP) film, Pearl & metallized		BOPP Films	Polymer	Tri-Pack Films Limited, House No 18, Sir Abdullah Haroon Road, Adjacent Marriot Hotel, Karachi
228	39202040	 i) Laminate for Flexible Packaging ii) Biaxially Oriented Polypropylene (BOPP) film, laminated 	Plastic based laminates used for Packaging	Solid in roll form or bags	Polymer	 Packages Convertors Ltd., Shahrah-e-Roomi, P.O. Amer Sidhu, Lahore-54760 Tri-Pack Films Limited, House No 18, Sir Abdullah Haroon Road, Adjacent Marriot Hotel, Karachi
229	39202090	i) Polypropylene	PP/PE sheet 1.5mm to 12mm (6**4' Sheet) Flat sheeting combination of Polyproylene and Polyethylene. Thickness ranging from 1.5mm to 12mm and width upto 4 feet	Can be customized according to customer requirements		Green Earth Recycling Pakistan, 208/A Street # 5, Cavalry Grounds, Cantt. Lahore
		ii) Others, Cast Polypropylene (CPP) film, all category	**	CPP Films	Polymer	Tri-Pack Films Limited, House No 18, Sir Abdullah Haroon Road, Adjacent Marriot Hotel, Karachi
230	39203000	Polystyrene plates, sheets, film,	 HIPS 1mm to 4mm (6*4" sheet) GPPS, Polystyrene Sheet Thickness 0.25 mm to 7.00 mm Width 48" Flat sheeting made from Polystyrene (PS), High Impact Polystyrene (HIPS), General Purpose Polystyrene (GPPS), Acrylic (PMMA), Acrylonitrile Butadiene Styrene (ABS), a combination of HIPS and GPPS and a cobination of ABS and PMMA. Thickness ranging from 1 mm to 10 mm and width upto 4.5 feet 		Polystyrene sheet is a high impact grade of polystyrene with improved stress crack resistance, developed for extrusion and thermoforming applications, especially for the refrigerator industry in various thickness and sizes.	 Lucky Plastic Industries (Pvt) Ltd., Polymer House E-110 Main Boulevard Defence, Lahore Cantt, Lahore. Cool Industries (Pvt) Limited, 9th KM Multan Road, Hanjarwal Lahore Green Earth Recycling Pakistan, 208/A Street # 5, Cavalry Grounds, Cantt. Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
231	39204300	Polyvinyl Chloride plates, sheets,	PVC Flexible Sheet Width = Upto 132 Inches Minimum Thickness = 30Micron, Maximum Thickness = 2000Micron, Length = As per customer requirement		-	A.T.S Synthetic (Pvt) Ltd., 4-Km, Kacha Road, Kahna Nau, Lahore.
232	39204910	i) Polyvinyl Chloride plates, sheets, rigid	Width 24" Thickness 50 to 500 Micron (PVC)		-	Lucky Plastic Industries (Pvt) Ltd., Polymer House E-110 Main Boulevard Defence, Lahore Cantt, Lahore.
		ii) PVC Rigid Sheet	Thickness = 0.05 mm to 0.8 mm, Width = 1520 mm, Color = Transparent / Any	As per standard	As per standard	A.T.S Synthetic (Pvt) Ltd., 4-Km, Kacha Road, Kahna Nau, Lahore.
		iii) Grounding Set	DD PD 21_2008 Insulation rating 11kV	As per standard	As per standard	Fibre Craft Industries, Canal Bank Hanif Park, Harbanspura Lahore - 54850
233	39204990	Polyvinyl Chloride plates, sheets,	Width 24" Thickness 50 to 500 Micron (PVC)			Lucky Plastic Industries (Pvt) Ltd., Polymer House E-110 Main Boulevard Defence, Lahore Cantt, Lahore.
234	39205900	Polyacrylic, other, plates, sheets,	Width Acrylic 1.5mm to 12mm 6*4			Lucky Plastic Industries (Pvt) Ltd., Polymer House E-110 Main Boulevard Defence, Lahore Cantt, Lahore.
235	39206200	BOPET Film (All types i.e. transparent, chemical coated, metalized, etc.)	Having thickness of various micron			 Novatex Ltd., Ground Floor, G&T Tower # 18, Beaumont Road, Civil Lines - 10, Karachi - 75530 Astro Plastics (Pvt) Ltd., 17-Banglore Town, Shahrah-e-Faisal, Karachi
236	39206310	Polyester rigid film	Micron 150 to 1800			Krystalite Products (Pvt) Ltd., 11th Floor, G&T Tower No. 18, Beaumont, Civil Lines - 10, Karachi.
237	39206900	BOPET Film (All types i.e. transparent, chemical coated, metalized, etc.)	Having thickness of various micron			 Novatex Ltd., Ground Floor, G&T Tower # 18, Beaumont Road, Civil Lines - 10, Karachi - 75530 Astro Plastics (Pvt) Ltd., 17-Banglore Town, Shahrah-e-Faisal, Karachi
238	39211200	Polyvinyl Chloride plates, sheets,	PVC Film		-	A.T.S Synthetic (Pvt) Ltd., 4-Km, Kacha Road, Kahna Nau, Lahore.
239	39211300	Polyurethane plates, sheets, film,	Polyurethane Sandwich Panels	Thickness from 60mm to 150mm		Pakistan Insulations Pvt. Ltd., 107 Business Avenue, PECHS Block-6, Karachi
240	39219090	i) Tooth paste tube Laminate	100-125 mic PE+Co-polymer laminated to foil 20-40 mic + PE + Co-polymer both sides. (Total thickness 290 to 300 mic)			Aluminum Processing Industries Int'l (Pvt) Ltd., D-76, S.I.T.E. Karachi
		ii) PVC Flex Vinyl/Banner	GSM = 240 gm to 610 gm, Width = 40 inch to 126 inch, Color = White / Any		-	A.T.S Synthetic (Pvt) Ltd., 4-Km, Kacha Road, Kahna Nau, Lahore.
		iii) PVC Geo Membrane	Thickness = 0.25 mm to 3 mm, Width = 84 inch to 132 inch, Color = Black / Any			
		iv) Other, Pet Sheet	Micron 150 to 1800 Width upto 1.8mm			Krystalite Products (Pvt) Ltd., 11th Floor, G&T Tower No. 18, Beaumont, Civil Lines - 10, Karachi.
241	39231000	Boxes, cases, plastic caps and plastic similar articles	Boxes, plastic, for conveyance or packing Range Ø44mm to 32 OZ			 Polycon Pakistan Pvt. Ltd., 62-CMA Officers Colony, 4th Street, Lahore Cantt. Lahore Krystalite Products (Pvt) Ltd., 11th Floor, G&T Tower No. 18, Beaumont, Civil Lines - 10, Karachi.
242	39233010	Bottle	Weight 17gm to 50.64gm, Neck 28mm I.V 85			Krystalite Products (Pvt) Ltd., 11th Floor, G&T Tower No. 18, Beaumont, Civil Lines - 10, Karachi.

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company	<u>Annex-I (</u>
243	39235000	Plastic caps	Plastic caps			 International Caps Company, 121/A, Ishaqabad, Sir Shah Mohd Suleman Road, Karachi-75900 Krystalite Products (Pvt) Ltd., 11th Floor, G&T Tower No. 18, Beaumont, Civil Lines - 10, Karachi. 	
244	39239010	Preforms	Made from PET Resin	All ranges including and above 11.5 grams.		 Gatron (Industries) Limited, 11th Floor, G&T Tower No. 18, Beaumont, Civil Lines – 10, Karachi. Novatex Ltd., Ground Floor, G&T Tower # 18, Beaumont Road, Civil Lines - 10, Karachi - 75530 	
245	39249000	Cans, plastic (Household)	10 ml to 40 litres.	-	Hydensity polyethylene, ABS, PP	Plasticans (Pvt) Ltd. 120/3 Industrial Estate, Kot Lakhpat Lahore	
246	39251000	Oil Storage Tanks		As per Customer Specification	As per Customer Specification	Spleen Manufacturing (Pvt) Ltd., 20-KM Ferozepur Road, Off 3/4 KM Asif Town # 2, Lahore	
247	39269099	i) Textile Spinning Ring Bobbin	Polycarbonate with glass fibre Polycarbonate –ABS Any Size with and without bush and ring	highly flexural strength -impact strength	polycarbonate glass fibre	Punjab Spring & Engg. Works, Chak no.65, Manga Road Near Makkah Sugar Mill.	
	l	ii) Ring Bobbin crate	Size (mm): 520x300x320 -CoPolypropylene		CoPolypropylene		
	i i	iii) Dyeing Cone & Cheese Cone iv) Mulching Film Nets	Any Size 15-30 micron	Rolls & Kgs	Polypropylene Polymer based	Pak Agro Packaging Ltd., Plot 23, Phase IV,	
249	40020000	, ,	2-4 ft width	-		Hattar Industrial Estate Haripur, KPK	
248	40030000	Rubber, reclaimed	PS: 1915 - 1987 ISO: 4633/ 1 - 1983	Natural or Synthatic rubber		Dadex Eternit Ltd., Dadex House, 34-A/1, Block- 6, P.E.C.H.S. Shahrah-e-Faisal Karachi	
249	40070010	Vulcanized Ruber	Use in Elastic	High Elongation	Homogenized Bland of Latex & different Chemical	Fintex Mfg. Crop. (Pvt) Ltd., Plot # G-17- 18,H.I.T.E, Hub, Balucistan	
250	40070090	Thread &Cord	Use in Elastic	High Elongation	Homogenized Bland of Latex & different Chemical	Fintex Mfg. Crop. (Pvt) Ltd., Plot # G-17- 18,H.I.T.E, Hub, Balucistan	
251	40091190	Pipes and tubing	All types, un-hardened vulcanized rubber excluding bearing API certification., Rubber hoses			 Longman Mills, Lahore, 14-N Industrial Area Gulberg-II Lahore-45660 Samad Rubber Works Ltd., 409-Ferozepur Road P.O. FC, College Lahore-54600 Darson Rubber Works Ltd., Darson Road, G.T. Road, P.O. Box 5, Wazirabad – 52000 	
252	40091200	i) Hoses, vulcanised rubber,	ASTM & SAE, with Fittings, excl hard rubber, with their fittings			Darson Industries Private Limited, Darson Road, P O Box 5, Wazirabad-52000	
		ii) Hoses, vulcanised rubber, not reinforced or Combined	Size ½", 3/8", length 3', 3.5', 4', 6' available for Nat Gas LPG, confirming to BS 669-1:1989 [Excluding High Pressure Hoses of over 30 PSI & having API Certification]			Tesla Industries Pvt. Ltd., Plot No. 81-F, St. 6, I- 10/3, Islamabad	
253	40101100	Belt Conveyors	5 Ton To 300 Ton / hour			TDFC (Pvt) Ltd., East Pharange Drainage, Millat Town, Millat Road, Faisalabad	
254		Conveyors Belts and Transmission Belts (of Vulcanized Rubber)	Belts from 25mm in width to 2300mm width with any length and thickness and number of plies. (as per customers requirements)		Heat Resistant and abrasion resistant	Chawla Rubber & Plastic Ind. (Pvt) Ltd., 43- Industrial Area, Township, Kot Lakhpat, Lahore	
255	40111000	Tyres	145/70R12, 145/80R12, 155/70R12, 165/70R12, 145/80 R13, 155/80R13, 185/70R13, 165/80R13, 165/65R13, 175/70R13, 185/65R14, 185/60 R15, 175/70R14, 195/65 R14, 195/65 R15, 175/65R15, 205/55R16, 215/55R16 for Motor Cars and 450- 12,600-12, 615-13, 165-13, motor cars/ station wagons			 The General Tyre & Rubber Co. of Pakistan Ltd., H-23/2, Landhi Industrial Trading Estate, Landhi, Karachi United Rubber (Pvt) Ltd., 70-Industrial Estate Jamrud Road Peshawar 	

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
256	40112011	Tyres	4.50-12, 6.50-14, , 6.00-16, 6.50-16, 7.00-16, 7.50-16, 145R12, 185R14, 195R14, 7.50 R16, 195R15, 205/70R15 for Light Trucks Commercial Vehicles, 450-12 8PR, 600-14, 650-14, 750- 16, for light trucks - 4.50-12, 6.50-14, 6.00-16, 1.75/80-16, 6.50- 16, 7.50-16, 185 R 14C, 195 R 14C, 750 R 16C			 The General Tyre & Rubber Co. of Pakistan Ltd., H-23/2, Landhi Industrial Trading Estate, Landhi, Karachi United Rubber (Pvt) Ltd., 70-Industrial Estate Jamrud Road Peshawar
257	40112019	Tyres	4.50-12, 6.50-14, , 6.00-16, 6.50-16, 7.00-16, 7.50-16, 145R12, 185R14, 195R14, 7.50 R16, 195R15, 205/70R15 for Light Trucks Commercial Vehicles, 450-12 8PR, 600-14, 650-14, 750- 16, for light trucks - 4.50-12, 6.50-14, 6.00-16, 1.75/80-16, 6.50- 16, 7.50-16, 185 R 14C, 195 R 14C, 750 R 16C			 The General Tyre & Rubber Co. of Pakistan Ltd., H-23/2, Landhi Industrial Trading Estate, Landhi, Karachi United Rubber (Pvt) Ltd., 70-Industrial Estate Jamrud Road Peshawar
258	40112019	Tyres,rubber,pneumatic	4.50-12, 5.00-12, 6.50-14, 7.50-16 Jeep, 6.00-16 Jeep, 6.00-9, 7.00-12 Light Truck & Jeep			Panther Tyres Ltd., Panther House, Aziz Avenue, Canal Bank, Jail Road, Lahore
259	40112091	Tyres	- 350-8, 400-8 for Rickshaw,Scooter - 8.25-20, 9.00-20, 10.00-20, 11.00-20 12.00-20, for heavy Trucks/Buses & Lorries			 The General Tyre & Rubber Co. of Pakistan Ltd., H-23/2, Landhi Industrial Trading Estate, Landhi, Karachi United Rubber (Pvt) Ltd., 70-Industrial Estate Jamrud Road Peshawar
260	40112099	Tyres	- 350-8, 400-8 for Rickshaw,Scooter - 8.25-20, 9.00-20, 10.00-20, 11.00-20 12.00-20, for heavy Trucks/Buses & Lorries			 The General Tyre & Rubber Co. of Pakistan Ltd., H-23/2, Landhi Industrial Trading Estate, Landhi, Karachi United Rubber (Pvt) Ltd., 70-Industrial Estate Jamrud Road Peshawar
261	40114000	Pneumatic Tyres	 i) For 2/3 Wheelers (Motorcyels, Scooters, Auto Rickshaws, Motorcycles Rickshaws, wheel barrow) ii) 2.25-17, 2.50-17, 2.50-18, 3.00-17, 4.00-8, 135-10 for Motorcycles & Rickshaws/Scooters iii) 100/90-18, 110/90-16, 2.25-17, 2.50-17, 2.50-18, 2.75-17, 2.75-18, 3.00-16, 3.00-17, 3.00-18, 3.50-10, 3.50-8, 90/90-12, 90/90-18 Motorcycle Front & Rear 			 Service Industries Ltd., Service House-2, Main Gulberg, Lahore The General Tyre & Rubber Co. of Pakistan Ltd., H-23/2, Landhi Industrial Trading Estate, Landhi, Karachi Crown Tyres Limited, Taj Chowk, Ahmad Pur Lama Road, Sadiq Abad District, Rahim Yar Khan. Panther Tyres Ltd., Panther House, Aziz Avenue, Canal Bank, Jail Road, Lahore
262	40115000	Pneumatic Tyres	bicycles (28"*1.50"); (26"*2.125"); (26"*2.125"); (16"*1.75"); (26"*2.125"); (26"*1.95"); (24"*1.95"); (20"*2.125"); (16"*2.125"); (26"*1.3/8"); (24"*1.3/8"); (20"*1.3/8")			Service Industries Ltd., Service House-2, Main Gulberg, Lahore
263	40117000	Tyres,rubber,pneumatic	12.4/11-24, 12.4/11-28, 12.4-24, 14.9/13-28, 15.5-38, 16.9/14- 30, 18.4/15-30, 7.50-20, 6.00-16 Tractor, 7.50-16 Tractor, 9.00- 20 Tractor Agriculture			Panther Tyres Ltd., Panther House, Aziz Avenue, Canal Bank, Jail Road, Lahore
264	40118000	Tyres,rubber,pneumatic	20.5-25, 23.5-25			Panther Tyres Ltd., Panther House, Aziz Avenue, Canal Bank, Jail Road, Lahore
265	40119010	Tyres,rubber,pneumatic	1.35-10, 4.00-8, 5.00-10 Rickshaw Front & Rear			Panther Tyres Ltd., Panther House, Aziz Avenue, Canal Bank, Jail Road, Lahore
266	40139010	Inner Tubes of Rubber	Truck/Bus 10.00-20, 11.00-20, 9.00-20			Panther Tyres Ltd., Panther House, Aziz Avenue, Canal Bank, Jail Road, Lahore
267	40131020	Inner Tubes of Rubber	12,13,14,16 , 450-12, 600-12, 615-13, 165-13 for vehicles			 Panther Tyre Ltd., Panther House, Aziz Avenue, Canal Bank, Jail Road, Lahore United Rubber (Pvt) Ltd., 70-Industrial Estate Jamrud Road Peshawar Crown Tyres Limited, Taj Chowk, Ahmad Pur Lama Road, Sadiq Abad District, Rahim Yar Khan.
268	40132000	Inner Tubes of Rubber	28*1-1/2,28*1-3/8 24*1-3/8,26*2-1.25 for bicycles			 Panther Tyres Ltd., Panther House, Aziz Avenue, Canal Bank, Jail Road, Lahore Service Industries Ltd., Service House-2, Main Gulberg, Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
269	40139010	Inner Tubes of Rubber	5.50-16, 6.00-16, 7.50-16 for Agricultural vehicles			 United Rubber (Pvt) Ltd., 70-Industrial Estate Jamrud Road Peshawar The General Tyre & Rubber Co. of Pakistan Ltd., H-23/2, Landhi Industrial Trading Estate, Landhi, Karachi
270	40139020	Inner Tubes of Rubber	Motorcycle & Scooter 2.25-17, 2.25-50-17, 2.50-75-17, 2.50-75- 18, 3.00-16, 3.00-17, 3.00-18, 3.50-10, 3.50-16, 3.50-8, 90/90-18			 Panther Tyres Ltd., Panther House, Aziz Avenue, Canal Bank, Jail Road, Lahore United Rubber (Pvt) Ltd., 70-Industrial Estate Jamrud Road Peshawar The General Tyre & Rubber Co. of Pakistan Ltd., H-23/2, Landhi Industrial Trading Estate, Landhi, Karachi Crown Tyres Limited, Taj Chowk, Ahmad Pur Lama Road, Sadiq Abad District, Rahim Yar Khan.
271	40139030	Inner Tubes of Rubber	600-14, 650-14 for Jeep			United Rubber (Pvt) Ltd., 70-Industrial Estate Jamrud Road Peshawar
272	40139090	Inner Tubes of Rubber	350-8, 400-8 for Rickshaws and Scooters Rickshaw 1.35-10, 4.00-8			 United Rubber (Pvt) Ltd., 70-Industrial Estate Jamrud Road Peshawar Service Industries Ltd., Service House-2, Main Gulberg, Lahore Panther Tyres Ltd., Panther House, Aziz Avenue, Canal Bank, Jail Road, Lahore
273	40161090	Textile Spinning Rubber Apron	Any Size with any Hardness	Ozone crack resistance -vegetable oil resistance -abrasion resistance -moisture resistance -tear resistance -antistatic resistance	Ozone crack resistance -vegetable oil resistance -abrasion resistance -moisture resistance -tear resistance -antistatic resistance	Punjab Spring & Engg. Works, Chak no.65, Manga Road Near Makkah Sugar Mill.
274	40169210	Tip Erasers	Plastic			 Indus Pencil Industries, B-54, Manghopir Road SITE Karachi Toray Plast, Al Jannat Road, Saggian Ravi By Pass, Nain Sukh, Lahore
275	40169290	Erasers	Plastic			 Indus Pencil Industries, B-54, Manghopir Road SITE Karachi Toray Plast, Al Jannat Road, Saggian Ravi By Pass, Nain Sukh, Lahore
276	40169390	Swivel and Nut Assembly	1/2"	Denisty 8.41 g/cm3	60/40 Brass	Sindh Standard Engineering Works, F-713-A, S.I.T.E, Metrovill, Karachi
277	42010000	Belts or Belting of rubber and/or leather excluding those conforming to API specifications.	Conforming to BSS-351 & 490 (excluding grades, N 17, M 24 & above) Also conforming to DIN 22102 (excluding grades; M, N and above)			Premier Rubber Belting Mfg. Co., C-13, SITE Karachi
278	44109000	Chipboard	Board made of chips of wood	Sheets size 8*4 density 600	Glue Urea Formaldehyde	Chenab Particle Board (Pvt) Ltd., 30.k.m. Gujranwala Road, Alipur Chatta,

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
279	44111200	Medium Density Fiber (MDF) / Lamination Board	Size 8 x 4 (standard) OR, as per customer requirement OR 1220 x 2440 x 2.0 mm 1220 x 2440 x 2.2 mm 1220 x 2440 x 3.0 mm 1220 x 2440 x 4.0 mm 1220 x 2440 x 4.5 mm 1220 x 2440 x 5.0 mm	Density Profile: EN 323 Swelling: EN 317 Surface Soundness: EN 311-2002 Screw Pull Force: EN 320 MOR & MOE: EN 310 Internal Bond: EN 319 Moisture Content: ASTM D2216 Surface Gloss: ASTM D523-14	Emission in Board: EN 717-2 Board Standard: E1	 Chenab Particle Board (pvt) Ltd., 30.k.m. Gujranwala Road, Alipur Chatta, Al Noor Sugar Mills Ltd., Shahpur Jahania, Taluka Moro, District Naushero Feroze Ciel Wood Works (Pvt) Ltd., 17, Ind. Estate, Jumrud Road, Peshawar Frontier Green Wood Industries (Pvt) Ltd., W 28, 29 and plot No. 14, 27 Industrial Estate, Jamrud Road, Peshawar Garibsons (Pvt) Ltd., C69-71, 12th Commercial Street Phase 2 Ext, DHA Karachi Taj Board, Near Taj Ghee Sakha Kot Road, Sher Ghar, KPK Hamza Board, 10 KM Gojra Pensra Road, Gojra, ZRK Industries (Pvt) Ltd., Plot No. W-16, 17 Industrial Estate Jamrud Road, Hayatabad, Peshawar Peshawar Particle Board Industries (Pvt) Ltd., Plot No. W-16, 17 Industrial Estate Jamrud Road, Hayatabad, Peshawar
280	44111300	Medium Density Fiber (MDF) / Lamination Board	Size 8 x 4 (standard) OR, as per customer requirement OR 1220 x 2440 x 5.5 mm 1220 x 2440 x 6.0 mm 1220 x 2440 x 6.5 mm 1220 x 2440 x 7.0 mm 1220 x 2440 x 8.0 mm 1220 x 2440 x 9.0 mm	Density Profile: EN 323 Swelling: EN 317 Surface Soundness: EN 311-2002 Screw Pull Force: EN 320 MOR & MOE: EN 310 Internal Bond: EN 319 Moisture Content: ASTM D2216 Surface Gloss: ASTM D523-14	Emission in Board: EN 717-2 Board Standard: E1	 Chenab Particle Board (pvt) Ltd., 30.k.m. Gujranwala Road, Alipur Chatta, Al Noor Sugar Mills Ltd., Shahpur Jahania, Taluka Moro, District Naushero Feroze Ciel Wood Works (Pvt) Ltd., 17, Ind. Estate, Jumrud Road, Peshawar Frontier Green Wood Industries (Pvt) Ltd., W 28, 29 and plot No. 14, 27 Industrial Estate, Jamrud Road, Peshawar Garibsons (Pvt) Ltd., C69-71, 12th Commercial Street Phase 2 Ext, DHA Karachi Taj Board, Near Taj Ghee Sakha Kot Road, Sher Ghar, KPK Hamza Board, 10 KM Gojra Pensra Road, Gojra ZRK Industries (Pvt) Ltd., Plot No. W-16, 17 Industrial Estate Jamrud Road, Hayatabad, Peshawar Peshawar Particle Board Industries (Pvt) Ltd., Plot No. W-16, 17 Industrial Estate Jamrud Road, Hayatabad, Peshawar

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
81	44111400	Medium Density Fiber (MDF) / Lamination Board	Size 8 x 4 (standard) OR, as per customer requirement OR 1220 x 2440 x 10 mm 1220 x 2440 x 11 mm 1220 x 2440 x 12 mm 1220 x 2440 x 15 mm 1220 x 2440 x 16 mm 1220 x 2440 x 17 mm 1220 x 2440 x 18 mm 1220 x 2440 x 24 mm 1220 x 2440 x 30 mm	Density Profile: EN 323 Swelling: EN 317 Surface Soundness: EN 311-2002 Screw Pull Force: EN 320 MOR & MOE: EN 310 Internal Bond: EN 319 Moisture Content: ASTM D2216 Surface Gloss: ASTM D523-14	Emission in Board: EN 717-2 Board Standard: E1	 Chenab Particle Board (pvt) Ltd., 30.k.m. Gujranwala Road, Alipur Chatta, Al Noor Sugar Mills Ltd., Shahpur Jahania, Taluka Moro, District Naushero Feroze Ciel Wood Works (Pvt) Ltd., 17, Ind. Estate, Jumrud Road, Peshawar Frontier Green Wood Industries (Pvt) Ltd., W 28, 29 and plot No. 14, 27 Industrial Estate, Jamrud Road, Peshawar Garibsons (Pvt) Ltd., C69-71, 12th Commercial Street Phase 2 Ext, DHA Karachi Taj Board, Near Taj Ghee Sakha Kot Road, Sher Ghar, KPK Hamza Board, 10 KM Gojra Pensra Road, Gojra ZRK Industries (Pvt) Ltd., Plot No. W-16, 17 Industrial Estate Jamrud Road, Hayatabad, Peshawar Peshawar Particle Board Industries (Pvt) Ltd., Plot No. W-16, 17 Industrial Estate Jamrud Road, Hayatabad, Peshawar
2		Melamine Moulded Door skin of a density exceeding 0.8 G/CM2	Width = 27", 39", 42" Length = 84"	Density Profile: EN 323 Swelling: EN 317 Surface Soundness: EN 311-2002 Screw Pull Force: EN 320 MOR & MOE: EN 310 Internal Bond: EN 319 Moisture Content: ASTM D2216 Surface Gloss: ASTM D523-14	Emission in Board: EN 717-2 Board Standard: E1	 I) ZRK Industries (Pvt) Ltd., Plot No. W-16, 17 Industrial Estate Jamrud Road, Hayatabad, Peshawar Peshawar Particle Board Industries (Pvt) Ltd., Plot No. W-16, 17 Industrial Estate Jamrud Road, Hayatabad, Peshawar
		Not Mechanically Worked or Surface Covered		Density Profile: EN 323 Swelling: EN 317 Surface Soundness: EN 311-2002 Screw Pull Force: EN 320 MOR & MOE: EN 310 Internal Bond: EN 319 Moisture Content: ASTM D2216 Surface Gloss: ASTM D523-14	Emission in Board: EN 717-2 Board Standard: E1	 ZRK Industries (Pvt) Ltd., Plot No. W-16, 17 Industrial Estate Jamrud Road, Hayatabad, Peshawar Peshawar Particle Board Industries (Pvt) Ltd., Plot No. W-16, 17 Industrial Estate Jamrud Road, Hayatabad, Peshawar
		Primed Molded Fibre Board Door Skin Melamine Moulded Door Skin	Width = 27", 39", 42" Length = 84" UV 16mm & 17mm Size=(1220x2440)	Density Profile: EN 323 Swelling: EN 317 Surface Soundness: EN 311-2002 Screw Pull Force: EN 320 MOR & MOE: EN 310 Internal Bond: EN 319 Moisture Content: ASTM D2216 Surface Gloss: ASTM D523-14	Emission in Board: EN 717-2 Board Standard: E1	 ZRK Industries (Pvt) Ltd., Plot No. W-16, 17 Industrial Estate Jamrud Road, Hayatabad, Peshawar Peshawar Particle Board Industries (Pvt) Ltd., Plot No. W-16, 17 Industrial Estate Jamrud Road, Hayatabad, Peshawar
5		BTO Standard Red Stamping Sheet Fibre Board BCC Premium Fbire Board BTO Standard Fibre Board BCR Superior of a density not exceeding 0.5 G/CM2		Density Profile: EN 323 Swelling: EN 317 Surface Soundness: EN 311-2002 Screw Pull Force: EN 320 MOR & MOE: EN 310 Internal Bond: EN 319 Moisture Content: ASTM D2216 Surface Gloss: ASTM D523-14	Emission in Board: EN 717-2 Board Standard: E1	 ZRK Industries (Pvt) Ltd., Plot No. W-16, 17 Industrial Estate Jamrud Road, Hayatabad, Peshawar Peshawar Particle Board Industries (Pvt) Ltd., Plot No. W-16, 17 Industrial Estate Jamrud Road, Hayatabad, Peshawar
6	48025510	Writing Printing Paper	General category of white paper suitable for printing and writing	Bleached Pulp	Cellulosic material	 Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore Century Paper & Board Mills Ltd., 62 KM Lahore Multan Highway, N-5, District Kasur

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
287	48025590	Writing Printing Paper	General category of white paper suitable for printing and writing	Bleached Pulp	Cellulosic material	Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore
288	48025600	Photo Copy Paper	Paper designed to run of Photo coping machines	Bleached Pulp	Cellulosic material	 Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore Century Paper & Board Mills Ltd., 62 KM Lahore Multan Highway, N-5, District Kasur
289	48025700	Photo Copy Paper				Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore
290	48026100	Writing Printing Paper	-			Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore
291	48026200	Photo Copy Paper	Paper designed to run of Photo coping machines	Bleached Pulp	Cellulosic material	 Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore Century Paper & Board Mills Ltd., 62 KM Lahore Multan Highway, N-5, District Kasur
292	48026990	Photo Copy Paper	Paper designed to run of Photo coping machines	Bleached Pulp	Cellulosic material	 Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore Century Paper & Board Mills Ltd., 62 KM Lahore Multan Highway, N-5, District Kasur
293	48030000	Jumbo Reel of Toilet or Facial Tissue or similar kind of paper	Toilet or facial tissue stock, towel or napkin stock and similar paper of a kind in Jumbo tissue reel form (Grammage 13.5 gsm to 32 gsm)	Solid in roll form, Packed finished product after converting it into different consumer specific requirements	Wood pulp and recycled paper, board & tissue material	 Packages Convertors Ltd., Shahrah-e-Roomi, P.O. Amer Sidhu, Lahore-54760 Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore
294	48041100	Semi Kraft	Outer Paper for corrugated containers	Mix of Kraft pulp and recovered fiber	Cellulosic material	 Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore Century Paper & Board Mills Ltd., 62 KM Lahore Multan Highway, N-5, District Kasur
295	48041900	Semi Kraft	Outer Paper for corrugated containers	Mix of Kraft pulp and recovered fiber	Cellulosic material	 Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore Century Paper & Board Mills Ltd., 62 KM Lahore Multan Highway, N-5, District Kasur
296	48044900	Un-coated board used for liquid packaging	-			Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore
297	48045900	LPB - Kraft Back Board	Multilayered board with white surface, produced form virgin pulps and suitable for food packaging	Bleached / unbleached virgin pulp	Cellulosic material	 Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore Century Paper & Board Mills Ltd., 62 KM Lahore Multan Highway, N-5, District Kasur
298	48051100	Fluting Paper	Paper for corrugated containers	Recovered fiber	Cellulosic material	 Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore Century Paper & Board Mills Ltd., 62 KM Lahore Multan Highway, N-5, District Kasur
299	48051200	Fluting Paper				Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore
300	48051900	Fluting Paper	Paper for corrugated containers	Recovered fiber	Cellulosic material	 Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore Century Paper & Board Mills Ltd., 62 KM Lahore Multan Highway, N-5, District Kasur

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
301	48052400	White Test Liner	Outer Paper for corrugated containers having white surface	Bleached and un-bleached recovered fiber may also contain virgin fiber		 Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore Century Paper & Board Mills Ltd., 62 KM Lahore Multan Highway, N-5, District Kasur
302	48052500	Test Liner	Outer Paper for corrugated containers	Recovered fiber		 Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore Century Paper & Board Mills Ltd., 62 KM Lahore Multan Highway, N-5, District Kasur
303	48059210	Uncoated FBB	Used for Poly Coating and Cupboards	Bleached virgin pulp		Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore
304	48109200	i) LPB - Kraft Back Board ii) Folding Box Board	Multilayered board with white surface, produced form virgin pulps and suitable for food packaging	 Bleached / unbleached virgin pulp Chemical and Mechanical Bleached virgin pulps 		 Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore Century Paper & Board Mills Ltd., 62 KM Lahore Multan Highway, N-5, District Kasur
305	48109900	Duplex Board	Multilayer board with white top	Bleached Chemical pulp and recovered fiber		 Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore Century Paper & Board Mills Ltd., 62 KM Lahore Multan Highway, N-5, District Kasur
306	48114100	i) Masking Tape	Thickness 15mic to 40 mic	White Colour / any colour		Osaka Electric & Industrial Co., Ground Floor, Plot No. Dp-10, Sector 12-D, North Karachi Industrial Area, Karachi
		ii) Laminate for Flexible Packaging (Self-adhesive)	Paper and plastic based self-adhesive labels	Solid in roll form of stacks	Cellulosic material & Polymer	Packages Convertors Ltd., Shahrah-e-Roomi, P.O. Amer Sidhu, Lahore-54760
307	48115100	Poly coated board (Bleach board weighing more than 150gsm)	combination of multi layer Coated / un-coated Printed board and PE of various grammages as per customer specs	Produced in roll & sheet form		 Packages Ltd., Shahrah-e-Roomi, P.O. Amer Sidhu, Lahore Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore
308	48115990	Poly coated board (other poly coated board)	combination of multi layer Coated / un-coated Printed board and PE of various grammages as per customer specs	Produced in roll & sheet form		 Packages Ltd., Shahrah-e-Roomi, P.O. Amer Sidhu, Lahore Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore
309	48119000	Printed Decorative Paper	widh-1250mm, 50-75GSM, Various wood grain effects and fancy desigens	Excellent wet Strength, Good Wet opacity, fully Absobent,Specially formulated water base Inks with high and thermal stability	Chemically bleached wood pulp (Fibers),Thickness:80mm,Moisture:<5% Conn: 50-60g/m2, Ash content upto 35%	Wali Laminates (Pvt) Ltd., 17 KM, Ferozpur Road, Lahore
310	48181000	Toilet Paper	Finished product, converted in roll form (Grammage from 15 gsm to 24 gsm)	Solid in roll form, Packed finished product after converting it into different consumer specific requirements		Packages Convertors Ltd., Shahrah-e-Roomi, P.O. Amer Sidhu, Lahore-54760
311	48182000	Handkerchiefs, cleansing or facial tissues and towels	Finished product, converted in box, rolls, or packed in poly form, folded or in sheets (Grammage 13.5 gsm to 32 gsm)	Solid in roll form, Packed finished product after converting it into different consumer specific requirements		Packages Convertors Ltd., Shahrah-e-Roomi, P.O. Amer Sidhu, Lahore-54760
312	48183000	Tablecloths and serviettes	Finished product, converted in box, or packed in poly form, folded or in sheets (Grammage 13.5 gsm to 22 gsm)	Solid in roll form, Packed finished product after converting it into different consumer specific requirements		Packages Convertors Ltd., Shahrah-e-Roomi, P.O. Amer Sidhu, Lahore-54760
313	48191000	Carton, cases & boxes of corrugated paper or Paper board (4819.1000). Folding carton, boxes and cases of non- corrugated paper or Paper board (4819.2000).	Multi layer Coated / un-coated Printed board of various grammages as per customer specs	Produced in HL & Glued printed carton		 Packages Ltd., Shahrah-e-Roomi, P.O. Amer Sidhu, Lahore Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
314	48192000	Carton, cases & boxes of corrugated paper or Paper board (4819.1000). Folding carton, boxes and cases of non- corrugated paper or Paper board (4819.2000).	Multi layer Coated / un-coated Printed board of various grammages as per customer specs	Produced in HL & Glued printed carton	Paper and Board material	 Packages Ltd., Shahrah-e-Roomi, P.O. Amer Sidhu, Lahore Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore
315	48193000	Sacks, paper	Papersacks made from Extensible / Clupak and Non Extensible Sack Kraft Paper base width 40 cm or more			Pakistan Papersack Corporation Limited Plot No. 749-749A, Zila Moza Pathra, Tehsil Hub, District Lasbella, Hub Baluchistan
316	48221000	Bobbins, Spools, Cops used for winding Textile yarn.	Made of Paper & Paper Board.	50-505 mm I/D Upto 3 Meter Length O/D upto 530 mm.		Coastal Converters (Pvt) Ltd., Room # 311, 3rd Floor, Korangi Association of Trade & Industry, Sector # 23, K.I.A, Karachi
317	48229000	Bobbins, Cops, Cores, Tubes and other winding supports of Paper & Paper Board	Made of Paper & Paper Board.	50-505 mm I/D Upto 3 Meter Length O/D upto 530 mm.		Coastal Converters (Pvt) Ltd., Room # 311, 3rd Floor, Korangi Association of Trade & Industry, Sector # 23, K.I.A, Karachi
318	48236900	Disposable paper or paperboard plates, trays, dishes & cups of different sizes	Multilayer coated board, ranging from 160 cc to 21 OZ, plain and customized.	Blend of various pulps / Recycled Fiber	Paper and board material	Packages Convertors Ltd., Shahrah-e-Roomi, P.O. Amer Sidhu, Lahore-54760
319	48239090	Metalized board	combination of multilayer coated / un-coated printed board and Metalized PET of various grammages as per customer specs	Produced in roll & sheet form	Paper and Board and polymer of Ethlene terrathelate (PET)	 Packages Ltd., Shahrah-e-Roomi, P.O. Amer Sidhu, Lahore Bulleh Shah Packaging (Pvt) Ltd, Sharah-e- Roomi, P.O. Amer Sidhu, Lahore
320	49081000	Transfers, vitrifiable, excluding window transparencies	Stickers, Transfer Labels (Decalcomania) and Chassis Aluminium ID Plates.			Allco Transfer Printers (Pvt) Ltd., 3 Haider Chamber, 11-B, Rizvia Society, Karachi-74600
321	49089000	Decalcomanias, excluding vitrifiable decalcomanias	Transfer Labels (Decalcomania)			Allco Transfer Printers (Pvt) Ltd., 3 Haider Chamber, 11-B, Rizvia Society, Karachi-74600
322	54023300	Yarn,textured,of polyesters	Polyester Filament Yarn			Gatron (Industries) Limited, 11th Floor, G&T Tower No. 18, Beaumont, Civil Lines – 10, Karachi.
323	54023400	Synthetic filament Textured yarn - made of polypropylene	Polypropylene Melt-spun Textured Yarn	Low specific gravity, environmentally friendly	Thermoplastic polymer of propylene $(CH_3)_n$	Syntech Fibres (Pvt) Ltd., 5-3-1 Sector 15, Korangi Industrial Area, Karachi
324	54023900	Synthetic filament yarn - made of polypropylene	Polypropylene Melt-spun Filament Yarn	Low specific gravity, environmentally friendly	Thermoplastic polymer of propylene $(CH_3)_n$	Syntech Fibres (Pvt) Ltd., 5-3-1 Sector 15, Korangi Industrial Area, Karachi
325	54024600	Others of polyester, partially oriented	Polyester Filament Yarn			Gatron (Industries) Limited, 11th Floor, G&T Tower No. 18, Beaumont, Civil Lines – 10, Karachi.
326	54024700	Yarn,oriented polyester, Single, untwisted	Polyester Filament Yarn			Gatron (Industries) Limited, 11th Floor, G&T Tower No. 18, Beaumont, Civil Lines – 10, Karachi.
327	54024800	Synthetic filament yarn - made of polypropylene	Polypropylene Melt-spun Filament Yarn	Low specific gravity, environmentally friendly	Thermoplastic polymer of propylene $(CH_3)_n$	Syntech Fibres (Pvt) Ltd., 5-3-1 Sector 15, Korangi Industrial Area, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
328	54025200	Other yarn, single, with a twist exceeding 50 turns per metre, of polyester	Polyester Filament Yarn			Gatron (Industries) Limited, 11th Floor, G&T Tower No. 18, Beaumont, Civil Lines – 10, Karachi.
329	54025900	Synthetic filament yarn twisted - made of other synthetic material	Polypropylene Melt-spun Twisted Yarn	Low specific gravity, environmentally friendly	Thermoplastic polymer of propylene $(CH_3)_n$	Syntech Fibres (Pvt) Ltd., 5-3-1 Sector 15, Korangi Industrial Area, Karachi
330	54026200	 i) Other yarn multi or cabled of polyester 	Polyester Filament Yarn			Gatron (Industries) Limited, 11th Floor, G&T Tower No. 18, Beaumont, Civil Lines – 10, Karachi.
		ii) Air Coverd Yarn	Use in Denim	High Elongation		Fintex Mfg. Crop. (Pvt) Ltd., Plot # G-17- 18,H.I.T.E, Hub, Balucistan
331	54041100	Knitted & Woven Elasic,Tape,Ribbon, Cords used in Garment & Home Textiles Export Industry.	Narrow Fabrics of 5mm - 200mm	Made from Cotton,Polyester,Polypr- opylene,Nylon,Rubber & Spandex.		Gigi Industries (Pvt) Limited, L/A,8/2, F.B Area, Karaci-Pakistan
332	54075200	Knitted & Woven Elasic, Tape, Ribbon, Cords used in Garment & Home Textiles Export Industry.	Narrow Fabrics of 5mm - 200mm	Made from Cotton,Polyester,Polypr- opylene,Nylon,Rubber & Spandex.	**	Gigi Industries (Pvt) Limited, L/A,8/2, F.B Area, Karaci-Pakistan
333	54076900	Weaved Fabric	Automotive Grade	Tensile Strength, Tear Strength, Constant Load Elongation, Permanent Set, Crease Flex, Seam Strength, Seam Fatigue, Flexibility, Flamability, Color Fastness, Light Fastness, Washing Fastness, Heat Resistance, Light Resistance, etc	Cleanability, Chemical Resistance-part1, Chemical Resistance part-2	Procon Engineering (Private) Limited, D-57, to D- 57, N.W.I, Zone, Port Qasim, Karachi-75020
334	55032010	Polyester Staple Fibre	Synthetic staple fibres, not carded or combed. Of polyesters not exceeding 2.22 decitex.	0.5-2 Denier staple fibre	PTA= 0.865, MEG= 0.334, Textile Finish= 0.10-0.20,	ICI Pakistan Limited- Polyester Fibres Business, 63- Mozang Road Lahore
335	55034000	Synthetic staple fibre - made of polypropylene	Polypropylene Melt-spun Staple Fibre	Low specific gravity, environmentally friendly	Thermoplastic polymer of propylene $(CH_3)_n$	Syntech Fibres (Pvt) Ltd., 5-3-1 Sector 15, Korangi Industrial Area, Karachi
336	56031400	Non Woven Fabric of manmade filaments (Geotextile)	Weight 200-1500 gm/ m2; Width (max): 3 meter	Material: Polyester/ Polypropylene; Type: Needle punch non woven fabric; Weight/ Density: 150gsm and above; Thickness: 1-20mm; Color: As per requirement; Width: 3 meter max; Length: As per requirement.		Unik Fabrics (Pvt) Ltd., 401, Deh Drigh, Rafa- Aam Society, Malik Halt, Karachi
337	56039100	Knitted & Woven Elasic, Tape, Ribbon, Cords	Narrow Fabrics of 5mm - 200mm, used in Garment & Home Textiles Export Industry.	Made from Cotton,Polyester,Polypr- opylene,Nylon,Rubber & Spandex.		Gigi Industries (Pvt) Limited, L/A,8/2, F.B Area, Karaci-Pakistan
338	56039300	Knitted & Woven Elasic, Tape, Ribbon, Cords	Narrow Fabrics of 5mm - 200mm, used in Garment & Home Textiles Export Industry.	Made from Cotton,Polyester,Polypr- opylene,Nylon,Rubber & Spandex.		Gigi Industries (Pvt) Limited, L/A,8/2, F.B Area, Karaci-Pakistan
339	56039400	Knitted & Woven Elasic, Tape, Ribbon, Cords	Narrow Fabrics of 5mm - 200mm, used in Garment & Home Textiles Export Industry.	Made from Cotton,Polyester,Polypr- opylene,Nylon,Rubber & Spandex.		Gigi Industries (Pvt) Limited, L/A,8/2, F.B Area, Karaci-Pakistan
340	56041000	Knitted & Woven Elasic, Tape, Ribbon, Cords	Narrow Fabrics of 5mm - 200mm, used in Garment & Home Textiles Export Industry.	Made from Cotton,Polyester,Polypr- opylene,Nylon,Rubber & Spandex.		Gigi Industries (Pvt) Limited, L/A,8/2, F.B Area, Karaci-Pakistan
341	56060000	Yarn,chenille, including flock chenille	Chenille Yarn Ecru and Dyed	Standard	Acrylic, Blended	Khawaja Woollen Mills (Pvt) Ltd., 4-H, Gulberg- III, Lahore-54660
342	56074900	Twine, cordage, rope and cables- made of polypropylene	Polypropylene Braided & Knitted twine, cordage, rope and cables	Low specific gravity, environmentally friendly	Thermoplastic polymer of propylene (CH ₃) _n	Syntech Fibres (Pvt) Ltd., 5-3-1 Sector 15, Korangi Industrial Area, Karachi
343	56081900	i) Anti-insect Nets	Mesh 25x50, 40x80, GSM 100-115	Net rolls	Polymer based	Pak Agro Packaging Ltd., Plot 23, Phase IV,

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		ii) Anti-Hail Nets	1/2 Inch Mesh, 13x60 ft			Hattar Industrial Estate Haripur, KPK
		iii) Anti-Birds Nets	1 inch Mesh, 20x100 ft			1 /
344	56089000	i) Vegetable/Crop Nets	HDPE 280D/ 6 ply, Mesh 16"	9x210 ft	Polymer based	Pak Agro Packaging Ltd., Plot 23, Phase IV,
		ii) Green Shade Nets	40-80% Shading ratio, 80-200 GSM	Rolls of 4x50 m	Polymer based	Hattar Industrial Estate Haripur, KPK
		iii) Fruit/Vegetable Packing Nets	1-25 Kgs packing	Bags	Ploymer based	1
345	58019000	Weaved Fabric	Automotive Grade	Tensile/Tear Strength, Constant Load Elongation, Permanent Set, Crease Flex, Seam Strength/Fatigue, Flexibility, Flamability, Color/Light Fastness, Washing Fastness, Heat Resistance, Light Resistance, etc	Cleanability, Chemical Resistance-part1, Chemical Resistance part-2	Procon Engineering (Private) Limited, D-57, to D- 57, N.W.I, Zone, Port Qasim, Karachi-75020
346	58062000	Knitted & Woven Elasic, Tape, Ribbon, Cords	Narrow Fabrics of 5mm - 200mm, used in Garment & Home Textiles Export Industry.	Made from Cotton,Polyester,Polypr- opylene,Nylon,Rubber & Spandex.		Gigi Industries (Pvt) Limited, L/A,8/2, F.B Area, Karaci-Pakistan
347	58063200	i) Ribbons, nylon, narrow woven	Hook and Loop Fastener tapes, made from 100% nylon material and available in widths 10mm up to 100mm			NFU Industries (PVT) Ltd., 20 Km, Raiwind Road, Lahore.
		ii) Knitted & Woven Elasic, Tape,Ribbon, Cords	Narrow Fabrics of 5mm - 200mm, used in Garment & Home Textiles Export Industry.	Made from Cotton,Polyester,Polypr- opylene,Nylon,Rubber & Spandex.		Gigi Industries (Pvt) Limited, L/A,8/2, F.B Area, Karaci-Pakistan
348	58071020	Knitted & Woven Elasic, Tape, Ribbon, Cords	Narrow Fabrics of 5mm - 200mm, used in Garment & Home Textiles Export Industry.	Made from Cotton,Polyester,Polypr- opylene,Nylon,Rubber & Spandex.		Gigi Industries (Pvt) Limited, L/A,8/2, F.B Area, Karaci-Pakistan
349	58071030	i) Narrow woven fabrics, woven, ribbons, tapes, webbing and other:	Made from yarns of cotton, polyester and/or polypropylene used in curtain headers, usually for the home-textile export- oriented industry	Narrow woven fabrics of 1 to 6-inches width	Textile material	Karachi Webbing Company, Plot No. 501, Sector 05, Korangi Industrial Area, Karachi
		ii) Knitted & Woven Elasic, Tape, Ribbon, Cords	Narrow Fabrics of 5mm - 200mm, used in Garment & Home Textiles Export Industry.	Made from Cotton,Polyester,Polypr- opylene,Nylon,Rubber & Spandex.		Gigi Industries (Pvt) Limited, L/A,8/2, F.B Area, Karaci-Pakistan
350	58071040	i) Narrow woven fabrics, woven, ribbons, tapes, webbing and other:	Made from yarns of cotton, polyester and/or polypropylene, used in sports goods and luggage/bags manufacturing as straps and handles,	Narrow woven fabrics of 0.5 to 5-inches width	Textile material	Karachi Webbing Company, Plot No. 501, Sector 05, Korangi Industrial Area, Karachi
351	58071040	ii) Knitted & Woven Elasic, Tape, Ribbon, Cords	Narrow Fabrics of 5mm - 200mm, used in Garment & Home Textiles Export Industry.	Made from Cotton,Polyester,Polypr- opylene,Nylon,Rubber & Spandex.		Gigi Industries (Pvt) Limited, L/A,8/2, F.B Area, Karaci-Pakistan
352	58071090	Knitted & Woven Elasic, Tape, Ribbon, Cords	Narrow Fabrics of 5mm - 200mm, used in Garment & Home Textiles Export Industry.	Made from Cotton,Polyester,Polypr- opylene,Nylon,Rubber & Spandex.		Gigi Industries (Pvt) Limited, L/A,8/2, F.B Area, Karaci-Pakistan
353	58079000	Knitted & Woven Elasic, Tape, Ribbon, Cords	Narrow Fabrics of 5mm - 200mm, used in Garment & Home Textiles Export Industry.	Made from Cotton,Polyester,Polypr- opylene,Nylon,Rubber & Spandex.		Gigi Industries (Pvt) Limited, L/A,8/2, F.B Area, Karaci-Pakistan
354	58081000	Twine, cordage, rope and cables, plaited, knitted or braided: for example used as garmet draw-strings, or as filler dori, usually for the garment export-oriented industry	Made from yarns of cotton, polyester and/or polypropylene	1-14 mm diameter	Textile material	Karachi Webbing Company, Plot No. 501, Sector 05, Korangi Industrial Area, Karachi
355	58090000	Narrow woven fabrics, woven, ribbons, tapes, webbing and other: for example used in manufacturing of furniture such as sofas for domestic consumption.	Made from yarns of cotton, polyester and/or polypropylene, usually including rubber thread	Narrow woven fabrics of 0.5 to 5-inches width	Textile material	Karachi Webbing Company, Plot No. 501, Sector 05, Korangi Industrial Area, Karachi
356	59019010	Buckram	Interlining Fabric of Cotton/ PC in Rolls for Shirts		Coated with Thermoplastic Adhesive	 Aruj Garment Accessories Ltd, Aruj House, 1 KM Raiwind Road, Lahore Aruj Industries, 2-Km off Raiwind Manga Road, Raiwind, Lahore
357	59031000	Textile fabrics impregnated, coated, covered or laminated with plastics, (Artificial Leather).	PVC Synthetic Leather	Coated /Laminated Fabric	Polyvinyle Choloride (PVC)	 A.T.S Synthetic (Pvt) Ltd., 4-Km, Kacha Road, Kahna Nau, Lahore. AHN Synthetic (Pvt) Ltd., 23-KM, Lahore/ Sheikhupura Road, Sheikhupura

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
358	59032000	Textile fabrics impregnated, coated, covered or laminated with plastics, (Artificial Leather).	i) PU Synthetic Leather	Coated /Laminated Fabric	Poly Urethane (PU)	 A.T.S Synthetic (Pvt) Ltd., 4-Km, Kacha Road, Kahna Nau, Lahore. AHN Synthetic (Pvt) Ltd., 23-KM, Lahore/ Sheikhupura Road, Sheikhupura
359	59039000	 i) Textile fabrics impregnated, coated, covered or laminated with plastics, (Artificial Leather). 	PU/ PVC Synthetic Leather			A.T.S Synthetic (Pvt) Ltd., 4-Km, Kacha Road, Kahna Nau, Lahore.
		ii) Fusible Interlining	Fabric of Polyester in rolls for suits, jackets, and lady wears		Coating with Polyamide and Co- Polyester	Aruj Industries, 2-Km off Raiwind Manga Road, Raiwind, Lahore
360	59069900	Cloth Tape	Thickness 15mic to 40 mic	White Colour / any colour		Osaka Electric & Industrial Co., Ground Floor, Plot No. Dp-10, Sector 12-D, North Karachi Industrial Area, Karachi
361	59090000	Hose piping, textile material	Fire Hose, Made from High quality Polyester Yarn, woven on Circular Looms, and Rubberlined	Working Pressure 16 bar, Brusting Pressure 32 bar	Polyester 25%, Rubber 75%	National Resources Corporation, 3/E-III, Commercial Area, Nazimabad, Karachi
362	59119090	i)) String Wound Filter Cartridges	Polypropylene Melt-spun Yarn Filter Media, and Polypropylene Filter Core US Patent No. 6,942,106 European Patent No. 1153641	Low specific gravity, environmentally friendly, long service-life	Thermoplastic polymer of propylene $(CH_3)_n$	Syntech Fibres (Pvt) Ltd., 5-3-1 Sector 15, Korangi Industrial Area, Karachi
363	59119090	ii) Spun Bonded Filter Cartridges	Polypropylene Melt-spun Bonded Filter Cartridge	Low specific gravity, environmentally friendly, long service-life	Thermoplastic polymer of propylene (CH ₃) _n	
364	60029000	Knitted & Woven Elasic, Tape, Ribbon, Cords	Narrow Fabrics of 5mm - 200mm, used in Garment & Home Textiles Export Industry.	Made from Cotton,Polyester,Polypr- opylene,Nylon,Rubber & Spandex.		Gigi Industries (Pvt) Limited, L/A,8/2, F.B Area, Karaci-Pakistan
365	60053500	Weaved Fabric	Automotive Grade	Tensile Strength, Tear Strength, Constant Load Elongation, Permanent Set, Crease Flex, Seam Strength, Seam Fatigue, Flexibility, Flamability, Color Fastness, Light Fastness, Washing Fastness, Heat Resistance, Light Resistance, etc	Cleanability, Chemical Resistance-part1, Chemical Resistance part-2	Procon Engineering (Private) Limited, D-57, to D- 57, N.W.I, Zone, Port Qasim, Karachi-75020
366	60063200	Knitted & Woven Elasic, Tape, Ribbon, Cords	Narrow Fabrics of 5mm - 200mm, used in Garment & Home Textiles Export Industry.	Made from Cotton,Polyester,Polypr- opylene,Nylon,Rubber & Spandex.		Gigi Industries (Pvt) Limited, L/A,8/2, F.B Area, Karaci-Pakistan
367	60069090	Weaved Fabric	Automotive Grade	Tensile Strength, Tear Strength, Constant Load Elongation, Permanent Set, Crease Flex, Seam Strength, Seam Fatigue, Flexibility, Flamability, Color Fastness, Light Fastness, Washing Fastness, Heat Resistance, Light Resistance, etc	Cleanability, Chemical Resistance-part1, Chemical Resistance part-2	Procon Engineering (Private) Limited, D-57, to D- 57, N.W.I, Zone, Port Qasim, Karachi-75020
368	61171090	Knitted & Woven Elasic, Tape, Ribbon, Cords	Narrow Fabrics of 5mm - 200mm, used in Garment & Home Textiles Export Industry.	Made from Cotton,Polyester,Polypr- opylene,Nylon,Rubber & Spandex.		Gigi Industries (Pvt) Limited, L/A,8/2, F.B Area, Karaci-Pakistan
369	61178000	Knitted & Woven Elasic, Tape, Ribbon, Cords	Narrow Fabrics of 5mm - 200mm, used in Garment & Home Textiles Export Industry.	Made from Cotton,Polyester,Polypr- opylene,Nylon,Rubber & Spandex.		Gigi Industries (Pvt) Limited, L/A,8/2, F.B Area, Karaci-Pakistan
370	68041000	Millstones for Milling, grinding or pulping	Various grit sizes from Coarse (mesh 14) to fine (mesh 320 & above) with Hardness from soft (G) to Hard (R) In Vitrified & Resinoid BondIness. Grinding Disc. Dia x Thickness 4" x 1/4 41/2" x 1/4 5" x 1/4 7" x 1/4 9" x 1/4 Steel/Stone cutting Disc. Dia x Thickness 4" x 1/8 41/2" x 1/8 5" x 1/8 7" x 1/8 9" x 1/8 12" x 1/8 14" x 1/8 16" x 1/8	Working RPMs from 3000 to 14000 M/S	Abrasive + Resin + Glass Fiber	 Grind Wheel (Pak) Ltd., 2nd Floor, Karachi Chambers, Hasrat Mohani Road, Karachi Mughal Corporation (Pvt) Ltd., Sharif pura, G.T.Road, Gujranwala.

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company	
371	68051000	 Cloth, abrasive Coated Abrasives Cloth Roll, Cloth Sheet & Aluminium Oxide cloth belt 	Cloth and paper backed abrasives products. Cloth Polyster/ cotton	Grade, Strength etc	Silicon Carbide and Aluminum Oxide Coated on Latex paper cloth	Falcon Abrasives (Pvt) Ltd., Plot No. 36, Sector No. 28, Korangi Industrial Area, Karachi.	
372	68052000	Sand paper, Buffing Paper & Abrasives paper.	Kraft Linerboard	Moisture 7-9% GSM 100-130		Falcon Abrasives (Pvt) Ltd., Plot No. 36, Sector No. 28, Korangi Industrial Area, Karachi.	
373	68053000	i) Leather, abrasive	i) PVC Synthetic Leather, ii) Polyeurethane Synthetic Leather iii) Transparent Plastic Sheet iv) Flocked Fabric v) Jersey Fabric, etc.	**		Crescent Art Fabrics (Pvt) Ltd., 23rd Kilometer, Lahore/ Sheikhupura Road, Sheikhupura	
		ii) Flap & Fiber Disc 4" 5", 7" & Abrasives Fiber Roll	Vulcanized Fiber Paper	Thickness 0.6 ± 0.03 mm, Tensile strength $\geq 60.\times 10^4$, $\geq 3.5\times 10^4$, Moisture Content 6.5 - 8.5		Falcon Abrasives (Pvt) Ltd., Plot No. 36, Sector No. 28, Korangi Industrial Area, Karachi.	
374	68061000	i) Wool,rock, in bulk, sheets or roll	Rockwool/mineral Wool Blankets, Pipe Sections and Panels Density Upto 150Kg/m3, ASTM C 592	Diameter of fibres:4-10 micron, Length of fibres: avg. 200 MM Shot contents :max. 15% (0.2 MM, mesh): Loss on ignition:0% Water content:0% Sulphur content:0% Asbestos content :0% Air permeability 70 Kg / CM vf 2 100 Kg / CM 1.1 140 Kg / CM 0.6	S1O2, AI2O3, Fe2O3, TiO2, CaO, MgO, Na2O, K2O	 Incom Rockwool (Pvt) Ltd., Shernaz House, 8 West Wharf Road, karachi Pakistan Insulations Pvt. Ltd., 107 Business Avenue, PECHS Block-6, Karachi 	
		ii) Rockwool Blanket back with G.I Wire mesh	Density = 60, 80 and 100 kg/m ³ . Thickness = 50,60,70, 80, 100 mm	Square metre Cube metre	Silica, Aluminium, Iron and Mag.	Pakistan Insulations Pvt. Ltd., 107 Business Avenue, PECHS Block-6, Karachi	
		iii) Rockwool Resinated Board	Density = 60, 80 and 100 kg/m ³ . Thickness = 50,70, 80, 100 mm	L x W x T			
		iv) Rockwool Pre formed Pipe sections	Density = 100-140 kg/m ³ Thickness = 25 to 100 mm	Running metre			
		v) Rockwool Sandwich Panels	Density = 100-200 kg/m ³ Thickness = 20 to 100 mm	Square metre Cube metre L x W x T			
375	68091100	Gypsum Board	4'x8' 9mm & 12mm	Sheet	Paper, Gypsum, Starch & Foam	DFB Gypsum Industries, Suit No. 105, 1st Floor, Business & Finance Center, II Chundrigar Road, Karachi	
376	68091900	PVC Laminated Gypsum Ceiling Tiles	2'x2' 7.5mm & 9mm 2'x4' 7.5mm & 9mm	Tile	Paper, Gypsum, Starch, PVC Sheets and Glue	DFB Gypsum Industries, Suit No. 105, 1st Floor, Business & Finance Center, II Chundrigar Road, Karachi	
377	68101900	HT & LT PCC/Spun Hollow Poles, 31 ft to 45 ft	WAPDA Specification DDS-55:2006 (Amended to Date)			Creative Engineering (Pvt) Ltd., 160/ S, Q.I.E. Kot Lakhpat Lahore	
378	68109100	Door-frames, prefabricated, concrete, cement	Door frames roll formed	HR 1/2	Commercial grades	Irshad Ahmad & Bros., 145 Loha Market Lahore	
379	68114000	i) Cable Conduits of asbestos cement	PS: 558 - 1991 (R) ISO: 881 - 1980	Resistance to corrosion, abrasion hydraulic characteristics	Hydrous Magnesium Silicate 3MgO 2SiO ₂ 2H ₂ O	Dadex Eternit Ltd., Dadex House, 34-A/1, Block- 6, P.E.C.H.S. Shahrah-e-Faisal Karachi	
		ii) Pipe Fittings of asbestos cement	PS 2942 - 1990 ISO 393/4 - 1986, ISO 393/2 - 1986 (E)	Corrosion free, Heat insulation, Fire retardant Termite Proof]		
		iii) Joints of asbestos cement	PS: 430 - 1988 (R) ISO 393 part 1&2 1983,1986, ISO 8101- 1980, ISO 737-1984	Corrosion Free, Heat insulation, Fire retardant, Termictc proof			
		iv) Pipes of asbestos-cement	PS: 579 - 1982 (R) ISO 396/ 1 & 2 - 1980 (E)	Corrosion Free, Heat insulation, Fire retardant, Termictc proof,			

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		v) Corrugated sheets of Asbestos Cement	PS 430 & ISO 393/1	Corrosion Free Roofing Material, Heat Insulation, Fire Retardant, Termite Proof		
		vi) Asbestos Cement Boards / Flat Sheets	PS 579/2002 ®	Corrosion Free Wall paneling material, weather Resistance, Heat Insulation, Fire Retardant, Termite Proof,		
380	68118900	Cable Conduits of Cellulose fibre- cement	PS: 428 - 1984 (R) ISO 160 - 1980,ISO 2785-1986,ISO 4483- 1979	ISO 4480-1979,ISO 4482-1979,ISO- 7336-1984 Resistance to corrosion, Resistance against Abrasion Hydraulic Characteristics	Hydrous Magnesium Silicate 3MgO 2SiO ₂ 2H ₂ O	Dadex Eternit Ltd., Dadex House, 34-A/1, Block- 6, P.E.C.H.S. Shahrah-e-Faisal Karachi
381	68129900	Gaskets of asbestos	Asbestos		Asbestos + Calcium + Silicon	Sheikh Corporation, 52/3 Lytton Road, Lahore.
382	69021010	i) Chrome Magnesite Bricks	Chrome Magnesite Bricks	Open porosity (%):16 max, Apparent Density(gm / cm3):2.95 min., Cold Crushing Strength (kg/cm2):700 min, Temp. of Deformation :1500 °C, Under Load of 2Kgf/cm2 (°C), ermal Shock Resistance at:2 thermal 1300 °C (Water Cooling) cycles min. Curvature (Bending Arrow):1 mm max Breakage of Angles :5 mm max Breakage of Ribs (sides):3 mm max	MgO (%) :50 min Cr ₂ O ₃ (%) :20 max SiO ₂ (%) :03 max	Bhanbhore Ceramics Industries, Plot DSU-18, Pakistan Steel Down Stream Industrial Estate, Bin Qasim Karachi
		ii) Refractory bricks, blocks, tile & similar refractory ceramic construction goods	High Alumina castable/refractory for temperature upto 1600 °C - High wear & Alkali resistant silicate refractory. - Megnesite Refractory - High Temperature Zircon Refractory.			 Marshal Ceramics, PO Box.77, K.M.8.9, Lahore Side, G. T Road Gujranwala General Refractories, Landhi Industrial Area, Karachi Commander Ceramics, P.O. Box 514, G.T. Road, Km 11/12 Atawa, Gujranwala
383	69031000	Crucibles				 Carborundum Crucibles Industries, 14-A Davis Road Lahore Kundun Crucibles Industries, 14 KM, Sheikupura Road, Lahore Asian Crucibles Industries, 14 KM Sheikupura Road Lahore Pakistan Crucible Industries, 14-A Davis Road Lahore
384	69032010	Cold tundish lining sets, slide gate refractory sets & nozzles	Cold Tundish Lining Nozzles Well-Block Slide Gate Plates	Loss on Ignition (%) :07 max, Bending Strength (kg / cm2):30 min, Humidity (%) :0.5 max, Bulk Density (gm/cm3): 1.15 min, 3.15 min, 2.60 min, 3.18 - 3.22 min Apparent Porosity(%):45 - 55, 16 max, 2.0 - 6.0, Refractoriness(°C):1620 min Cold Crushing Strength (kg/cm2):900 min, 1000 - 1100 (Kg / cm2)	 i) SiO₂ (%):90 min, Al₂O₃(%):02 max., CaO (%):02 max., MgO(%):01 max., Fe2O3 (%):01 max ii) Al2O3(%):95 min, Fe2O3(%):0.2 max iii) Al2O3(%): 93 min, K2O(%):0.5 max, Na2O(%):0.1 max, Fe2O3(%):0.2 max iv) Al2O3(%):73 – 76, Carbon(%):05 – 07, ZrO2 (%):08 – 11 	Bhanbhore Ceramics Industries, Plot DSU-18, Pakistan Steel Down Stream Industrial Estate, Bin Qasim Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
385	69072111	Tiles, cubes and similar articles, whether or not rectangular, the largest surface area of which is capable of being enclosed in a square the side of which is less than 7cm	which is less than 7cm or 2.755 inches	Unglazed tiles are just biscuit of tiles without any finishing process of glazing or polishing.		 Master Tiles & Ceramics Ind. Ltd., G.T. Road, Gujranwala Shabbir Tiles & Ceramics Ltd., 15th Mile Stone, National Highway, Landhi, Karachi – 75120 Karam Ceramics Limited, B-C 6, Block – 5, Scheme – 5, Kehkashan, Clifton, Karachi Sonex Tiles & Ceramics Ind. Ltd., 19- K.M.,Lahore Side, (Near Kamoke), G.T.Road, Gujranwala Frontier Ceramics Ltd., 29-Industrial Estate, Jamrud Road, Peshawar. Swat Ceramics (Pvt) Ltd., Nowshehra Emco Industries Limited, 4th-Floor, National Tower, 28-Edgerton Road, Lahore
386	69072119	Tiles, cubes and similar articles, whether or not rectangular, the largest surface area of which is capable of being enclosed in a square the side of which is less than 7cm	which is less than 7cm or 2.755 inches	Unglazed tiles are just biscuit of tiles without any finishing process of glazing or polishing.		 Master Tiles & Ceramics Ind. Ltd., G.T. Road, Gujranwala Shabbir Tiles & Ceramics Ltd., 15th Mile Stone, National Highway, Landhi, Karachi – 75120 Karam Ceramics Limited, B-C 6, Block – 5, Scheme – 5, Kehkashan, Clifton, Karachi Sonex Tiles & Ceramics Ind. Ltd., 19- K.M., Lahore Side, (Near Kamoke), G.T.Road, Gujranwala Frontier Ceramics Ltd., 29-Industrial Estate, Jamrud Road, Peshawar. Swat Ceramics (Pvt) Ltd., Nowshehra Emco Industries Limited, 4th-Floor, National Tower, 28-Edgerton Road, Lahore
387	69072190	Tiles, cubes and similar articles, whether or not rectangular, the largest surface area of which is capable of being enclosed in a square the side of which is less than 7cm	All types of unglazed tiles, cubes and similar articles the side of which is less than 7cm or 2.755 inches	Unglazed tiles are just biscuit of tiles without any finishing process of glazing or polishing.		 Master Tiles & Ceramics Ind. Ltd., G.T. Road, Gujranwala Shabbir Tiles & Ceramics Ltd., 15th Mile Stone, National Highway, Landhi, Karachi – 75120 Karam Ceramics Limited, B-C 6, Block – 5, Scheme – 5, Kehkashan, Clifton, Karachi Sonex Tiles & Ceramics Ind. Ltd., 19- K.M.,Lahore Side, (Near Kamoke), G.T.Road, Gujranwala Frontier Ceramics Ltd., 29-Industrial Estate, Jamrud Road, Peshawar. Swat Ceramcis (Pvt) Ltd., Nowshehra Emco Industries Limited, 4th-Floor, National Tower, 28-Edgerton Road, Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
388	69072211		which is less than 7cm or 2.755 inches	Unglazed tiles are just biscuit of tiles without any finishing process of glazing or polishing.		 Master Tiles & Ceramics Ind. Ltd., G.T. Road, Gujranwala Shabbir Tiles & Ceramics Ltd., 15th Mile Stone, National Highway, Landhi, Karachi – 75120 Karam Ceramics Limited, B-C 6, Block – 5, Scheme – 5, Kehkashan, Clifton, Karachi Sonex Tiles & Ceramics Ind. Ltd., 19- K.M.,Lahore Side, (Near Kamoke), G.T.Road, Gujranwala Frontier Ceramics Ltd., 29-Industrial Estate, Jamrud Road, Peshawar. Swat Ceramics (Ptt) Ltd., Nowshehra Emco Industries Limited, 4th-Floor, National Tower, 28-Edgerton Road, Lahore
389	69072219		which is less than 7cm or 2.755 inches	Unglazed tiles are just biscuit of tiles without any finishing process of glazing or polishing.		 Master Tiles & Ceramics Ind. Ltd., G.T. Road, Gujranwala Shabbir Tiles & Ceramics Ltd., 15th Mile Stone, National Highway, Landhi, Karachi – 75120 Karam Ceramics Limited, B-C 6, Block – 5, Scheme – 5, Kehkashan, Clifton, Karachi Sonex Tiles & Ceramics Ind. Ltd., 19- K.M., Lahore Side, (Near Kamoke), G.T.Road, Gujranwala Frontier Ceramics Ltd., 29-Industrial Estate, Jamrud Road, Peshawar. Swat Ceramcis (Pvt) Ltd., Nowshehra Emco Industries Limited, 4th-Floor, National Tower, 28-Edgerton Road, Lahore
390	69072290		which is less than 7cm or 2.755 inches	Unglazed tiles are just biscuit of tiles without any finishing process of glazing or polishing.		 Master Tiles & Ceramics Ind. Ltd., G.T. Road, Gujranwala Shabbir Tiles & Ceramics Ltd., 15th Mile Stone, National Highway, Landhi, Karachi – 75120 Karam Ceramics Limited, B-C 6, Block – 5, Scheme – 5, Kchkashan, Clifton, Karachi Sonex Tiles & Ceramics Ind. Ltd., 19- K.M.,Lahore Side, (Near Kamoke), G.T.Road, Gujranwala Frontier Ceramics Ltd., 29-Industrial Estate, Jamrud Road, Peshawar. Swat Ceramcis (Pvt) Ltd., Nowshehra Emco Industries Limited, 4th-Floor, National Tower, 28-Edgerton Road, Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
391	69072311	Tiles, cubes and similar articles, whether or not rectangular, the largest surface area of which is capable of being enclosed in a square the side of which is less than 7cm	which is less than 7cm or 2.755 inches	Unglazed tiles are just biscuit of tiles without any finishing process of glazing or polishing.		 Master Tiles & Ceramics Ind. Ltd., G.T. Road, Gujranwala Shabbir Tiles & Ceramics Ltd., 15th Mile Stone, National Highway, Landhi, Karachi – 75120 Karam Ceramics Limited, B-C 6, Block – 5, Scheme – 5, Kehkashan, Clifton, Karachi Sonex Tiles & Ceramics Ind. Ltd., 19- K.M.,Lahore Side, (Near Kamoke), G.T.Road, Gujranwala Frontier Ceramics Ltd., 29-Industrial Estate, Jamrud Road, Peshawar. Swat Ceramics (Pvt) Ltd., Nowshehra Emco Industries Limited, 4th-Floor, National Tower, 28-Edgerton Road, Lahore
392	69072319	Tiles, cubes and similar articles, whether or not rectangular, the largest surface area of which is capable of being enclosed in a square the side of which is less than 7cm	which is less than 7cm or 2.755 inches	Unglazed tiles are just biscuit of tiles without any finishing process of glazing or polishing.		 Master Tiles & Ceramics Ind. Ltd., G.T. Road, Gujranwala Shabbir Tiles & Ceramics Ltd., 15th Mile Stone, National Highway, Landhi, Karachi – 75120 Karam Ceramics Limited, B-C 6, Block – 5, Scheme – 5, Kehkashan, Clifton, Karachi Sonex Tiles & Ceramics Ind. Ltd., 19- K.M., Lahore Side, (Near Kamoke), G.T.Road, Gujranwala Frontier Ceramics Ltd., 29-Industrial Estate, Jamrud Road, Peshawar. Swat Ceramics (Pvt) Ltd., Nowshehra Emco Industries Limited, 4th-Floor, National Tower, 28-Edgerton Road, Lahore
393	69072390	Tiles, cubes and similar articles, whether or not rectangular, the largest surface area of which is capable of being enclosed in a square the side of which is less than 7cm	which is less than 7cm or 2.755 inches	Unglazed tiles are just biscuit of tiles without any finishing process of glazing or polishing.		 Master Tiles & Ceramics Ind. Ltd., G.T. Road, Gujranwala Shabbir Tiles & Ceramics Ltd., 15th Mile Stone, National Highway, Landhi, Karachi – 75120 Karam Ceramics Limited, B-C 6, Block – 5, Scheme – 5, Kehkashan, Clifton, Karachi Sonex Tiles & Ceramics Ind. Ltd., 19- K.M.,Lahore Side, (Near Kamoke), G.T.Road, Gujranwala Frontier Ceramics Ltd., 29-Industrial Estate, Jamrud Road, Peshawar. Swat Ceramcis (Pvt) Ltd., Nowshehra Emco Industries Limited, 4th-Floor, National Tower, 28-Edgerton Road, Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
394	69073000	Tiles, cubes and similar articles, whether or not rectangular, the largest surface area of which is capable of being enclosed in a square the side of which is less than 7cm	All types of unglazed tiles, cubes and similar articles the side of which is less than 7cm or 2.755 inches	Unglazed tiles are just biscuit of tiles without any finishing process of glazing or polishing.		 Master Tiles & Ceramics Ind. Ltd., G.T. Road, Gujranwala Shabbir Tiles & Ceramics Ltd., 15th Mile Stone, National Highway, Landhi, Karachi – 75120 Karam Ceramics Limited, B-C 6, Block – 5, Scheme – 5, Kehkashan, Clifton, Karachi Sonex Tiles & Ceramics Ind. Ltd., 19- K.M.,Lahore Side, (Near Kamoke), G.T.Road, Gujranwala Frontier Ceramics Ltd., 29-Industrial Estate, Jamrud Road, Peshawar. Swat Ceramcis (Pvt) Ltd., Nowshehra Emco Industries Limited, 4th-Floor, National Tower, 28-Edgerton Road, Lahore
395		All Types of Unglazed tiles, cubes and similar articles the side of which is more than 7cm or 2.755 inches	Unglazed tiles are just biscuit of tiles without any finishing process of glazing or polishing			 Master Tiles & Ceramics Ind. Ltd., G.T. Road, Gujranwala Shabbir Tiles & Ceramics Ltd., 15th Mile Stone, National Highway, Landhi, Karachi – 75120 Karam Ceramics Limited, B-C 6, Block – 5, Scheme – 5, Kehkashan, Clifton, Karachi Sonex Tiles & Ceramics Ind. Ltd., 19- K.M.,Lahore Side, (Near Kamoke), G.T.Road, Gujranwala Frontier Ceramics Ltd., 29-Industrial Estate, Jamrud Road, Peshawar. Swat Ceramics (Pvt) Ltd., Nowshehra Ercon Industries Limited, 4th-Floor, National Tower, 28-Edgerton Road, Lahore
396	70023910	i) Unworked Glass Rods	(Neutral Glass Tubing) U.S.P. Type I		SiO ₂ , BaO, CaO, Al ₂ O ₃ , Na ₂ O, K ₂ O, B ₂ O ₃ , Fe ₂ O ₃ , TiO ₂	Cornpak Ltd., Plot Nos. 11 & 26, Sector 20, Korangi Industrial Area Karachi - 74900
397	70023910	ii) USP type-I (Clear glassTubing)	Dia: 6.00 - 30.00 mm Wall thickness: 0.45/0.50 or on demand	Coefficient of mean linear thermal expansion $\alpha(20^{\circ}\text{C}; 300^{\circ}\text{C})$ acc. to ISO 7991 : 5.5 x10 ⁻⁶ K ⁻¹ Transformation Temperature T:545 °C Glass temperature at viscosity I] in dPa.s 10 ¹³ (annealing point)545 °C 10 ^{7.6} (softening point)750 °C 10 ⁴ (working point)140 °C Density ρ at 25°C 2.38 gcm ⁻³	Hydrolytic resistance acc. to USP	Ghani Global Glass Ltd., 10-N, Model Town, Lahore.
398		iii) USP type-I Amber Glass Tubing	Dia: 6.00 - 30.00 mm Wall thickness: 0.45/0.50 or on demand	Coefficient of mean linear thermal expansion $\alpha(20^{\circ}\text{C}; 300^{\circ}\text{C})$ acc. to ISO 7991 : 5.6 . 10^{6}K^{-1} Transformation Temperature T:550 °C Glass temperature at viscosity I] in dPa.s 10^{13} (annealing point)560 °C $10^{7.6}$ (softening point)770 °C 10^{4} (working point)1165 °C Density ρ at 25°C 2.45 gcm ⁻³	Hydrolytic resistance acc. to Ph. Eur Type I acc. to USP Type I Acid resistance (DIN 12116)Class S 1 Alkali resistance (ISO 695)Class A 2 The heavy metal content for the elements lead, cadmium, mercury and hexavalent chromium is below 100 ppm	Ghani Global Glass Ltd., 10-N, Model Town, Lahore.

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
399	70080000	Insulation Glass	Multiple-walled insulating units of glass	Multiple-walled insulating units of glass	-	Harris Silicones & Glass (Pvt.) Ltd., Farooque Industrial Estate, Anam Road, 20km Ferozepur Road, Lahore
400	70101000	Glass Ampoules for packing or conveyance	United StatesPharmacopoeia Neutral Type I Glass		SiO ₂ , BaO, CaO, Al ₂ O ₃ , Na ₂ O, K ₂ O, B ₂ O ₃ , Fe ₂ O ₃ , TiO ₂	Cornpak Ltd., Plot Nos. 11 & 26, Sector 20, Korangi Industrial Area Karachi - 74900
		Clear Ampoule Form:B Form:C Form:D	1 CC to 10 CC	Coefficient of mean linear thermal expansion $\alpha(20^{\circ}\text{C}; 300^{\circ}\text{C})$ acc. to ISO 7991 : 5.5 x10 ⁻⁶ K ⁻¹ Transformation Temperature T:545°C Glass temperature at viscosity I] in dPa.s 10 ¹³ (annealing point)545 °C 10 ^{7.6} (softening point)750 °C 10 ⁴ (working point)1140 °C Density ρ at 25°C 2.38 gcm ⁻³	Hydrolytic resistance acc. to Ph. Eur	Ghani Global Glass Ltd., 10-N, Model Town, Lahore.
		Amber Ampoule Form:B Form:C Form:D	1 CC to 10 CC	Coefficient of mean linear thermal expansion $\alpha(20^{\circ}\text{C}; 300^{\circ}\text{C})$ acc. to ISO 7991 : 5.6 . 10^{6}K^{-1} Transformation Temperature T:550°C Glass temperature at viscosity I] in dPa.s 10^{13} (annealing point)560 °C $10^{7.6}$ (softening point)770 °C 10^{4} (working point)1165 °C Density ρ at 25°C 2.45 gcm ⁻³	Hydrolytic resistance acc. to Ph. Eur	
400	70109000	Clear Vial	1CC to 20 CC	Coefficient of mean linear thermal expansion α (20°C; 300°C) acc. to ISO 7991 : 5.5 x10 ⁻⁶ K ⁻¹ Transformation Temperature T:545°C Glass temperature at viscosity I] in dPa.s 10 ¹³ (annealing point)545 °C 10 ^{7.6} (softening point)750 °C 10 ⁴ (working point)1140 °C Density ρ at 25°C 2.38 gcm ⁻³	Hydrolytic resistance acc. to Ph. Eur	Ghani Global Glass Ltd., 10-N, Model Town, Lahore.
		Amber Vial	1CC to 20 CC	Coefficient of mean linear thermal expansion $\alpha(20^{\circ}\text{C}; 300^{\circ}\text{C})$ acc. to ISO 7991 : 5.6 . 10^{6}K^{-1} Transformation Temperature T:550°C Glass temperature at viscosity I] in dPa.s 10^{13} (annealing point)560 °C $10^{7.6}$ (softening point)770 °C 10^{4} (working point)1165 °C Density ρ at 25°C 2.45 gcm ³	Hydrolytic resistance acc. to Ph. Eur	
401	70111000	Glass Shells 35 Dia, 60 Dia & 80 Dia	Glass Shell 15 W to 200 W			Crown Lighting (Pvt) Ltd., 483/E 1, Tariq road, Peshwar Cantt.
402	70196100	Woven Fabrics of glass fibre rovings	Fiberglass Products			Fibre Tech, 28-E,Safe way House, South Park Avenue, Phase 2,Ext DHA, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
403	70196200	Woven Fabrics of glass fibre rovings	Fiberglass Products			Fibre Tech, 28-E,Safe way House, South Park Avenue, Phase 2,Ext DHA, Karachi
404	70199090	i) Glass Reinforced Epoxy (GRE) Pipes	ASTM D-2996, Length upto 40 ft., dia.upto 600mm, Pressure upto 32 bars, used for Sewerage and drinking water & Chemical transfer lines.	As per Standard	As per Standard	 Business & Engineering Trends, 100-A Wazir Ali Road, Upper Mall, Opposite Lahore Gymkhana Lahore
		ii) Fiber Glass Tank	In-house fabricated: ASTM D-4097-01, ASTM D-3299-00, dia: upto 4m, Length: 12m Field Erected: ASTM D-4097-01, ASTM D-3299-00, dia: upto 10m, Height: 12m	As per requirement	Food Grade, Chemical storage or As per Standard	 Fibre Craft Industries, Canal Bank Hanif Park, Harbanspura Lahore - 54850
		iii) Disconnecting Sticks 12 ft	WAPDA Specification DDS-43:2008			Creative Engineering (Pvt) Ltd., 160/ S, Q.I.E. Kot Lakhpat Lahore
		iv) Glass Reinforced Epoxy (GRE)fittings, i.e. Elbow, Tee, Flange,Reducer & End Cap etc.	ASTM D-2996, Dia. upto 600mm, Pressure up to 32 bars, used for Sewerage and drinking water & Chemical transfer lines.	As per Standard	As per Standard	Fibre Craft Industries, Canal Bank Hanif Park, Harbanspura Lahore - 54850
		v) Fiber Glass Panel Tanks	ASTM D- 3299, ASTM D-4097, Min. Storage: 1000 Liters, Max. Storage: As per requirement	Feasible for colder & hotter environment (-10oC to +80oC) - No Algae Growth	Food Grade, Chemical storage	
		vi) Fiber Glass Manhole	ASTM D-3753, H-20, Length upto 12m, dia.upto 2m	As per requirement	Corrosion Resistant	
		vii) Fiber Glass Manhole covers	ASTM D-3753, H-20, Length upto 12m, dia. 400,500,600,900 mm	As per requirement	Corrosion Resistant	
		viii) Fiber Glass Rebars	ASTM D-7205, ASTM D7617, ASTM D-5117 Strength up to 60,000 psi, dia: 5mm-40mm	As per requirement	Corrosion Resistant	
		ix) Fiber Glass Grating (Molded & Pultruded)	Height from 25mm-60mm	As per requirement	Corrosion Resistant	
		x) Fiber Glass Disconnecting Stick/ Rod	DDS-43:2008, Insulated up to 90kV	As per Standard	As per Standard	
		xi) Tree Trimmer	PP-99	As per Standard	As per Standard	
405	70200090	Glass Reinforced Polyester (GRP) Pipes	Length upto 40 ft., Dia. upto 4000mm, Pressure upto 32 bars, used for Sewerage and drinking water & Chemical transfer lines. ASTM, D-351704, D3262-04, D-3754-04	Food Grade/As per Standard		 Creative Engineering (Pvt) Ltd., 160/ S, Q.I.E. Kot Lakhpat Lahore Business & Engineering Trends, 100-A Wazir Ali Road, Upper Mall, Opposite Lahore Gymkhana Lahore Fibre Craft Industries, Canal Bank Hanif Park, Harbanspura Lahore - 54850
		Glass Reinforced Polyester (GRP) fittings, i.e. Elbow, Tee, Flange, Reducer & End Cap etc.	ASTM D-351704, D-3262-04, D-3754-04 Dia. upto 4000mm, Pressure upto 32 bars, used for Sewerage and drinking water & Chemical transfer lines.	As per Standard	As per Standard	Fibre Craft Industries, Canal Bank Hanif Park, Harbanspura Lahore - 54850
406	72021100	Ferro Manganese High Carbon	Mn: 60% & above, C: 6-7%, Si: 3% max			Fine Steel, (Mughal Steel Group), 17 KM, Sheikhupura Road, Lahore
407	72022100	Ferro Silicon	FeSi 75 Al 2 Si: 55% & above	Crystallized lumps of size 10-80mm + 10%	Silicon 72-80%, Aluminium 1-3%, Carbon 0.2% max, Phosphorus 0.05% max, Sulphur 0.04%	 Al-Abbas Sugar Mills Ltd., 55 Km, Main National Highway, Dhabeji, Distt, Thatta Fine Steel, (Mughal Steel Group), 17 KM, Sheikhupura Road, Lahore
408	72022900	Ferro Silicon	Si: 55% & above			Fine Steel, (Mughal Steel Group), 17 KM, Sheikhupura Road, Lahore
409	72023000	Ferro Silicon Manganese (low Carbon/ High Carbon)	Mn: 60% & Above, C: 0.5 - 2% (Low Carbon) C: More than 2% (High Carbon)			Fine Steel, (Mughal Steel Group), 17 KM, Sheikhupura Road, Lahore
410	72024100	Ferro Chrome	Cr: 55% min. C: 2% min.			Fine Steel, (Mughal Steel Group), 17 KM, Sheikhupura Road, Lahore
411	72024900	Ferro Chrome	Cr: 55% min. C: 2% min.			Fine Steel, (Mughal Steel Group), 17 KM, Sheikhupura Road, Lahore
412	72044910	Re-rollable Scrap				Pakistan Ship Breakers Association, M-1 Mezzanine Floor, Horizon Tower, P/No. 2/6, Commercial Block 3, Sch No. 5, Near Bilawal House Clifton Karachi.

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
413	72044990	Re-meltable Scrap	H.M.S. 1 & 2			Pakistan Ship Breakers Association, M-1 Mezzanine Floor, Horizon Tower, P/No. 2/6, Commercial Block 3, Sch No. 5, Near Bilawal House Clifton Karachi.
414	72045000	Ingots, from remelting scrap of iron or steel	Ms Billets Graded and Non Graded Type: Conteneous closed casted on high frequency induction furnaces. Size: 4" width x 4" hight x 12" length Specs: Being used in all sorts of steel structural products.			 Khawaja Steels, 4 KM, Dewan Road, Eminabad, Gujranwala Fazal Steel (PVT.) Limited, Plot No. 418-421 Industrial Area, I-9, Islamabad
415	72061000	Ingots for re-rolling / Steel Ingots of Iron and non alloy steel in primary forms (excluding iron of heading 72.03)	Size 50X50 to 15X150mm Forgeable ingots in carbon steel upto 50 tons weight Highly refined bottom poured ingots in flat rectangular, round and square sections. Weight : 500kg to 14,000kg. Manufactured as per international quality standards like JIS, Bohler, AISI, DIN, Chinese etc	Air cooled, stress relieved or annealed	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers. See Annex-I	 Heavy Mechanical Complex (Pvt) Ltd., Taxila Fazal Steel (PVT.) Limited, Plot No. 418-421 Industrial Area, I-9, Islamabad Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi Pakistan Association of Large Steel Producers
16	72069000	Steel Ingots of Iron and non alloy steel in primary forms (excluding iron of heading 72.03)	Highly refined bottom poured ingots in flat rectangular, round and square sections. Weight : 500kg to 14,000kg. Standards:JIS, Bohler, AISI, DIN, Chinese etc	Air cooled, stress relieved or annealed	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers. See Annex-I	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi Pakistan Association of Large Steel Producers,
		Cast iron	Casting upto 28 tons (single plece) Steel (low alloyed) casting upto 32 tons (single piece)			 Heavy Mechanical Complex (Pvt) Ltd., Taxila Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi Pakistan Association of Large Steel Producers
		 i) Ingots and Billets of plain carbon steel, spring steels alloys for re- rolling. ii) Forgable Ingots of plain carbon steel iii) Semi-finished products of iron & non-alloy steel 	50mm x 50mm to 150mm x 150mm Upto 50 tons weight (single piece) Ingots upto 9000 Kg weight cast in mould/ESR processed.	Structual Steel Billets, Reinforcment Bar Steel Billets, Wire Rod Steel Billetsa, Cold Heading Steel Billets, Baling Hoops Steel Billets, Spring Steel Billets, Electrode Steel Billets, Seam-Less Steel Tubes & Pipes		 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi Pakistan Association of Large Steel Producers,
17	72071110	Concast billets	Concast billets of square upto 150mm Length : 4000 - 1200 mm	Cont cast billet as per international standard.	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers.	 Heavy Mechanical Complex (Pvt) Ltd., Taxila Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi Fazal Steel (PVT.) Limited, Plot No. 418-421 Industrial Area, I-9, Islamabad Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi Pakistan Association of Large Steel Producers,
18	72071190	Con. Cast billet, square	Con Cast (CC Billet), Square : 110, 125 & 150 mm. Length : 4000 - 1200 mm	Cont cast billet as per international standard.	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers.	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi Pakistan Association of Large Steel Producers,
19	72071210	Con cast billet, Round	Con Cast (CC Billet), Round : Ø110 mm. Length : 4000 - 1200 mm	Cont cast billet as per international standard.	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers.	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi Pakistan Association of Large Steel Producers,
		Structural steel billet for reinforcement steel bars	Sizez: 100mmx100mm, 120mm x 120mm and 150mmx150mm ASTM A-615 & BS 4449		Carbon (C) 0.200-0.250; Manganese (Mn) 1.250, Phosphorus (P) 0.00; Silicon (Si) 0.300; Sulphur (S) 0.002	 S.H.Steel Re Rolling Mills, Plot 50, St 12 I-9 Industrial Area Islamabad Pakistan Association of Large Steel Producers,

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
420	72071910	Con. Cast Bloom	Con Cast (CC Bloom), Square : 230 mm. Length : 4000 - 1200 mm	Cont cast bloom as per international standard.	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers.	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi All Steel Memters
421	72071920	Steel Billets	Con Cast (CC Billet), Square : 110, 125 & 150 mm. Round : Ø110 mm, Length : 4000 - 1200 mm., Hot rolled billet Square : 75, 80, 90, 100, 130 mm Length : 4000 - 6000 mm	Cont cast & rolled billet as per international standard.	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers.	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi, Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi, ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Model Steel Enterprises (Pvt) Ltd., 15-KM, G.T. Road, New Momanpura, Darogawala, Near Quaid-Azam Inter Change, Lahore Pakistan Association of Large Steel Producers
422	72071990	Steel Billets	Con Cast (CC Billet) Square : 110, 125 & 150 mm. Round : Ø110 mm, Length : 4000 - 1200 mm., Hot rolled billet Square : 75, 80, 90, 100, 130 mm, Length : 4000 - 6000 mm Concast and hot rolled/square upto 150 x 150 mm and round upto 150 mm dia forged upto 200 mm rolling section.	Cont cast & rolled billet as per international standard.	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers.	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi, Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi, ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Model Steel Enterprises (Pvt) Ltd., 15-KM, G.T. Road, New Momanpura, Darogawala, Near Quaid-Azam Inter Change, Lahore Fazal Steel (PVT.) Limited, Plot No. 418-421 Industrial Area, I-9, Islamabad Pakistan Association of Large Steel Producers
423	72072010	Con. Cast Bloom	Con Cast (CC Bloom), Square : 230 mm. Length : 4000 - 1200 mm	Cont cast bloom as per international standard.	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers.	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi All Steel Memters
424	72072020	Steel Billets	Con Cast (CC Billet) Square : 110, 125 & 150 mm. Round : Ø110 mm Length : 4000 - 1200 mm. Hot rolled billet Square : 75, 80, 90, 100, 130 mm Length : 4000 - 6000 mm	Cont cast & rolled billet as per international standard.	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers.	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi, Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi, ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Model Steel Enterprises (Pvt) Ltd., 15-KM, G.T. Road, New Momanpura, Darogawala, Near Quaid-Azam Inter Change, Lahore Pakistan Association of Large Steel Producers

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
425	72072090	Steel Billets	Con Cast (CC Billet) Square : 110, 125 & 150 mm. Round : Ø110 mm Length : 4000 - 1200 mm. Hot rolled billet Square : 75, 80, 90, 100, 130 mm Length : 4000 - 6000 mm	Cont cast & rolled billet as per international standard.		 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi, Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi, ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Model Steel Enterprises (Pvt) Ltd., 15-KM, G.T. Road, New Momanpura, Darogawala, Near Quaid-Azam Inter Change, Lahore Pakistan Association of Large Steel Producers
426	72091510	Cold Rolled Coils Of a thickness 3 mm or more	Cold Rolled Carbon Steel Sheets, Strips and Coils - As per JIS G- 3141, ASTM A-1008 (excluding Bake Hardening Steel grade used in manufacturing of outer skin of the automobiles), A 568/ A568M	Yield Point, tensile strength & elongation, Bendability & Hardness as per JIS G 3141, ASTM A-1008 specification or equivalent	As per JIS G 3141 specified steel grades, ASTM A568/ A568M	 International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi Aisha Steel Mills Ltd., DSU-45, Pakistan Steel, Down Stream Industrial Estate, Bin Qasim. Karachi BBJ Steel Limited, 4th Floor, BBJ House, 40 Abbot Road, Lahore.
427	72091590	Cold Rolled Coils Of a thickness 3 mm or more	Cold Rolled Carbon Steel Sheets, Strips and Coils - As per JIS G- 3141, ASTM A-1008 (excluding Bake Hardening Steel grade used in manufacturing of outer skin of the automobiles), A 568/ A568M	Mechanical Properties i.e. Yield Point, tensile strength & elongation, Bendability & Hardness as per JIS G 3141, ASTM A-1008 specification or equivalent	As per JIS G 3141 specified steel grades, ASTM A568/ A568M	 International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi Aisha Steel Mills Ltd., DSU-45, Pakistan Steel, Down Stream Industrial Estate, Bin Qasim. Karachi BBJ Steel Limited, 4th Floor, BBJ House, 40 Abbot Road, Lahore.
428	72091610	i) Cold Rolled Coils Of a thickness exceeding 1 mm but less than 3 mm:	used in manufacturing of outer skin of the automobiles)	- Mechanical Properties i.e. Yield Point, tensile strength & elongation, Bendability & Hardness as per JIS G 3141, ASTM A-1008 specification or equivalent	Chemical composition as per JIS G 3141 specified steel grades	International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
		ii) Cold Rolled Coils (CRC)		Mechanical Properties as per JIS G 3141, ASTM A 1008 specifications, Dimensional tolerances as per JIS G 3141, ASTM A 568/ A 568M	Chemical composition as per JIS G 3141, ASTM A568/ A568M	Aisha Steel Mills Ltd., DSU-45, Pakistan Steel, Down Stream Industrial Estate, Bin Qasim. Karachi
		iii) Cold Rolled Coils of a thickness exceeding 1 mm but less than 3 mm	other auto grades]	As per JIS G-3141, ISO 3574, ASTM A-1008	As per JIS G-3141, ISO 3574, ASTM A-1008	BBJ Steel Limited, 4 th Floor, BBJ House, 40 Abbot Road, Lahore.
429	72091690	i) Cold Rolled Coils Of a thickness exceeding 1 mm but less than 3 mm:	Cold Rolled Carbon Steel Sheets, Strips and Coils - As per JIS G- 3141, ASTM A-1008 (excluding Bake Hardening Steel grade used in manufacturing of outer skin of the automobiles)	Mechanical Properties i.e. Yield Point, tensile strength & elongation, Bendability & Hardness as per JIS G 3141, ASTM A-1008 specification or equivalent	Chemical composition as per JIS G 3141 specified steel grades	International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
		ii) Cold Rolled Coils (CRC)		Mechanical Properties as per JIS G 3141, ASTM A 1008 specifications, Dimensional tolerances as per JIS G 3141, ASTM A 568/ A 568M	Chemical composition as per JIS G 3141, ASTM A568/ A568M	Aisha Steel Mills Ltd., DSU-45, Pakistan Steel, Down Stream Industrial Estate, Bin Qasim. Karachi
		iii) Cold Rolled Coils of a thickness exceeding 1 mm but less than 3 mm		As per JIS G-3141, ISO 3574, ASTM A-1008	As per JIS G-3141, ISO 3574, ASTM A-1008	BBJ Steel Limited, 4 th Floor, BBJ House, 40 Abbot Road, Lahore.

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
430	72091710	 i) Cold Rolled CoilsOf a thickness of 0.5 mm or more but not exceeding 1 mm: 	Cold Rolled Carbon Steel Sheets, Strips and Coils - As per JIS G- 3141, ASTM A-1008 (excluding Bake Hardening Steel grade used in manufacturing of outer skin of the automobiles)	Mechanical Properties i.e. Yield Point, tensile strength & elongation, Bendability & Hardness as per JIS G 3141, ASTM A-1008 specification or equivalent	Chemical composition as per JIS G 3141 specified steel grades	International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
		ii) Cold Rolled Coils (CRC)	Cold Rolled Coils of a thickness 0.5mm or more but not exceeding 1mm JIS G 3141 / ASTM A 1008, A 568/ A568M [Excluding SPCE grade and other auto grades]	Mechanical Properties as per JIS G 3141, ASTM A 1008 specifications, Dimensional tolerances as per JIS G 3141, ASTM A 568/ A 568M	Chemical composition as per JIS G 3141, ASTM A568/ A568M	Aisha Steel Mills Ltd., DSU-45, Pakistan Steel, Down Stream Industrial Estate, Bin Qasim. Karachi
		iii) Cold Rolled Coils of a thickness 0.5 mm or more but not exceeding 1 mm	Cold Rolled Carbon Steel Sheet, Coils and Strips as per JIS G- 3141, ISO 3574, ASTM A-1008 [Excluding SPCE grade and other auto grades]	As per JIS G-3141, ISO 3574, ASTM A-1008	As per JIS G-3141, ISO 3574, ASTM A-1008	BBJ Steel Limited, 4 th Floor, BBJ House, 40 Abbot Road, Lahore.
431	72091790	 i) Cold Rolled Coils Of a thickness of 0.5 mm or more but not exceeding 1 mm: 	Cold Rolled Carbon Steel Sheets, Strips and Coils - As per JIS G- 3141, ASTM A-1008 (excluding Bake Hardening Steel grade used in manufacturing of outer skin of the automobiles)	Mechanical Properties i.e. Yield Point, tensile strength & elongation, Bendability & Hardness as per JIS G 3141, ASTM A-1008 specification or equivalent	Chemical composition as per JIS G 3141 specified steel grades	International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
		ii) Cold Rolled Coils (CRC)	Cold Rolled Coils of a thickness 0.5mm or more but not exceeding 1mm JIS G 3141 / ASTM A 1008, A 568/ A568M [Excluding SPCE grade and other auto grades]	Mechanical Properties as per JIS G 3141, ASTM A 1008 specifications, Dimensional tolerances as per JIS G 3141, ASTM A 568/ A 568M	Chemical composition as per JIS G 3141, ASTM A568/ A568M	Aisha Steel Mills Ltd., DSU-45, Pakistan Steel, Down Stream Industrial Estate, Bin Qasim. Karachi
		iii) Cold Rolled Coils of a thickness0.5 mm or more but not exceeding 1 mm	Cold Rolled Carbon Steel Sheet, Coils and Strips as per JIS G- 3141, ISO 3574, ASTM A-1008 [Excluding SPCE grade and other auto grades]	As per JIS G-3141, ISO 3574, ASTM A-1008	As per JIS G-3141, ISO 3574, ASTM A-1008	BBJ Steel Limited, 4 th Floor, BBJ House, 40 Abbot Road, Lahore.
432	72091810	i) Cold Rolled Coils Of thickness of less than 0.5 mm:	Cold Rolled Carbon Steel Sheets, Strips and Coils - As per JIS G- 3141, ASTM A-1008 (excluding Bake Hardening Steel grade used in manufacturing of outer skin of the automobiles)	Mechanical Properties i.e. Yield Point, tensile strength & elongation, Bendability & Hardness as per JIS G 3141, ASTM A-1008 specification or equivalent	Chemical composition as per JIS G 3141 specified steel grades	International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
		ii) Cold Rolled Coils (CRC)	Cold Rolled Coils of thickness of less than 0.5mm JIS G 3141 / ASTM A 1008, A 568/ A568M [Excluding SPCE grade and other auto grades]	Mechanical Properties as per JIS G 3141, ASTM A 1008 specifications, Dimensional tolerances as per JIS G 3141, ASTM A 568/ A 568M	Chemical composition as per JIS G 3141, ASTM A568/ A568M	Aisha Steel Mills Ltd., DSU-45, Pakistan Steel, Down Stream Industrial Estate, Bin Qasim. Karachi
		iii) Cold Rolled Coils of thickness less than 0.5 mm	Cold Rolled Carbon Steel Sheet, Coils and Strips as per JIS G- 3141, ISO 3574, ASTM A-1008 [Excluding SPCE grade and other auto grades]	As per JIS G-3141, ISO 3574, ASTM A-1008	As per JIS G-3141, ISO 3574, ASTM A-1008	BBJ Steel Limited, 4 th Floor, BBJ House, 40 Abbot Road, Lahore.
433	72091899	i) Cold Rolled Coils Of thickness of less than 0.5 mm:	Cold Rolled Carbon Steel Sheets, Strips and Coils - As per JIS G- 3141, ASTM A-1008 (excluding Bake Hardening Steel grade used in manufacturing of outer skin of the automobiles)	Mechanical Properties i.e. Yield Point, tensile strength & elongation, Bendability & Hardness as per JIS G 3141, ASTM A-1008 specification or equivalent	Chemical composition as per JIS G 3141 specified steel grades	International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
		ii) Cold Rolled Coils (CRC)	Cold Rolled Coils of thickness of less than 0.5mm JIS G 3141 / ASTM A 1008, A 568/ A568M [Excluding SPCE grade and other auto grades]	Mechanical Properties as per JIS G 3141, ASTM A 1008 specifications, Dimensional tolerances as per JIS G 3141, ASTM A 568/ A 568M	Chemical composition as per JIS G 3141, ASTM A568/ A568M	Aisha Steel Mills Ltd., DSU-45, Pakistan Steel, Down Stream Industrial Estate, Bin Qasim. Karachi
		iii) Cold Rolled Coils of thickness less than 0.5 mm	Cold Rolled Carbon Steel Sheet, Coils and Strips as per JIS G- 3141, ISO 3574, ASTM A-1008 [Excluding SPCE grade and other auto grades]	As per JIS G-3141, ISO 3574, ASTM A-1008	As per JIS G-3141, ISO 3574, ASTM A-1008	BBJ Steel Limited, 4 th Floor, BBJ House, 40 Abbot Road, Lahore.
434	72092510	Cold Rolled of a thickness of 3mm or more (Not in Coils)	Cold Rolled Carbon Steel Sheets, Strips and Coils - As per JIS G- 3141, ASTM A-1008 (excluding Bake Hardening Steel grade used in manufacturing of outer skin of the automobiles)	Mechanical Properties i.e. Yield Point, tensile strength & elongation, Bendability & Hardness as per JIS G 3141, ASTM A-1008 specification or equivalent	Chemical composition as per JIS G 3141 specified steel grades	International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
435	72092590	Cold Rolled of a thickness of 3mm or more (Not in Coils)	Cold Rolled Carbon Steel Sheets, Strips and Coils - As per JIS G- 3141, ASTM A-1008 (excluding Bake Hardening Steel grade used in manufacturing of outer skin of the automobiles)	Mechanical Properties i.e. Yield Point, tensile strength & elongation, Bendability & Hardness as per JIS G 3141, ASTM A-1008 specification or equivalent	Chemical composition as per JIS G 3141 specified steel grades	International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
436	72092610	 i) Cold Rolled Of a thickness of exceeding 1 mm but less than 3 mm: (Not in Coils 	Cold Rolled Carbon Steel Sheets, Strips and Coils - As per JIS G- 3141, ASTM A-1008 (excluding Bake Hardening Steel grade used in manufacturing of outer skin of the automobiles)	Mechanical Properties i.e. Yield Point, tensile strength & elongation, Bendability & Hardness as per JIS G 3141, ASTM A-1008 specification or equivalent	Chemical composition as per JIS G 3141 specified steel grades	International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
		ii) Cold Rolled (Not in Coils)	Cold Rolled Coils of thickness exceeding 1mm but less than 3mm JIS G 3141 / ASTM A 1008, A 568/ A568M [Excluding SPCE grade and other auto grades]	Mechanical Properties as per JIS G 3141, ASTM A 1008 specifications, Dimensional tolerances as per JIS G 3141, ASTM A 568/ A 568M	Chemical composition as per JIS G 3141, ASTM A568/ A568M	Aisha Steel Mills Ltd., DSU-45, Pakistan Steel, Down Stream Industrial Estate, Bin Qasim. Karachi
437	72092690	 i) Cold Rolled Of a thickness of exceeding 1 mm but less than 3 mm: (Not in Coils 	Cold Rolled Carbon Steel Sheets, Strips and Coils - As per JIS G- 3141, ASTM A-1008 (excluding Bake Hardening Steel grade used in manufacturing of outer skin of the automobiles)	Mechanical Properties i.e. Yield Point, tensile strength & elongation, Bendability & Hardness as per JIS G 3141, ASTM A-1008 specification or equivalent	Chemical composition as per JIS G 3141 specified steel grades	International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
		ii) Cold Rolled (Not in Coils)	Cold Rolled Coils of thickness exceeding 1mm but less than 3mm JIS G 3141 / ASTM A 1008, A 568/ A568M [Excluding SPCE grade and other auto grades]	Mechanical Properties as per JIS G 3141, ASTM A 1008 specifications, Dimensional tolerances as per JIS G 3141, ASTM A 568/ A 568M	Chemical composition as per JIS G 3141, ASTM A568/ A568M	Aisha Steel Mills Ltd., DSU-45, Pakistan Steel, Down Stream Industrial Estate, Bin Qasim. Karachi
438	72092710	 i) Cold Rolled Of thickness of 0.5 mm or more but not exceeding 1 mm: (Not in Coils) 	Cold Rolled Carbon Steel Sheets, Strips and Coils - As per JIS G- 3141, ASTM A-1008 (excluding Bake Hardening Steel grade used in manufacturing of outer skin of the automobiles)	Mechanical Properties i.e. Yield Point, tensile strength & elongation, Bendability & Hardness as per JIS G 3141, ASTM A-1008 specification or equivalent	Chemical composition as per JIS G 3141 specified steel grades	International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
		ii) Cold Rolled (Not in Coils)	Cold Rolled Coils of a thickness 0.5mm or more but not exceeding 1mm JIS G 3141 / ASTM A 1008, A 568/ A568M [Excluding SPCE grade and other auto grades]	Mechanical Properties as per JIS G 3141, ASTM A 1008 specifications, Dimensional tolerances as per JIS G 3141, ASTM A 568/ A 568M	Chemical composition as per JIS G 3141, ASTM A568/ A568M	Aisha Steel Mills Ltd., DSU-45, Pakistan Steel, Down Stream Industrial Estate, Bin Qasim. Karachi
439	72092790	 i) Cold Rolled Of thickness of 0.5 mm or more but not exceeding 1 mm: (Not in Coils) 	Cold Rolled Carbon Steel Sheets, Strips and Coils - As per JIS G- 3141, ASTM A-1008 (excluding Bake Hardening Steel grade used in manufacturing of outer skin of the automobiles)	Mechanical Properties i.e. Yield Point, tensile strength & elongation, Bendability & Hardness as per JIS G 3141, ASTM A-1008 specification or equivalent	Chemical composition as per JIS G 3141 specified steel grades	International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
		ii) Cold Rolled (Not in Coils)	Cold Rolled Coils of a thickness 0.5mm or more but not exceeding 1mm JIS G 3141 / ASTM A 1008, A 568/ A568M [Excluding SPCE grade and other auto grades]	Mechanical Properties as per JIS G 3141, ASTM A 1008 specifications, Dimensional tolerances as per JIS G 3141, ASTM A 568/ A 568M	Chemical composition as per JIS G 3141, ASTM A568/ A568M	Aisha Steel Mills Ltd., DSU-45, Pakistan Steel, Down Stream Industrial Estate, Bin Qasim. Karachi
440	72092810	i) Cold Rolled Of thickness of less than 0.5 mm: (Not in coils)	Cold Rolled Carbon Steel Sheets, Strips and Coils - As per JIS G- 3141, ASTM A-1008 (excluding Bake Hardening Steel grade used in manufacturing of outer skin of the automobiles)	Mechanical Properties i.e. Yield Point, tensile strength & elongation, Bendability & Hardness as per JIS G 3141, ASTM A-1008 specification or equivalent	Chemical composition as per JIS G 3141 specified steel grades	International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
		ii) Cold Rolled (Not in Coils)	Cold Rolled Coils of thickness of less than 0.5mm JIS G 3141 / ASTM A 1008, A 568/ A568M [Excluding SPCE grade and other auto grades]	Mechanical Properties as per JIS G 3141, ASTM A 1008 specifications, Dimensional tolerances as per JIS G 3141, ASTM A 568/ A 568M	Chemical composition as per JIS G 3141, ASTM A568/ A568M	Aisha Steel Mills Ltd., DSU-45, Pakistan Steel, Down Stream Industrial Estate, Bin Qasim. Karachi
441	72092890	i) Cold Rolled Of thickness of less than 0.5 mm: (Not in coils)	Cold Rolled Carbon Steel Sheets, Strips and Coils - As per JIS G- 3141, ASTM A-1008(excluding Bake Hardening Steel grade used in manufacturing of outer skin of the automobiles)		Chemical composition as per JIS G 3141 specified steel grades	International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
		ii) Cold Rolled (Not in Coils)	Cold Rolled Coils of thickness of less than 0.5mm JIS G 3141 / ASTM A 1008, A 568/ A568M [Excluding SPCE grade and other auto grades]	Mechanical Properties as per JIS G 3141, ASTM A 1008 specifications, Dimensional tolerances as per JIS G 3141, ASTM A 568/ A 568M	Chemical composition as per JIS G 3141, ASTM A568/ A568M	Aisha Steel Mills Ltd., DSU-45, Pakistan Steel, Down Stream Industrial Estate, Bin Qasim. Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
442	72099010	i) Cold Rolled Coils Of 3 mm and above:	Cold Rolled Carbon Steel Sheets, Strips and Coils - As per JIS G- 3141, ASTM A-1008 (excluding Bake Hardening Steel grade used in manufacturing of outer skin of the automobiles)	Mechanical Properties i.e. Yield Point, tensile strength & elongation, Bendability & Hardness as per JIS G 3141, ASTM A-1008 specification or equivalent	Chemical composition as per JIS G 3141 specified steel grades	International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
		ii) Cold Rolled Coils (CRC)	Cold Rolled Coils of thickness 3mm or more JIS G 3141 / ASTM A 1008, A 568/ A568M [Excluding SPCE grade and other auto grades]	Mechanical Properties as per JIS G 3141, ASTM A 1008 specifications, Dimensional tolerances as per JIS G 3141, ASTM A 568/ A 568M	Chemical composition as per JIS G 3141, ASTM A568/ A568M	Aisha Steel Mills Ltd., DSU-45, Pakistan Steel, Down Stream Industrial Estate, Bin Qasim. Karachi
		iii) Cold Rolled Coils of 3 mm or above	Cold Rolled Carbon Steel Sheet, Coils and Strips as per JIS G- 3141, ISO 3574, ASTM A-1008 [Excluding SPCE grade and other auto grades]	As per JIS G-3141, ISO 3574, ASTM A-1008	As per JIS G-3141, ISO 3574, ASTM A-1008	BBJ Steel Limited, 4 th Floor, BBJ House, 40 Abbot Road, Lahore.
443	72099090	i) Cold Rolled Coils Of 3 mm and above:	Cold Rolled Carbon Steel Sheets, Strips and Coils - As per JIS G- 3141, ASTM A-1008 (excluding Bake Hardening Steel grade used in manufacturing of outer skin of the automobiles)	Mechanical Properties i.e. Yield Point, tensile strength & elongation, Bendability & Hardness as per JIS G 3141, ASTM A-1008 specification or equivalent	Chemical composition as per JIS G 3141 specified steel grades	International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
		ii) Cold Rolled Coils (CRC)	Cold Rolled Coils of thickness 3mm or more JIS G 3141 / ASTM A 1008, A 568/ A568M [Excluding SPCE grade and other auto grades]	Mechanical Properties as per JIS G 3141, ASTM A 1008 specifications, Dimensional tolerances as per JIS G 3141, ASTM A 568/ A 568M	Chemical composition as per JIS G 3141, ASTM A568/ A568M	Aisha Steel Mills Ltd., DSU-45, Pakistan Steel, Down Stream Industrial Estate, Bin Qasim. Karachi
		iii) Cold Rolled Coils of 3 mm or above	Cold Rolled Carbon Steel Sheet, Coils and Strips as per JIS G- 3141, ISO 3574, ASTM A-1008 [Excluding SPCE grade and other auto grades]	As per JIS G-3141, ISO 3574, ASTM A-1008	As per JIS G-3141, ISO 3574, ASTM A-1008	BBJ Steel Limited, 4 th Floor, BBJ House, 40 Abbot Road, Lahore.
444	72101210	Electrolytic Tin Plate	Tin plates, of types: - SRT1 to SR T5, having thickness 0.14 mm to 0.48 mm and width up to 965 mm - DR 8 to DR 10, having a thickness of 0.13 mm to 0.4 mm and width upto 965 mm Conforming to European Standards EN 10002-1-1990 & EN 10203 – 1-1991			Siddiqsons Tin Plate Limited, D-53, Textile Avenue, S.I.T.E., Karachi – 75700
445	72101290	Electrolytic Tin Plate	Tin plates, of types: - SRT1 to SR T5, having thickness 0.14 mm to 0.48 mm and width up to 965 mm - DR 8 to DR 10, having a thickness of 0.13 mm to 0.4 mm and width upto 965 mm Conforming to European Standards EN 10002-1-1990 & EN 10203 – 1-1991			Siddiqsons Tin Plate Limited, D-53, Textile Avenue, S.I.T.E., Karachi – 75700
446	72104110	Corrugated:	Hot Dip Zinc Coated Corrugated Sheets As per all International Standards			International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
447	72104190	Corrugated:	Hot Dip Zinc Coated Corrugated Sheets As per all International Standards			International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
448	72104910	Galvanized Steel	Hot Dip Zinc Coated Steel Sheets, Strips and Coils As per JIS G- 3302, ASTM A-653	Mechanical Properties as per JIS G 3302, ASTM A 653/ A653M specifications, Dimensional tolerances as per JIS G 3302, ASTM A 924/ A924M	Chemical composition as per JIS G 3302, ASTM A 653 / A 653M	 International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi Aisha Steel Mills Ltd., DSU-45, Pakistan Steel, Down Stream Industrial Estate, Bin Qasim. Karachi
449	72104990	Galvanized Steel	Hot Dip Zinc Coated Steel Sheets, Strips and Coils As per JIS G- 3302, ASTM A-653	Mechanical Properties as per JIS G 3302, ASTM A 653/ A653M specifications, Dimensional tolerances as per JIS G 3302, ASTM A 924/ A924M	Chemical composition as per JIS G 3302, ASTM A 653 / A 653M	 International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi Aisha Steel Mills Ltd., DSU-45, Pakistan Steel, Down Stream Industrial Estate, Bin Qasim. Karachi
450	72107020	Color Coated	Continuously organic coated (color coated) steel flat products including Color Coated Corrugated As per EN10169, JIS G- 3312, ASTM A-755			International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
451	72107090	Color Coated	Continuously organic coated (color coated) steel flat products including Color Coated Corrugated, As per EN10169, JIS G- 3312, ASTM A-755			International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
452	72109010	Other	Continuously organic coated (color coated) steel flat products including Color Coated Corrugated, As per EN10169, JIS G- 3312, ASTM A-755			International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
453	72109090	Other	Continuously organic coated (color coated) steel flat products including Color Coated Corrugated, As per EN10169, JIS G- 3312, ASTM A-755			International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
454	72111310	Steel sheets & plates (Hot rolled)	Width : 950 mm - 1500 mm Length : Up to 3000 mm	Black surface	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
455	72111390	Steel sheets & plates (Hot rolled)	Width : 950 mm - 1500 mm Length : Up to 3000 mm	Black surface	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
456	72111410	Steel plates & sheets (Hot rolled)	Width : 1500 mm (max.) Length : Up to 12000 mm, depending upon thickness & width	Black surface	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
457	72111490	Steel plates & sheets (Hot rolled)	Width : 1500 mm (max.) Length : Up to 12000 mm, depending upon thickness & width	Black surface	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
458	72111990	Iron or Steel Strips	CR steel strips thickness range: 04 to 2.8mm sizes: available in all types and sizes			International Industries Ltd., LX 15-16, Landhi Industrial Area, Karachi
459	72111920	Cold Rolled Steel strips of thickness exceeding 0.5mm	Cold Rolled Carbon Steel Sheets, Strips and Coils - As per JIS G- 3141, ASTM A-1008 (excluding Bake Hardening Steel grade used in manufacturing of outer skin of the automobiles) As per BSS-4461-1969, ASTM-A36-75, ASTM-615-76a (1977)	Mechanical Properties i.e. Yield Point, tensile strength & elongation, Bendability & Hardness as per JIS G 3141, ASTM A-1008 specification or equivalent	Chemical composition as per JIS G 3141 specified steel grades	 International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi Metropolitan Steel Corporation Limited, 706- Progressive Plaza, 101-Bemount Road, Karachi
460	72111990	Cold Rolled Steel strips of thickness exceeding 0.5mm	Cold Rolled Carbon Steel Sheets, Strips and Coils - As per JIS G- 3141, ASTM A-1008 (excluding Bake Hardening Steel grade used in manufacturing of outer skin of the automobiles) As per BSS-4461-1969, ASTM-A36-75, ASTM-615-76a (1977)	Mechanical Properties i.e. Yield Point, tensile strength & elongation, Bendability & Hardness as per JIS G 3141, ASTM A-1008 specification or equivalent	Chemical composition as per JIS G 3141 specified steel grades	 International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi Metropolitan Steel Corporation Limited, 706- Progressive Plaza, 101-Bemount Road, Karachi
461	72121000	Flat Rolled Products -Electrolytically plated or coated with zinc	Barrages,Sugar industry,cement plants and other industries.			TDFC (Pvt) Ltd., East Pharange Drainage, Millat Town, Millat Road, Faisalabad
462	72123010	Galvanized Steel Strips of a width less than 600 mm	Hot Dip Zinc Coated Steel Sheets, Strips and Coils As per JIS G-3302, ASTM A-653		-	International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
463	72123090	Galvanized Steel Strips of a width less than 600 mm	Hot Dip Zinc Coated Steel Sheets, Strips and Coils As per JIS G-3302, ASTM A-653			International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
464	72125010	Color Steel Strips of a width less than 600 mm	Continuously organic coated (color coated) steel flat products including Color Coated Corrugated As per EN10169, JIS G-3312, ASTM A-755			International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
465	72125090	Color Steel Strips of a width less than 600 mm	Continuously organic coated (color coated) steel flat products including Color Coated Corrugated As per EN10169, JIS G-3312, ASTM A-755			International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
466	72126090	i) M.S. Flat Bar (Hot Rolled)	Range 32 to 300mm Length = 6 to 12 Mtr.	ASTM A-36, SR-24, AISI-1010 and as per Pakistan Steel and Peoples Steel Mills Standard.	As Per Standard	Jabbar Steel Industry, A-46/C S.I.T.E Near Pakistan Cable Karachi.
		ii) Gilding Metal Clad Steel	Def-Stan 95-9, IU-92, BS-2870, EN-1652	0.5 mm-05 mm thick, in coils/sheets	Steel sheet core with 10% cladding of copper 99.9%	Wah Brass Mills (Pvt) Ltd., Quaid Avenue (Adjacent POF Main Gate), Wah Cantt.

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
467	72131010	M.S. Bars, Deformed Bar & Tor Bar (Hot Rolled)	Range 25 to 60mm Length = 6 to 12 Mtr.	ASTM-615, ASTM A-36, SR-24, G-60 & 40 and as per Pakistan Steel and Peoples Steel Mills Standard. Yield Strength 73,000 psi Tensile Strength 94,000 psi Elongation in 8 inches 17%	As Per Standard/ Carbon = 0.27% Sulfur = 0.015% Magnese = 0.98% Phosphorus = 0.023% Silicon = 0.24%	 Jabbar Steel Industry, A-46/C S.I.T.E Near Pakistan Cable Karachi. Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi, Horizon Steel (Pvt) Ltd., D-93, Block-4, Kehkshan, Clifton, Karachi Razaque Steels (Pvt) Ltd., B-30(B), Estate Avenue Sher Shah, S.I.T.E. Karachi Fazal Steel (PVT.) Limited, Plot No. 418-421 Industrial Area, I-9, Islamabad Pakistan Association of Large Steel Producers Faizan Steel,B-37/B-69, S.I.T.E., Karachi
468	72131090	i) Hot Rolled Deformed Bars of Iron or non-alloy steel	BSS-4461-1969, BSS 4449-2005, ASTM-A36-75, ASTM-615- 76a (1977)	As per standard	As per standard	 Metropolitan Steel Corporation Limited, 706- Progressive Plaza, 101-Bemount Road, Karachi Agha Steel Industries, Plot No. NWIZ/I/P- 133(SP-6) D-2, Port Qasim Authority, Karachi ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Horizon Steel (Pvt) Ltd., D-93, Block-4, Kehkshan, Clifton, Karachi Razaque Steels (Pvt) Ltd., B-30(B), Estate Avenue Sher Shah, S.I.T.E. Karachi Fazal Steel (PVT.) Limited, Plot No. 418-421 Industrial Area, 1-9, Islamabad Pakistan Association of Large Steel Producers
		ii) Hot Rolled Deformed Bars of Iron or non-alloy steel	Hot Rolled; Diameter : 18 - 60 mm Length : 4000 - 8000mm	Black surface	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers. See Annex-1	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Horizon Steel (Pvt) Ltd., D-93, Block-4, Kehkshan, Clifton, Karachi Razaque Steels (Pvt) Ltd., B-30(B), Estate Avenue Sher Shah, S.I.T.E. Karachi Pakistan Association of Large Steel Producers

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company	<u>Annex-I (</u>
		iii) Hot Rolled Deformed Bars of Iron or non-alloy steel	ASTM grade 60, BS4449, DIN 488	ASTM grade 60, Tensile Strength 450N/mm sq, Yield Strength 680N/mm sq	C> 0.32%, Mn >1.3%,	 Dost Steels (Pvt) Ltd., 101 Chapal Plaza, Hasrat Mohani Road, Karachi Agha Steel Industries, Plot No. NWIZ/I/P- 133(SP-6) D-2, Port Qasim Authority, Karachi Model Steel Enterprises (Pvt) Ltd., 15-KM, G.T. Road, New Momanpura, Darogawala, Near Quaid-e-Azam Inter Change, Lahore ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Horizon Steel (Pvt) Ltd., D-93, Block-4, Kehkshan, Clifton, Karachi Razaque Steels (Pvt) Ltd., B-30(B), Estate Avenue Sher Shah, S.I.T.E. Karachi Pakistan Association of Large Steel Producers 	
		irregularly wound coils of iron or non- alloy steel	Coils of deformed steel. Dia. > 5.5 mm and <12 mm. weight >75 kg. Standard: JIG G 3506-80, ASTM A 615-82 (Containing indentations, ribs, grooves or other deformations produced during the rolling process)	Yield strength greater 30,000 psi.	Si: 0.04 % to 0.40 % P: greater than 0.03 % S: greater than 0.03 %	 Frontier Foundry (Pvt) Ltd., Plot No. 166, Road B-7, Hayatabad Industrial Estate, Peshawar Agha Steel Industries, Plot No. NWIZ/I/P- 133(SP-6) D-2, Port Qasim Authority, Karachi ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Horizon Steel (Pvt) Ltd., D-93, Block-4, Kehkshan, Clifton, Karachi Pakistan Association of Large Steel Producers, 	
		Wire Rod (irregular wound coils), circular cross section measuring		As per SAE, AISI, ASTM, EN and other International Standards	As per SAE, AISI, ASTM, EN and other International Standards	Horizon Steel (Pvt) Ltd., D-93, Block-4, Kehkshan, Clifton, Karachi	
		-		Tensile Strength 94,000 psi	Carbon = 0.25% Sulfur = 0.035% Magnese = 1.25% Phosphorus = 0.023% Silicon = 0.24%	Faizan Steel,B-37/B-69, S.I.T.E., Karachi	
		2	BS-4449 Grade - B 500 C	Yield Strength 72,500 psi Tensile Strength 95,000 psi Elongation in 8 inches 12% - 15%	Carbon = 0.24%, Sulfur = 0.055%, Magnese = 1.25%, Phosphorus = 0.023%, Silicon = 0.24%, Copper = 0.82%, Nitrogen = 0.013%	Faizan Steel,B-37/B-69, S.I.T.E., Karachi	
469			6.4 mm to 300mm Length = 6 to 12 Mtr.	ASTM A-36, SR-24, AISI-1010 and as per Pakistan Steel and Peoples Steel Mills Standard.	As Per Standard	 Jabbar Steel Industry, A-46/C S.I.T.E Near Pakistan Cable Karachi. ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Horizon Steel (Pvt) Ltd., D-93, Block-4, Kehkshan, Clifton, Karachi Pakistan Association of Large Steel Producers 	

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
470	72132090	i) Hot Rolled Bars & Rods of Non- Alloyed (Low/Plain Carbon) Steel (Irregular Wound Coils)	6.4 mm to 60 mm dia			 ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Horizon Steel (Pvt) Ltd., D-93, Block-4, Kehkshan, Clifton, Karachi Pakistan Association of Large Steel Producers
		ii) Hot Rolled Bars and rods in irregularly wound coils of iron or non- alloy steel (Other, of free cutting steel)	Steel wire-rod (with no indentation or ribs). Diameter of greater than 5.5 mm and less 12 mm. Coil weight of greater than 75 kg. Standard: JIG G 3506-80, ASTM A 615-82 SAE 1006, SAE 1008, SAE 1010, SAE 1015, SAE 1020, SAE 1025, EWNR, EH10K, ER70SG, EA2, SAE 1030, SAE 1038, SAE 1040	Elongation greater then 20 %. Yield strength greater 30,000 psi.	C: 0.05 % to 0.50 % Mn: 0.30 % to 0.90 % Si: 0.04 % to 0.40 % P: greater than 0.03 % S: greater than 0.03 %	 Frontier Foundry (Pvt) Ltd., Plot No. 166, Road B-7, Hayatabad Industrial Estate, Peshawar Abbas Engineering Industries Ltd., DSU-2, Bin Qasim - Karachi – 75000 Abbas Steel Industries (Pvt) Ltd., Plot No. 8, Sector 19, Korangi Industrial Area Karachi Al-Abbas Steel (Pvt) Ltd., Plot No. 9, Sector 19, Korangi Industrial Area Karachi Al-Abbas Steel (Pvt) Ltd., Plot No. 9, Sector 19, Korangi Industrial Area Karachi Horizon Generation (Antional Area Karachi) Horizon Steel (Pvt) Ltd., D-93, Block-4, Kehkshan, Clifton, Karachi Fazal Steel (PVT.) Limited, Plot No. 418-421 Industrial Area, 1-9, Islamabad Pakistan Association of Large Steel Producers
471	72139110	Steel Wire Rod	5.5mm to 12 mm SWRH 42A to 42 B, Medium Carbon ASTM. JIS, All International Spec's	Plain Round	SWRH 42 A to 42 B C% = 0.39/0.46, Mn% = 0.40/0.80, P% Max = 0.030, S % Max = 0.030, Si% = 015/0.30	 ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Horizon Steel (Pvt) Ltd., D-93, Block-4, Kehkshan, Clifton, Karachi
472	72139191	Hot Rolled (Non-Alloyed) Steel Wire Rod (irregular wound coils), circular cross section measuring 5.5mm to 20mm in diameter.	SAE 1006, SAE 1008, SAE 1010, SAE 1015, SAE 1020, SAE 1025, EWNR, EH10K, ER70SG, EA2, SAE 1030, SAE 1038, SAE 1040	As per SAE, AISI, ASTM, EN and other International Standards	As per SAE, AISI, ASTM, EN and other International Standards	 ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Horizon Steel (Pvt) Ltd., D-93, Block-4, Kehkshan, Clifton, Karachi
473	72139199	Hot Rolled (Non-Alloyed) Steel Wire Rod (irregular wound coils), circular cross section measuring 5.5mm to 20mm in diameter.	SAE 1006, SAE 1008, SAE 1010, SAE 1015, SAE 1020, SAE 1025, EWNR, EH10K, ER70SG, EA2, SAE 1030, SAE 1038, SAE 1040	As per SAE, AISI, ASTM, EN and other International Standards	As per SAE, AISI, ASTM, EN and other International Standards	 ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Horizon Steel (Pvt) Ltd., D-93, Block-4, Kehkshan, Clifton, Karachi
474	72139990	i) Steel Wire Rod	5.5mm to 12 mm SWRH 42A to 42 B, Medium Carbon ASTM. JIS, All International Spec's	Plain Round	SWRH 42 A to 42 B C% = 0.39/0.46, Mn% = 0.40/0.80, P% Max = 0.030, S % Max = 0.030, Si% = 015/0.30	 Sandal Bar Rolling Mills (Pvt) Ltd., 1st Floor 48 Nishtar Road, Lahore ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Horizon Steel (Pvt) Ltd., D-93, Block-4, Kehkshan, Clifton, Karachi Pakistan Association of Large Steel Producers
		ii) Hot Rolled (Non-Alloyed) Steel Wire Rod (irregular wound coils), circular cross section measuring 5.5mm to 20mm in diameter.	SAE 1006, SAE 1008, SAE 1010, SAE 1015, SAE 1020, SAE 1025, EWNR, EH10K, ER70SG, EA2, SAE 1030, SAE 1038, SAE 1040	As per SAE, AISI, ASTM, EN and other International Standards	As per SAE, AISI, ASTM, EN and other International Standards	 ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Horizon Steel (Pvt) Ltd., D-93, Block-4, Kehkshan, Clifton, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
475	72141010	 Bars, iron or non alloy steel, forged, hot-rolled 	Press forging: Shafts:Dia 700 mm(max.), Disc dia:1500 mm(Max), Length:8000 mm(max.) Weight:12 mt. Radial Forging: Square, Round, & Varying section profile, axles of cross section 60 mm to 200 mm and flat 30-150 mm & width 60-180 mm, Length 4000-6000 mm	Black surface	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers. See Annex-I	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
		ii) Steel Bars	Grade 60 5.5mm to 32mm ASTM. JIS, All International Spec's	Plain Round, Deform Bars & Twisted	Grade 60 C% = 0.28/0.33, Mn% = 1.15/1.35, P% Max = 0.045, S % Max = 0.045, Si% = 0.35 max, (C+Mn)/6% = 0.47/0.55	 Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi Agha Steel Industries, Plot No. NWIZ/I/P- 133(SP-6) D-2, Port Qasim Authority, Karachi
476	72141090	 Bars, iron or non alloy steel, forged, hot-rolled 	Press forging: Shafts:Dia 700 mm(max.), Disc dia:1500 mm(Max), Length:8000 mm(max.) Weight:12 mt. Radial Forging: Square, Round, & Varying section profile, axles of cross section 60 mm to 200 mm and flat 30-150 mm & width 60-180 mm, Length 4000-6000 mm	Black surface	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
		ii) Steel Bars	Grade 60 5.5mm to 32mm ASTM. JIS, All International Spec's	Plain Round, Deform Bars & Twisted	Grade 60 C% = 0.28/0.33, Mn% = 1.15/1.35, P% Max = 0.045, S % Max = 0.045, Si% = 0.35 max, (C+Mn)/6% = 0.47/0.55	 Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi Agha Steel Industries, Plot No. NWIZ/I/P- 133(SP-6) D-2, Port Qasim Authority, Karachi
477	72142010	i) Steel Bars	Grade 60 5.5mm to 32mm ASTM. JIS, All International Spec's	Plain Round, Deform Bars & Twisted	Grade 60 C% = 0.28/0.33, Mn% = 1.15/1.35, P% Max = 0.045, S % Max = 0.045, Si% = 0.35 max, (C+Mn)/6% = 0.47/0.55	 Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi Agha Steel Industries, Plot No. NWIZ/I/P- 133(SP-6) D-2, Port Qasim Authority, Karachi
		ii) Hot rolled, deformed bars	Hot Rolled; Diameter : 12 - 80 mm Length : 4000 - 6000mm	Black surface	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers.	 Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi Agha Steel Industries, Plot No. NWIZ/I/P- 133(SP-6) D-2, Port Qasim Authority, Karachi
		iii) Rolled Profiles	Containing indentation ribs, grooves or Others deformations produced during the rolling process or twisted after rolling, 6.4 mm to 60 mm dia			 Shalimar Steel, Karachi Razzaque Steel (Pvt) Ltd.Karachi Amreli Steels (Pvt) Ltd., D - 89, Shershah Road SITE, Karachi New Shalimar Steel, Karachi Fazal Steel (PVT.) Limited, Plot No. 418-421 Industrial Area, I-9, Islamabad
478	72142090	 Hot rolled, deformed bars 	Hot Rolled; Diameter : 12 - 80 mm Length : 4000 - 6000mm	Black surface	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers.	 Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi Agha Steel Industries, Plot No. NWIZ/I/P- 133(SP-6) D-2, Port Qasim Authority, Karachi
		ii) Rolled Profiles	Containing indentation ribs, grooves or Others deformations produced during the rolling process or twisted after rolling, 6.4 mm to 60 mm dia			 Shalimar Steel, Karachi Razzaque Steel (Pvt) Ltd.Karachi Amreli Steels (Pvt) Ltd., D - 89, Shershah Road SITE, Karachi New Shalimar Steel, Karachi Fazal Steel (PVT.) Limited, Plot No. 418-421 Industrial Area, I-9, Islamabad
479	72143010	 i) Steel Bars and Rods 	Free cutting steel, 6.4 mm to 60 mm dia			 Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi Agha Steel Industries, Plot No. NWIZ/I/P- 133(SP-6) D-2, Port Qasim Authority, Karachi Fazal Steel (PVT.) Limited, Plot No. 418-421 Industrial Area, I-9, Islamabad

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		Bars of free-cutting steel, hot- rolled, forged	Diameter : 18 - 130 mm, Length 4000 - 6000mm	Black surface	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers.	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi Agha Steel Industries, Plot No. NWIZ/I/P- 133(SP-6) D-2, Port Qasim Authority, Karachi
480	72143090	i) Steel Bars and Rods	Free cutting steel, 6.4 mm to 60 mm dia			 Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi Agha Steel Industries, Plot No. NWIZ/I/P- 133(SP-6) D-2, Port Qasim Authority, Karachi Fazal Steel (PVT.) Limited, Plot No. 418-421 Industrial Area, I-9, Islamabad
		ii) Bars of free-cutting steel, hot- rolled, forged	Diameter : 18 - 130 mm, Length 4000 - 6000mm	Black surface	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers.	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi Agha Steel Industries, Plot No. NWIZ/I/P- 133(SP-6) D-2, Port Qasim Authority, Karachi
481	72149110	i) Steel Bars and Rods	Rectangular (other than square) Cross Section 6.4 mm to 60 mm dia			 Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi Agha Steel Industries, Plot No. NWIZ/I/P- 133(SP-6) D-2, Port Qasim Authority, Karachi Fazal Steel (PVT.) Limited, Plot No. 418-421 Industrial Area, I-9, Islamabad
		ii) Steel Flat Bars	Flat Bars Size : 6 x 40 mm - 20 x 110 mm Length 4000 - 6000mm	Black surface	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers.	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi
482	72149190	i) Steel Flat Bars	Flat Bars Size : 6 x 40 mm - 20 x 110 mm Length 4000 - 6000mm	Black surface	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers.	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi
		ii) Steel Bars and Rods	Rectangular (other than square) Cross Section 6.4 mm to 60 mm dia			 Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi Agha Steel Industries, Plot No. NWIZ/I/P- 133(SP-6) D-2, Port Qasim Authority, Karachi Fazal Steel (PVT.) Limited, Plot No. 418-421 Industrial Area, I-9, Islamabad
483	72151010	i) Bars and Rods	5.5 mm to 12 mm in coils			 ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Pakistan Association of Large Steel Producers
		ii) Bars of free-cutting & other alloy steel, cold-formed/ finished	Cold drawn bars; Diameter : 12 - 80 mm Length : 4000 - 6000mm	Black surface	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers.	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Horizon Steel (Pvt) Ltd., D-93, Block-4, Kehkshan, Clifton, Karachi Pakistan Association of Large Steel Producers

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
484	72151090	Bars and Rods	5.5 mm to 12 mm in coils Cold drawn bars; Diameter : 12 - 80 mm, Length : 4000 - 6000mm		All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers.	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Horizon Steel (Pvt) Ltd., D-93, Block-4, Kehkshan, Clifton, Karachi Pakistan Association of Large Steel Producers
485	72155010	Bars of free-cutting & other alloy steel, cold-formed/ finished	Cold drawn bars; Diameter : 12 - 80 mm, Length : 4000 - 6000mm	Black surface	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers. See Annex-I	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Horizon Steel (Pvt) Ltd., D-93, Block-4, Kehkshan, Clifton, Karachi Pakistan Association of Large Steel Producers
486	72155090	Bars of free-cutting & other alloy steel, cold-formed/ finished	Cold drawn bars; Diameter : 12 - 80 mm, Length : 4000 - 6000mm	Black surface	All type of carbon steel grades. Chemical composition as per international quality standards or as specified by customers.	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Horizon Steel (Pvt) Ltd., D-93, Block-4, Kehkshan, Clifton, Karachi Pakistan Association of Large Steel Producers
487	72159010	Bars and rods of iron or non- alloy steel	As per Standard	As per Standard	As per Standard	 ASG Metals Ltd., EIZ/ LL/SP-08, Eastern, Industrial Zone, Port Qasim Authority, Karachi Horizon Steel (Pvt) Ltd. D-93, Block-4, Kehkshan, Clifton, Karachi Pakistan Association of Large Steel Producers
488	72159090	Bars and rods of iron or non- alloy steel	As per Standard	As per Standard	As per Standard	 ASG Metals Ltd., EIZ/ LL/SP-08, Eastern, Industrial Zone, Port Qasim Authority, Karachi Horizon Steel (Pvt) Ltd. D-93, Block-4, Kehkshan, Clifton, Karachi Pakistan Association of Large Steel Producers
489	72161000	Steel Sections (U, I or H) not further worked than hot- rolled, hot- drawn or extruded, of a height of less than 80 mm	 Thickness upto 12 mm (for HR materials), length upto 12 m Blank width 100-600 mm UTS = 275 N/mm² Excl. those conforming to ASTM A-572 or equivalent. (Blank width 100 to 600 mm and UTS upto 65 Kg/mm²) Th. upto 10 mm & size 250 x 250 mm Th. upto 10 mm and size upto 40 x 250 mm Upto IPN 450, Upto 450 x 450 	(ASTM A-36, SR-24, A572, SRJ 275)		 Ishtiaq Steel Industry, 43-B PECO Road Badami Bagh Lahore. ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Model Steel Enterprises (Pvt) Ltd., 15-KM, G.T. Road, New Momanpura, Darogawala, Near Quaid-e-Azam Inter Change, Lahore Batala Steel, Near Kot Abdul Malik Motorway Interchange, Lahore Sheikhupura Road, Lahore Pakistan Association of Large Steel Producers

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
490	72162100	L sections, not further worked than hot-rolled, hot drawn or extruded, of a height of less than 80mm	As per BSS-4461-1969, ASTM-A36-75, ASTM-615-76a (1977)	(ASTM A-36, SR-24, A572, SRJ 275)		 Ishtiaq Steel Industry, 43-B PECO Road Badami Bagh Lahore. ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Batala Steel, Near Kot Abdul Malik Motorway Interchange, Lahore Sheikhupura Road, Laotre Metropolitan Steel Corporation Limited, 706- Progressive Plaza, 101-Bemount Road, Karachi
491	72162200		Range 50 x 50 to 150 x 150mm Length = 6 to 12 Mtr.	(ASTM A-36, SR-24, A572, SRJ 275) and as per Pakistan Steel and Peoples Steel Mills Standard.	As Per Standard	 Ishtiaq Steel Industry, 43-B PECO Road Badami Bagh Lahore. ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Batala Steel, Near Kot Abdul Malik Motorway Interchange, Lahore Sheikhupura Road, Laotre Jabbar Steel Industry, A-46/C S.I.T.E Near Pakistan Cable Karachi.
492	72163110	U sections, not further worked than hot-rolled, hot drawn or extruded, of a height of 80mm or more	U sections of a height exceeding 150mm Size: 304mm x 100mm	(ASTM A-36, SR-24, A572, SRJ 275)		 Ishtiaq Steel Industry, 43-B PECO Road Badami Bagh Lahore. ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Batala Steel, Near Kot Abdul Malik Motorway Interchange, Lahore Sheikhupura Road, Laotre
493		U sections, not further worked than hot-rolled, hot drawn or extruded, of a height of 80mm or more	U sections of a height above 80mm upto 150mm	(ASTM A-36, SR-24, A572, SRJ 275)		 Ishtiaq Steel Industry, 43-B PECO Road Badami Bagh Lahore. ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Batala Steel, Near Kot Abdul Malik Motorway Interchange, Lahore Sheikhupura Road, Laotre
494		I sections, not further worked than hot-rolled, hot drawn or extruded, of a height of 80mm or more	I sections of a height exceeding 200mm Size: 457mm x 175mm	(ASTM A-36, SR-24, A572, SRJ 275)		 Ishtiaq Steel Industry, 43-B PECO Road Badami Bagh Lahore. ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Batala Steel, Near Kot Abdul Malik Motorway Interchange, Lahore Sheikhupura Road, Laotre
495	72163290	I sections, not further worked than hot-rolled, hot drawn or extruded, of a height of 80mm or more	Range 100 x 50 to 300 x 150mm Length = 6 to 12 Mtr.	(ASTM A-36, SR-24, A572, SRJ 275) and as per Pakistan Steel and Peoples Steel Mills Standard.	As Per Standard	 Ishtiaq Steel Industry, 43-B PECO Road Badami Bagh Lahore. ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Batala Steel, Near Kot Abdul Malik Motorway Interchange, Lahore Sheikhupura Road, Laotre

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
496	72163310	H sections, not further worked than hot-rolled, hot drawn or extruded, of a height of 80mm or more	H sections of a height exceeding 250mm Size: 254mm	(ASTM A-36, SR-24, A572, SRJ 275)		 Ishtiaq Steel Industry, 43-B PECO Road Badami Bagh Lahore. ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Batala Steel, Near Kot Abdul Malik Motorway Interchange, Lahore Sheikhupura Road, Laotre
497	72163390	H sections, not further worked than hot-rolled, hot drawn or extruded, of a height of 80mm or more	As per BSS-4461-1969, ASTM A-36, SR-24, A572, SRJ 275, ASTM-A36-75, ASTM-615-76a (1977) Range 100 x 100 to 200 x 200mm Length = 6 to 12 Mtr.	as per Pakistan Steel and Peoples Steel Mills Standard.	As per Standard	 Ishtiaq Steel Industry, 43-B PECO Road Badami Bagh Lahore. ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Batala Steel, Near Kot Abdul Malik Motorway Interchange, Lahore Sheikhupura Road, Laotre Jabbar Steel Industry, A-46/C S.I.T.E Near Pakistan Cable Karachi.
498	72164010	L or T sections, not further worked than hot-rolled, hot drawn or extruded, of a height of 80mm or more	of a height exceeding 150mm	(ASTM A-36, SR-24, A572, SRJ 275)	~	 Ishtiaq Steel Industry, 43-B PECO Road Badami Bagh Lahore. ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Batala Steel, Near Kot Abdul Malik Motorway Interchange, Lahore Sheikhupura Road, Laotre
499	72164090	L or T sections, not further worked than hot-rolled, hot drawn or extruded, of a height of 80mm or more	of a height above 80mm upto 150mm	(ASTM A-36, SR-24, A572, SRJ 275)		 Ishtiaq Steel Industry, 43-B PECO Road Badami Bagh Lahore. ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Batala Steel, Near Kot Abdul Malik Motorway Interchange, Lahore Sheikhupura Road, Laotre
500	72165000	Steel Sections	- Th. upto 12 mm (for HR materials), length upto 12 m Blank width 100-600 mm UTS = 275 N/mm2 Excl. those conforming to ASTM A-572 or equivalent. (Blank width 100 to 600 mm and UTS upto 65 Kg/mm2) Th. upto 10 mm & size 250 x 250 mm Th. upto 10 mm and size upto 40 x 250 mm Upto IPN 450, Upto 450 x 450	-		 Batala Steel, Near Kot Abdul Malik Motorway Interchange, Lahore Sheikhupura Road, Lahore Pakistan Association of Large Steel Producers
501	72169100	Steel Sections	- Th. upto 12 mm (for HR materials), length upto 12 m Blank width 100-600 mm UTS = 275 N/mm2 Excl. those conforming to ASTM A-572 or equivalent. (Blank width 100 to 600 mm and UTS upto 65 Kg/mm2) Th. upto 10 mm & size 250 x 250 mm Th. upto 10 mm and size upto 40 x 250 mm Upto IPN 450, Upto 450 x 450	**		 Batala Steel, Near Kot Abdul Malik Motorway Interchange, Lahore Sheikhupura Road, Lahore Pakistan Association of Large Steel Producers
502	72171000	i) Wire, Iron or non-alloy steel, not plated or coated,	As per BSS-4461-1969, ASTM-A36-75, ASTM-615-76a (1977)	As per Standard	As per Standard	 Metropolitan Steel Corporation Limited, 706- Progressive Plaza, 101-Bemount Road, Karachi ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi
		ii) Wire for wheel spoke and wire for wheel nipple for two wheelers	AISI 12L14, YBT 5005-93, BS 2453, IS 6902	As per specs	As per specs	1) Pakistan Wire Industries, E-51, Textile Avenue, SITE, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		iii) Spring wire for front shocks, rear shocks for two wheelers, spring wire for mattress, spring wire for clutch spring and other applications.	JIS G 3522, GB 4357, SWRH 65Mn, A 407, JIS G 3521, A 227/A 227 M ASTM, DIN 17223, DIN EN 10132	As per specs	As per specs	 United Wire Industries (Pvt) Ltd., 19/20 KM, Lahore Sheikhupura Road, Lahore
		 iv) Casing wire of Inner Strand Core for Clutch, Brakes, Throttle cables v) Phosphorized Steel Wire for Optical Fiber Cable, vi) Steel Fiber Wire for Steel Fiber Reinforce Concrete Slab 	JISG3521, Q/320601, EA 11-1998 JIS 3521, 05/30(35), 06/30(35), 07/30(35) 07/40/(45), 10/40(50)	As per standard	As per standard	Pakistan Wire Industries E-51, Textile Avenue, SITE, Karachi
503	72172000	 i) Zinc or Zinc Alloy Coated Wire for armouring of power cables/ Zinc Coated Steel Wire for ACSR/ Galvanized Wire 	BS EN10257-1, ASTM A-164, ASTM B633, ASTM A121, ASTM B498, BS 4565, BS 3533	As per Standard	As per Standard	Pakistan Wire Industries E-51, Textile Avenue, SITE, Karachi
		 ii) Galvanized Carbon Steel Wire For Communication Cable and Optical Fiber Cable, Galvanized Wire For Reinforce Hose/Pipes 	GB 346-84 GB3082-84 JIS 3521	As per standard	As per standard	
504	72181000	Ingots & Billets in primary forms, stainless steel	Highly refined bottom poured ingots in flat rectangular, round and square sections. Weight : 500kg to 14,000kg. Manufactured as per international quality standards like JIS, Bohler, AISI, DIN, Chinese etc.	Air cooled, stress relieved or annealed, bottom poured ingots	All type of stainless steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
505	72189100	i) Stainless Steel Ingots	 Ingots and other primary forms Of rectangular (Other than square cross section) 			Mughal Steel, 77 K.M. Sheikhupura Road, Lahore
		ii) ESR Steel Ingots	M-300/400/600/750 Diameter 315, 395, 595, 720 mm Length:3000 mm(max.), Weight:9000 Kg. (max.)	Air cooled, stress relieved or annealed	All type of stainless steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
506	72189900	ESR Steel Ingots	M-300/400/600/750 Diameter 315, 395, 595, 720 mm Length : 3000 mm (max.), Weight : 9000 Kg. (max.)	Air cooled, stress relieved or annealed	All type of stainless steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
507	72191100	Flat-rolled product, stainless steel	Plates (Hot rolled): Th.:10 mm (min.), Width:1500 mm(max.), Length;4000-6000 mm Sheets (Hot rolled):Th.:3 mm(max.), Width:950 mm (max.), Length:3000 mm(max.)	Black surface	All type of stainless steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
508	72191200	Flat-rolled product, stainless steel	Plates (Hot rolled): Th.:10 mm (min.), Width:1500 mm(max.), Length;4000-6000 mm Sheets (Hot rolled):Th.:3 mm(max.), Width:950 mm (max.), Length:3000 mm(max.)	Black surface	All type of stainless steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
509	72192100	Flat-rolled product, stainless steel	Plates (Hot rolled): Th.:10 mm (min.), Width:1500 mm(max.), Length;4000-6000 mm Sheets (Hot rolled):Th.:3 mm(max.), Width:950 mm (max.), Length:3000 mm(max.)	Black surface	All type of stainless steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
510	72192200	i) Flat Rolled plates of stainless steel	Thickness upto 10 mm, width upto 700 mm and length upto 3 M (Although thicker plates, flats upto 60 mm are also made in non standard sizes) Conforming to all grades of AISI 300 & 400 series and equivalent	~		Mughal Steel, 77 K.M. Sheikhupura Road, Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		ii) Flat-rolled product, stainless steel	Plates (Hot rolled): Th.:10 mm (min.), Width:1500 mm(max.), Length;4000-6000 mm Sheets (Hot rolled):Th.:3 mm(max.), Width:950 mm (max.), Length:3000 mm(max.)	Black surface	All type of stainless steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
511	72192310	Flat-rolled product, stainless steel	Plates (Hot rolled): Th.:10 mm (min.), Width:1500 mm(max.), Length;4000-6000 mm Sheets (Hot rolled):Th.:3 mm(max.), Width:950 mm (max.), Length:3000 mm(max.)	Black surface	All type of stainless steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
512	72192390	i) Sheets of stainless steel	0.35-6 mm thick, width upto .75 M and length upto 3 M.			Mughal Steel, 77 K.M. Sheikhupura Road, Lahore
		ii) Flat-rolled product, stainless steel	Plates (Hot rolled): Th.:10 mm (min.), Width:1500 mm(max.), Length;4000-6000 mm Sheets (Hot rolled):Th.:3 mm(max.), Width:950 mm (max.), Length:3000 mm(max.)	Black surface	All type of stainless steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
513	72193100	Flat Cold Rolled Products of Stainless Steel Sheet & Coil	Width 500mm to 750mm of thickness 0.5mm to 4.75mm	Cold Rolled	Pure stainless steel	AHN Steel (Pvt) Ltd., 10-Abbot Road, Lahore
514	72193210	Flat-rolled product, stainless steel	Plates (Hot rolled): Th.:10 mm (min.), Width:1500 mm(max.), Length;4000-6000 mm Sheets (Hot rolled):Th.:3 mm(max.), Width:950 mm (max.), Length:3000 mm(max.)	Black surface	All type of stainless steel grades. Chemical composition as per international quality standards or as specified by customers.	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi AHN Steel (Pvt) Ltd., 10-Abbot Road, Lahore
515	72193290	Flat-rolled product, stainless steel	Plates (Hot rolled): Th.:10 mm (min.), Width:1500 mm(max.), Length;4000-6000 mm Sheets (Hot rolled):Th.:3 mm(max.), Width:950 mm (max.), Length:3000 mm(max.)	Black surface	All type of stainless steel grades. Chemical composition as per international quality standards or as specified by customers.	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi AHN Steel (Pvt) Ltd., 10-Abbot Road, Lahore
516	72193310	Flat Cold Rolled Products of Stainless Steel Sheet & Coil	Width 500mm to 750mm of thickness 0.5mm to 4.75mm	Cold Rolled	Pure stainless steel	AHN Steel (Pvt) Ltd., 10-Abbot Road, Lahore
517	72193390	Flat Cold Rolled Products of Stainless Steel Sheet & Coil	Width 500mm to 750mm of thickness 0.5mm to 4.75mm	Cold Rolled	Pure stainless steel	AHN Steel (Pvt) Ltd., 10-Abbot Road, Lahore
518	72193410	Flat Cold Rolled Products of Stainless Steel Sheet & Coil	Width 500mm to 750mm of thickness 0.5mm to 4.75mm	Cold Rolled	Pure stainless steel	AHN Steel (Pvt) Ltd., 10-Abbot Road, Lahore
519	72193490	Flat Cold Rolled Products of Stainless Steel Sheet & Coil	Width 500mm to 750mm of thickness 0.5mm to 4.75mm	Cold Rolled	Pure stainless steel	AHN Steel (Pvt) Ltd., 10-Abbot Road, Lahore
520	72193510	Flat Cold Rolled Products of Stainless Steel Sheet & Coil	Width 500mm to 750mm of thickness 0.5mm to 4.75mm	Cold Rolled	Pure stainless steel	AHN Steel (Pvt) Ltd., 10-Abbot Road, Lahore
521	72193590	Flat Cold Rolled Products of Stainless Steel Sheet & Coil	Width 500mm to 750mm of thickness 0.5mm to 4.75mm	Cold Rolled	Pure stainless steel	AHN Steel (Pvt) Ltd., 10-Abbot Road, Lahore
522	72199010	Flat Cold Rolled Products of Stainless Steel Sheet & Coil	Width 500mm to 750mm of thickness 0.5mm to 4.75mm	Cold Rolled	Pure stainless steel	AHN Steel (Pvt) Ltd., 10-Abbot Road, Lahore
523	72199090	Flat Cold Rolled Products of Stainless Steel Sheet & Coil	Width 500mm to 750mm of thickness 0.5mm to 4.75mm	Cold Rolled	Pure stainless steel	AHN Steel (Pvt) Ltd., 10-Abbot Road, Lahore
524	72201290	Strips of stainless steel.	1-6 mm thick, width 200 mm			Mughal Steel, 77 K.M. Sheikhupura Road, Lahore
525	72202010	Flat Cold Rolled Products of Stainless Steel Sheet & Coil	Width 500mm to 750mm of thickness 0.5mm to 4.75mm	Cold Rolled	Pure stainless steel	AHN Steel (Pvt) Ltd., 10-Abbot Road, Lahore
526	72202090	Flat Cold Rolled Products of Stainless Steel Sheet & Coil	Width 500mm to 750mm of thickness 0.5mm to 4.75mm	Cold Rolled	Pure stainless steel	AHN Steel (Pvt) Ltd., 10-Abbot Road, Lahore
527	72221100	Steel Round Bars	Diameter : 18 - 130 mm, Length 4000 - 6000mm	Black surface	All type of stainless steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi

8. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
528	72221900	Bars of stainless steel, hot-rolled	 Of circular cross section Bars & rods, not further worked than cold formed or cold finished Flat Bars: Size : 6 x 40 mm - 20 x 110 mm Length 4000 - 6000mm Other bars & rods Dia 20 mm and above 		All type of stainless steel grades. Chemical composition as per international quality standards or as specified by customers.	 Mughal Steel, 77 K.M. Sheikhupura Road, Lahore G.M. Steel, Lahore Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
529	72222000	Cold draw stainless steel bars	Cold drawn bars; Diameter : 12 - 80 mm Length : 4000 - 6000mm	Bright surface	All type of stainless steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
530	72241000	Ingots	Highly refined cast ingots and billets in flat rectangular, round and square sections. Weight ranging from 500kg to 14,000kg. Manufactured as per international quality standards like JIS, Bohler, AISI, DIN, Chinese etc	Air cooled, stress relieved or annealed, bottom poured ingots	All type of stainless steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
531	72249000	ESR steel ingots	ESR Ingots: M-300/400/600/750 Diameter 315, 395, 595, 720 mm Length:3000 mm(max.), Weight:9000 Kg.(max.)	Air cooled, stress relieved or annealed	All type of stainless steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
532	72253000	Plates & Sheets (Hot rolled)	Plates (Hot rolled): Th.:10 mm (min.), Width:1500 mm(max.), Length;4000-6000 mm Sheets (Hot rolled):Th.:3 mm(max.), Width:950 mm (max.), Length:3000 mm(max.)	Black surface	All type of stainless steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
533	72254000	Plates & Sheets (Hot rolled)	Plates (Hot rolled): Th.:10 mm (min.), Width:1500 mm(max.), Length;4000-6000 mm Sheets (Hot rolled):Th.:3 mm(max.), Width:950 mm (max.), Length:3000 mm(max.)	Black surface	All type of stainless steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
534	72255000	Cold Rolled of a width of 600 mm or more	Cold Rolled Alloy Steel Sheets, Strips and Coils - As per JIS G- 3141, ASTM A-1008 (excluding Bake Hardening Steel grade used in manufacturing of outer skin of the automobiles)	Mechanical Properties i.e. Yield Point, tensile strength & elongation, Bendability & Hardness as per JIS G 3141, ASTM A-1008 specification or equivalent	Chemical composition as per JIS G 3141 specified steel grades	International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
535	72259200	Galvanized Steel	Hot Dip Zinc Coated Alloy Steel Sheets, Strips and Coils As per JIS G-3302, ASTM A-653			International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
536	72259900	Other / Color Coated Alloy Steel	Hot Dip Zinc Color Coated Alloy Steel Sheets, Strips and Coils, As per JIS G-3302, ASTM A-653			International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
537	72262000	Plates & Sheets (Hot rolled)	Plates (Hot rolled): Th.:10 mm (min.), Width:1500 mm(max.), Length;4000-6000 mm Sheets (Hot rolled):Th.:3 mm(max.), Width:950 mm (max.), Length:3000 mm(max.)	Black surface	All type of stainless steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
538	72269100	Plates & Sheets (Hot rolled)	Plates (Hot rolled): Th.:10 mm (min.), Width:1500 mm(max.), Length;4000-6000 mm Sheets (Hot rolled):Th.:3 mm(max.), Width:950 mm (max.), Length:3000 mm(max.)	Black surface	All type of stainless steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
539	72269200	Cold Rolled of less than 600mm	Cold Rolled Alloy Steel Sheets, Strips and Coils - As per JIS G- 3141, ASTM A-1008 (excluding Bake Hardening Steel grade used in manufacturing of outer skin of the automobiles)	Mechanical Properties i.e. Yield Point, tensile strength & elongation, Bendability & Hardness as per JIS G 3141, ASTM A-1008 specification or equivalent	Chemical composition as per JIS G 3141 specified steel grades	International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi
540	72269900	i) Plates & Sheets (Hot rolled)	Plate: Th:10 mm (min.), Width:1500 mm(max.), Length:4000- 6000 mm Sheets:Th. 3 mm(max.), Width:950 mm(max.), Length : 3000 mm (max.)	Black surface	All type of stainless steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
		ii) Galvanized Steel of less than600mm	Hot Dip Zinc Coated Alloy Steel Sheets, Strips and Coils, As per JIS G-3302, ASTM A-653			International Steel Ltd., 399-404, Rehri Road, Landhi, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
541	72279010	Hot Rolled Bars of alloy steel	As per BSS-4461-1969, ASTM-A36-75, ASTM-615-76a (1977) / SAE 1006CR, SAE 1008CR, SAE 1010CR, SAE 1015CR, SAE 1020CR, SAE 1025CR, SAE 1030CR, SAE 1038CR, SAE 1040CR	As per SAE, AISI, ASTM, EN and other International Standards	International Standards	 Metropolitan Steel Corporation Limited, 706- Progressive Plaza, 101-Bemount Road, Karachi ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Horizon Steel (Pvt) Ltd., D-93, Block-4, Kehkshan, Clifton, Karachi Pakistan Association of Large Steel Producers
542	72279090	Hot Rolled Bars of alloy steel	As per BSS-4461-1969, ASTM-A36-75, ASTM-615-76a (1977) / SAE 1006CR, SAE 1008CR, SAE 1010CR, SAE 1015CR SAE 1020CR, SAE 1025CR, SAE 1030CR, SAE 1038CR, SAE 1040CR	As per SAE, AISI, ASTM, EN and other International Standards	International Standards	 Metropolitan Steel Corporation Limited, 706- Progressive Plaza, 101-Bemount Road, Karachi ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Horizon Steel (Pvt) Ltd., D-93, Block-4, Kehkshan, Clifton, Karachi Pakistan Association of Large Steel Producers
543	72281000	High-speed steel, Forged	Radial Forging: Square, Round, & Varying section profile, axles of cross section 60 mm to 200 mm and flat 30 - 150 mm & width 60 - 180 mm, Length 4000 - 6000 mm 6000 mm	Black surface	All type of stainless steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi
544	72282010	Silico-manganese steel, Hot rolled bars	Hot Rolled Bars; Diameter : 18 - 130 mm Length : 4000 - 6000mm Flat Bars Size : 6 x 40 mm - 20 x 110 mm Length 4000 - 6000mm	Black surface	international quality standards or as specified by customers.	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi Agha Steel Industries, Plot No. NWIZ/I/P- 133(SP-6) D-2, Port Qasim Authority, Karachi ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi
545	72282090	Silico-manganese steel, Hot rolled bars	Hot Rolled Bars; Diameter : 18 - 130 mm Length : 4000 - 6000mm Flat Bars Size : 6 x 40 mm - 20 x 110 mm Length 4000 - 6000mm	Black surface	composition as per international quality standards or as specified by customers.	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi Agha Steel Industries, Plot No. NWIZ/I/P- 133(SP-6) D-2, Port Qasim Authority, Karachi ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi
546	72283010	Case hardening steel, Hot rolled bars	Hot Rolled Bars; Diameter : 18 - 130 mm Length : 4000 - 6000mm	Black surface, See Annex-II	composition as per international quality standards or as specified by customers.	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi Agha Steel Industries, Plot No. NWIZ/I/P- 133(SP-6) D-2, Port Qasim Authority, Karachi ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company	Annex-I (Final Lis
547	72283090	Other alloy steel, Hot rolled bars	Hot Rolled Bars; Diameter : 18 - 130 mm Length : 4000 - 6000mm Flat Bars Size : 6 x 40 mm - 20 x 110 mm Length 4000 - 6000mm	Black surface	All type of alloy steel grades. Chemical composition as per international quality standards or as specified by customers.	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi Agha Steel Industries, Plot No. NWIZ/I/P- 133(SP-6) D-2, Port Qasim Authority, Karachi ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi 	
548	72284000	Alloy steel, Forged bars	Press forging: Shafts : Dia 700 mm (max.) Disc dia : 1500 mm (Max) Length : 8000 mm (max.) Weight : 12 mt. Radial Forging: Square, Round, & Varying section profile, axles of cross section 60 mm to 200 mm and flat 30 - 150 mm & width 60 - 180 mm, Length 4000 - 6000 mm	Black surface/ Machined	All type of alloy steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi	
549	72285000	Alloy steel, Cold drawn bars	Cold drawn bars; Diameter : 12 - 80 mm Length : 4000 - 6000mm	Bright surface	All type of alloy steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi	
550	72286000	Other alloy steel, Hot rolled bars	Hot Rolled Bars; Diameter : 18 - 130 mm Length : 4000 - 6000mm Flat Bars Size : 6 x 40 mm - 20 x 110 mm Length 4000 - 6000mm	Black surface	All type of alloy steel grades. Chemical composition as per international quality standards or as specified by customers.	 Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi Amreli Steels Ltd., D/89, Shershah Road, SITE, Karachi Agha Steel Industries, Plot No. NWIZ/I/P- 133(SP-6) D-2, Port Qasim Authority, Karachi ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi 	
551	72287000	Alloy Steel Angles	As per BSS-4461-1969, ASTM-A36-75, ASTM-615-76a (1977)	As per Standard	As per Standard	Metropolitan Steel Corporation Limited, 706- Progressive Plaza, 101-Bemount Road, Karachi	
552	72299000	CO ₂ Gas Shielded Arc Welding/Mig Welding Wire 0.80 mm, 0.90 mm, 1.00 mm, 1.20 mm and 1.60 mm	AWS ER70S6/DIN SG2/GB ER56-6	Copper Coated/Tensile Strength>490 Mpa/Elongation>26%/Shrinkage>72%	C: 0.06~ 0.15 SI: 0.80~ 1.15 Mn: 1.40~ 1.85	 Bead Tech (Pvt) Ltd. 22-KM, Lhr-Skp. Rd, Stop Qilla Sattar Shah, Pindi Das Rd., Lahore ASG Metals Ltd., EIZ/ LL/SP-08, Eastern, Industrial Zone, Port Qasim Authority, Karachi Horizon Steel (Pvt) Ltd., D-93, Block-4, Kehkshan, Clifton, Karachi 	
553	73012000	i) Stay Strip for Pcc Poles	WAPDA Specification, DP-PD-52			Creative Engineering (Pvt) Ltd., 160/ S, Q.I.E. Kot Lakhpat Lahore	
		ii) Stay Rod	WAPDA Specification, DDS-29:2008			Vision Engineering Pvt Ltd., 160/ S, Q.I.E. Kot	
		iii) Earth Rod	WAPDA Specification, P-111-76			Lakhpat Lahore	
		iv) D-Shackle	WAPDA Specification, PD:68]	
			WAPDA Specification, DDS:48:2008				
		vi) 11 Kv Streel Cross Arm with Braces	WAPDA Specification, DDS-13:2008				
		vii) 11 Kv Streel Cross for D- Mounting Fitting	WAPDA Specification, DDS-68:2004				
554	73024000	Fish-plates, iron or steel	Fish Plates for Railways	Fish Plate Combination, Joggled Fish Plate, Slotted Fish Plates and Fish Plate bolts and nuts etc.		Metal Engineering Works (Pvt) Ltd., S-4, S.I.T.E., Karachi	

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
555	73030000	Cast Iron and Ductile Pipes	B.S.S 2035 for cast iron and I.S.O 2531 for ductile Iron Pipes [Excluding ASTM Standard Pipes]	Cast Iron and Ductile Iron	Grade 14 Mechanite Type GD and NF A 38-012	Ghulam Mohi-ud-Din & Sons, 6 Rehman Gali, Railway Road, Lahore
556	73041100	Line Pipe for oil or gas pipelines (Stainless Steel)	Seamless Steel Line Pipes of All Kind used for Oil & Gas Pipelines with or with out 3 layer Polyethylene /polypropylene / Fusion Bond Coating. Specification: API 9 Cr, API 13 Cr. Sizes: 0.405" to 10.750" Wall Thickness: 1.73mm to 15.9mm Length: SRL & DRL (excluding internally coated pipes)			Huffaz Seamless Pipe Industries Ltd., 207-210 2nd Floor, Mashriq Centre, Block-14, Gulshan-e- Iqbal, Karachi
557	73041900	Seamless Steel Line Pipes (unthreaded)	Seamless Steel Line Pipes of All Kind used for Oil & Gas Pipelines with or with out 3 layer Polyethylene /polypropylene / Fusion Bond Coating. Specification: API 5L All Grades Sizes: 1/8 Inch to 10 Inch Nominal Dia. (Including internally and externally coated pipes from 2 Inch Dia to 100 Inch Dia)	As per required standard/ specification	As per required standard/ specification	Huffaz Seamless Pipe Industries Ltd., 207-210 2nd Floor, Mashriq Centre, Block-14, Gulshan-e- Iqbal, Karachi
558	73042900	Seamless Pipes (unthreaded)	Casing & Tubing of a kind used in Drilling for Oil & Gas. Specification: API 5 CT All Grades Sizes: 1/8 inch to 10 inch nominal dia. (excluding internally coated pipes)	As per required standard/ specification	As per required standard/ specification	Huffaz Seamless Pipe Industries Ltd., 207-210 2nd Floor, Mashriq Centre, Block-14, Gulshan-e- Iqbal, Karachi
559	73043100	Pipes, Iron or non-alloy steel (unthreaded)	Seamless Steel Pipes / Tubes of other cross-section, of iron or non-alloy steel. Specification : ASTM A 53 / ASTM A 106 , ASTM A 192, ASTM A 199, ASTM A 210, ASTM A 213, ASTM A 519, DIN 2391, DIN 2440, DIN 2441, DIN 2448, DIN 1630, DIN 17173 / 2448, DIN 17175 / 2448 JIS G 3464, JIS G 3444, BS – 1387. BS 3059, BS, 3059/2, BS 1775, BS 6323, NFA 49 – 112, NFA 49 – 1445, NFA 49-211 UNI 8863; Sizes: 10.3mm to 273mm (excluding internally coated pipes)	As per required standard/ specification	As per required standard/ specification	Huffaz Seamless Pipe Industries Ltd., 207-210 2nd Floor, Mashriq Centre, Block-14, Gulshan-e- Iqbal, Karachi
560	73043900	Pipes of circular cross-section, of iron or non-alloy steel	Specification: ASTM A 53 / ASTM A 106, ASTM A 192, ASTM A 199, ASTM A 210, ASTM A 213, ASTM A 519. DIN 2391, DIN 2440, DIN 2441, DIN 2448, DIN 1629, DIN 1630, DIN 17173 / 2448, DIN 17175 / 2448 JIS G 3464, JIS G 3444 BS – 1387. BS 3059, BS, 3059/2, BS 1775, BS 6323 NFA 49 – 112, NFA 49 – 1445, NFA 49-211 UNI 8863 Sizes : 10.3 mm to 273mm (excluding internally coated pipes)	As per required standard/ specification	As per required standard/ specification	Huffaz Seamless Pipe Industries Ltd., 207-210 2nd Floor, Mashriq Centre, Block-14, Gulshan-e- Iqbal, Karachi
561	73044100	Cold Drawn or Cold Rolled (Cold Reduced) Pipes / Tubes	Seamless Steel Pipes/ Tubes other cross- section, of iron alloy steel, cold drawn or cold rolled. Specification: ASTM A 53, ASTM A 106, ASTM A 179, ASTM A 192, ASTM A 210, ASTM A 519, API 5L, DIN 17175, JIS STB 35S Sizes: 10.3mm to 273mm (excluding internally coated pipes)		**	Huffaz Seamless Pipe Industries Ltd., 207-210 2nd Floor, Mashriq Centre, Block-14, Gulshan-e- Iqbal, Karachi
562	73044900	Cold Drawn or Cold Rolled (Cold Reduced) Pipes / Tubes	Seamless Steel Pipes/ Tubes other cross- section, of iron alloy steel, cold drawn or cold rolled. Specification: ASTM A 53, ASTM A 106, ASTM A 179, ASTM A 192, ASTM A 210, ASTM A 519, API 5L, DIN 17175, JIS STB 35S Sizes: 10.3mm to 273mm (excluding internally coated pipes)			Huffaz Seamless Pipe Industries Ltd., 207-210 2nd Floor, Mashriq Centre, Block-14, Gulshan-e- Iqbal, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
563	73045100	Pipes of Iron or non-alloy steel (unthreaded)	Seamless Steel Pipes / Tubes other cross-section, of iron alloy steel, cold drawn or cold rolled. Specification: ASTM A 333, ASTM A 334, ASTM A 335, ASTM A 519. Sizes: From 10.3mm to 273mm (excluding internally coated pipes)	As per required standard/ specification	As per required standard/ specification	Huffaz Seamless Pipe Industries Ltd., 207-210 2nd Floor, Mashriq Centre, Block-14, Gulshan-e- Iqbal, Karachi
564	73045900	Tubes of alloy steel,seamless circular cross-section (unthreaded)	Specification: ASTM A 333, ASTM A 334, ASTM A 335, ASTM A 519. Sizes : From 10.3mm to 273mm (excluding internally coated pipes)	As per required standard/ specification	As per required standard/ specification	Huffaz Seamless Pipe Industries Ltd., 207-210 2nd Floor, Mashriq Centre, Block-14, Gulshan-e- Iqbal, Karachi
565	73049000	Pipes of Iron or steel, seamless (unthreaded)	Specification: ASTM A 333, ASTM A 334, ASTM A 335, ASTM A 519. Sizes: From 10.3mm to 273mm (excluding internally coated pipes)	As per required standard/ specification	As per required standard/ specification	Huffaz Seamless Pipe Industries Ltd., 207-210 2nd Floor, Mashriq Centre, Block-14, Gulshan-e- Iqbal, Karachi
566	73051100	i) Longitudinally Welded Pipes	ASTM A-134, ASTM A-381, ASTM A-409, ASTM A-589, ASTM A-671, ASTM A-672, ASTM A-139, ASTM A-252, BS- 6323,ASTM A-139, A-120, A-653			SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi
		ii) Welded Steel Linepipe	M.S. and Galvanized Steel Line Pipes (ERW) from 1/2" to 18" BSS 1387/1985, API 5L (PSLI), ASTM A53	HR-1, HR-2, HR-3, HR-4, HR-235, HR- 274, API 5L-B API 5L X42		Jamal Pipe Industries (Pvt) Ltd; 88-Railway Road, Lahore
		iii) Helical Seam Submerged - Arc Welded Pipes (Spiral Welded Pipes)	219.mm upto 2438. mm in thickness of 4.0mm and upto 25.4mm and API Steel Grade Upto X-80 PSL-2 According to API-DIN- BS-AWWA-ASTM Standard. (Protective Coating both internal as well as external coating of these pipes i.e. 3 layer Poly Ethylene/ Poly Propylene Coating as per DIN 30670, CSA Z 425.20 and CSA Z 245.21]	As per API 5L	According to API Specs	Data Steel Pipe Industries (Pvt.) Ltd., Ibrahim Building, 20-West Wharf Road, Karachi
		iv) Steel Line Pipe	 Spirally welded (Submerged arc Welded): a) Bare: Size : 6" to 126" dia, Grade upto X-80 API-5L ASTM and BS specification b) Coated with 3 layers: Polyethylene, /Polypropylene, Copolymer(Adhesive),Fusion Bonded Epoxy for 6" to 60" Dia Linepipe Electric Welded a) Bare: Size: ½ to 12", ERW/EIW (straight seam), upto Grade API X-52, ASTM, BS Specification b) Galvanized Iron., ERW/EIW, ASTM, and BS Standard 	As per Table 5 3 A and 3 B of API Specification 5 L, ASTM and BS Specifications. As per table 3A of API. Specification 5L, ASTM and BS Specifications	As per table 2A and 2B of API specification 5L, ASTM and BS specifications As per table 2A of API specification-5L, ASTM of BS Specification	 Ramna Pipe Lahore Shalimar Pipe Mills Lahore Indus Steel Pipes Ltd., 7th Floor, PIC Tower, A, Lalazar Drive Karachi Shashi Steel Pipe Works, Karachi
567	73051900	i) Line Pipe for oil or gas pipelines	Longitudinally Welded Pipes: ASTM A-139, A-671, A-672, A-381, A-120, A-653, A-A-252, A- 409, BS-6323			SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi
		ii) Welded Steel Pipe and Coating	Upto 120" diameter, wall th. upto 25.4mm, grade API 5 L X 100 (PSL-1 & PSL-2) External 3-Layer Polyethylene/ Polypropylene Coating, External & Internal Epoxy Coating, Tape Coating, External Internal Cement Lining/ Coating	As per API 5L PSL-1 & PSL-2 and other International standards As per DIN & AWWA standards	As per API 5L PSL-1 & PSL-2 and other International standards As per DIN & AWWA standards	Crescent Steel and Allied Product Ltd., 9th Floor, SIDCO Avenue Centre, 264-RA Lines, Karachi- 74400
568	73053100	i) Steel Line Pipe	Longitudinally Welded Pipes: ASTM A-139, A-671, A-672, A-381, A-120, A-653, A-A-252, A- 409, BS-6323		-	SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi
		ii) Steel Line Pipe	Longitudinally Welded Pipes: ¹ / ₂ " to 12-3/4" dia ERW/EIW Grade: A25 – X-60, PSL – 1 & 2; API 5L [Excluding Alloy Steel, NACE Compliant]	As per API 5L Specifications (45th Edition)	As per API 5L Specifications (45th Edition)	BBJ Pipe Industries (Pvt) Ltd., 23rd, 1st Floor, Bilal Centre,Nicholson Road, Lahore
		iii) Carbon Steel Pipe/ Coating	Upto 120" dia., wall th. upto 25.4mm, grade upto API 5 L X 100 (PSL-1 & PSL-2) External 3-Layer Polyethylene/ Polypropylene Coating, External & Internal Epoxy Coating, Tape Coating, External Internal Cement Lining/ Coating	As per API 5L PSL-1 & PSL-2 and other International standards As per DIN & AWWA standards	As per API 5L PSL-1 & PSL-2 and other International standards As per DIN & AWWA standards	Crescent Steel and Allied Product Ltd., 9th Floor, SIDCO Avenue Centre, 264-RA Lines, Karachi- 74400

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
569	73059000	Welded Steel Pipe and Coating	Upto 120" diameter, wall thickness upto 25.4mm grade upto API 5 L X 100 (PSL-1 & PSL-2) External 3-Layer Polyethylene/ Polypropylene Coating External & Internal Epoxy Coating Tape Coating External Internal Cement Lining/ Coating	As per API 5L PSL-1 & PSL-2 and other International standards As per DIN & AWWA standards	As per API 5L PSL-1 & PSL-2 and other International standards As per DIN & AWWA standards	Crescent Steel and Allied Product Ltd., 9th Floor, SIDCO Avenue Centre, 264-RA Lines, Karachi- 74400
570	73061900	i) C.I. Tubes with special Rubber Seals	For Carbonating Tower and for Ammonia Gas Cooler	-	-	 Heavy Mechanical Complex, Taxila SEFEC Engineering (Pvt) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi
		ii) Welded Steel Pipe and Coating	Upto 120" dia., wall th. upto 25.4mm, grade upto API 5 L X 100 (PSL-1 & PSL-2) External 3-Layer Polyethylene/ Polypropylene Coating, External & Internal Epoxy Coating, Tape Coating, External Internal Cement Lining/ Coating	As per API 5L PSL-1 & PSL-2 and other International standards As per DIN & AWWA standards	As per API 5L PSL-1 & PSL-2 and other International standards As per DIN & AWWA standards	Crescent Steel and Allied Product Ltd., 9th Floor, SIDCO Avenue Centre, 264-RA Lines, Karachi- 74400
		iii) Steel line pipe for fluid/gas transmission pipes	1/2" to 12" diameter 1.8 mm to 12.7 mm Wall Thickness	As per Standard	As per Standard	International Industries Ltd., LX 15-16, Landhi Industrial Area, Karachi
571	73063090	 i) Hot-dipped galvanized steel pipes for water, gas, structural and other applications 	3/8" to 8" diameter 1.8 mm to 7.11 mm Wall Thickness	As per Standard	As per Standard	International Industries Ltd., LX 15-16, Landhi Industrial Area, Karachi
		ii) ERW black pipe for structural, firefighting and pressure applications	3/8" to 12" diameter 1.60 mm to 12.7 mm Wall Thickness	As per Standard	As per Standard	International Industries Ltd., LX 15-16, Landhi Industrial Area, Karachi
572	73064000	Stainless Steel ornamental tubes (circular)	1/2" to 3" diameter 0.9 mm to 2.5 mm Wall Thickness	As per Standard	As per Standard	International Industries Ltd., LX 15-16, Landhi Industrial Area, Karachi
573	73065000	i) Welded Steel Pipe and Coating	Upto 120" dia., wall th. upto 25.4mm, grade upto API 5 L X 100 (PSL-1 & PSL-2) External 3-Layer Polyethylene/ Polypropylene Coating, External & Internal Epoxy Coating, Tape Coating, External Internal Cement Lining/ Coating	As per API 5L PSL-1 & PSL-2 and other International standards As per DIN & AWWA standards	As per API 5L PSL-1 & PSL-2 and other International standards As per DIN & AWWA standards	Crescent Steel and Allied Product Ltd., 9th Floor, SIDCO Avenue Centre, 264-RA Lines, Karachi- 74400
		ii) Pipes made from alloy steel	3/8" to 12" diameter 1.6 mm to 12.7 mm Wall thickness	As per Standard	As per Standard	International Industries Ltd., LX 15-16, Landhi Industrial Area, Karachi
574	73066100	Stainless Steel ornamental tubes (squares/rectangles)	Square: ½ "x ½" to 2" x 2" Rectangle: ½ "x ¾ " to 1 ½ "x 3" 1mm to 2.5 mm Wall Thickness	As per Standard	As per Standard	International Industries Ltd., LX 15-16, Landhi Industrial Area, Karachi
		Cold-rolled tubes shapes (non- circular)	Square: 10x10mm to 60x60 mm, 0.6mm to 2.0mm wall thickness Rectangle: 10x20mm to 40x80mm 0.6mm to 2.0mm wall thickness Oval: 16x30mm to 30x50 mm, 1.2mm to 2.0mm wall thickness Elliptical: 13x23mm to 24x56 mm, 0.90mm to 1.60mm wall thickness	As per Standard	As per Standard	
575	73066900	Cold-rolled LTDZ profiles (non- circular)	LTZ and D profiles for door and window frames, Dia / Shape: L40, T48, L48, Z48, L55, T60, Z60, D60. Wall thickness 0.7mm to 1.20mm.	As per Standard	As per Standard	International Industries Ltd., LX 15-16, Landhi Industrial Area, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
576	73069000	i) Pipes of Iron or steel	GI pipes: Dia.15, 20, 25, 32, 40, 50, 65, 80, 100, 125 & 150 mm (½", ¾", 1", 1¼", 1½", 2", 2½", 3", 4", 5" & 6"), Wall Th. from 1.80mm to 7.10mm, Standards: BS 1387 (1985), ASTM A53 (2002), DIN 2440 & 2441 and other upon request. Precision Steel Tubing Diameters: Round:12.70, 15.90, 17.50, 19.05, 22.20, 23.80, 25.40, 28.60, 31.80, 38.10, 42.20, 48.10 & 60.30 Wall Th.0.60mm to 2.0mm, Standards BS 6323 Part1 & 5 (1982) Shape: Square, Rectangle & Elliptical in equivalent size to above round dia. API Line Pipe for Gas Distribution, Dia.26.7, 3304, 60.3, 114.3 & 168.3mm (¾", 1", 2", 4" & 6", Wall Th. from 2.87 to 7.10 mm Standards: API 5L (Latest Edition) ASTM A53 (2002) and profiles for Door & Windows Frames Diameter / Shape: L40, T48, Z48, L55, T60, Z60 Wall Th. From 0.70mm to 0.90mm Standard: IIL Standard (excluding internally coated pipes)	As per Standard	Low carbon steel	International Industries Ltd., LX 15-16, Landhi Industrial Area, Karachi
		ii) Hot-dipped GI pipes for water, gas, structural & other applications	3/8" to 8" dia., 1.8-7.11 mm Wall Th.	As per Standard	As per Standard	
		iii) ERW black pipe for structural, firefighting and pressure applications	3/8" to 12" dia., 1.60-12.7 mm Wall Th.	As per Standard	As per Standard	
		iv) Cold rolled tubes-Circular cross- section	9-75.6 mm dia., 0.6-3.0 mm Wall Th.	As per Standard	As per Standard	
		v) Welded Steel Pipe and Coating	Upto 120" dia., wall th. upto 25.4mm, grade upto API 5 L X 100 (PSL-1 & PSL-2) External 3-Layer Polyethylene/ Polypropylene Coating, External & Internal Epoxy Coating, Tape Coating, External Internal Cement Lining/ Coating	International standards	As per API 5L PSL-1 & PSL-2 and other International standards As per DIN & AWWA standards	Crescent Steel and Allied Product Ltd., 9th Floor, SIDCO Avenue Centre, 264-RA Lines, Karachi- 74400
577	73072100	i) Stainless Steel Flanges	Different types of flanges as per customer requirement	All Steel & SS Flanges and Flanges of Standard ANSI B16.5 etc.		Metal Engineering Works (Pvt) Ltd., S-4, S.I.T.E., Karachi
		ii) Pipe flanges and Fittings	For Boilers and Heat Exchangers			Huffaz Seamless Pipe Industries Ltd., 207-210 2nd Floor, Mashriq Centre, Block-14, Gulshan-e- Iqbal, Karachi
578	73079900	i) Double Studded Adaptors, Adaptor Spools, Blind Flanges / Weldneck Flanges / Flanges (Threaded)	Size: 2-1/16" to 30", Range: 2K-15K	API Spec 7-1/6A	AISI 4130 / 4140	MEC Energy, Plot No. 80-D, Street No. 6, Industrial Area Sector I-10/3, Islamabad
		ii) Weco Cross Over & Weco Adpator Flanges	Size: 2" to 5", Range: 2K-15K	API Spec 7-1/6A	AISI 4130 / 4140	
		iii) Threaded Cross Overs, Saver, Float, Bit & Lifting Subs	Size: 2-3/8" to 8-5/8", API Regular / IF	API Spec 7-1/6A	AISI 4130 / 4140 /410 (SS)	
		iv) Service Tee	3/4" with plug	Elongation 30%, Tensile 70 Ksi/Min	ASTM A-126, C-0.20%, Si-0.21%, Mn-0.52	Sindh Standard Engineering Works, F-713-A, S.I.T.E, Metrovill, Karachi
579	73081000	i) Fabricated Steel Profiles	Plate fabricated I & H Sections Maximum height, width and Flange/Web thickness of Sections= 2500 mm, 800 mm, 30/25 mm respectively AISI, BS-5400			SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi

. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		ii) Steel Buildings and Structure	Steel Structure for platforms, Gantries, Steel piles casing for following industries: 1. Oil & Gas fields 2. Oil Refineries 3. Fertilizer Industries 4. Cement Plants 5. Sugar Mills 6. Flood light Masts 7. Lattice type towers 8. Jetties & Terminals 9. Industrial Sheds 10. Multistoried Residential and Commercial Buildings, constructed with Steel Structure. In accordance to AISC,AISI, BS 5400, AWS -D.1.1.Masts, towers, plate girders, columns, supports, staging, walkways, factory sheds, grid and yard structures, platforms for all industrial plants (cement, sugar fertilizer, chemical, petro-chemical, oil refineries & processing, Sewage- water treatment) Industrial buildings, 20x70m to 30 to 100m.			 A.B.S Engineering Corporation (Pvt) Ltd., F- 492, S.I.T.E, Karachi- 75700 Brothers Engineering Ltd., 135-Upper Mall, Lahore. Heavy Mechanical Complex (Pvt) Ltd., Taxila A.J. Corporation 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore.
		iii) Industrial steel equipment	Ducts chutes, draughts, chimneys, cyclones, etc for all industrial plants (cement, sugar fertilizer, chemical, petro-chemical, oil refineries & processing, Sewage- water treatment) Plate fabricated (required by any industry) Carbon Steel (CS), Stainless Steel (SS) and Alloy Steel - All grades			 Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Brothers Engineering Ltd., 135-Upper Mall, Lahore.
		iv) System and Steel Frameworks	**			Izhar Steel, Izhar House, 35-Tipu Block, New Garden Town, Lahore
580	73082000	 i) Iron or Steel Towers; (Communication / Transmission Towers) ii) Steel Wind Tower/ Steel Mast iii) Flood Light Towers 	 (i) L-Type, Monopole, Tubular, Antenna Pole (Sizes 3mtr. to 85 mtr. height) (ii) Windmill Tower (Load carrying capacity upto 200 Tons (as per requirement) iii) Flood Light Towers upto 65000 mm height and Diameter upto 1800 mm diameter. iv) Self supporting and lattice type masts & Towers upto 60M. (Excluding Masts and Structures for Oil/ Gas Rigs) 			 Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan A.B.S Engineering Corporation (Pvt) Ltd., F- 492, S.I.T.E, Karachi-75700 Brothers Engineering Ltd., 135-Upper Mall, Lahore. Heavy Mechanical Complex (Pvt) Ltd., Taxila Creative Engineering (Pvt) Ltd., 160/ S, Q.I.E. Kot Lakhpat Lahore Izhar Steel, Izhar House, 35-Tipu Block, New Garden Town, Lahore
		iv) Masts, lattice and jetties of Iron or steel, for ships	1) Breasting Dolphins for Jetty upto 35000 mm long and 2300 mm diameter. 2) Mooring Dolphins for Jetty upto 17500 mm long and 1020 mm diameter. 3) Piles for Jetty upto 33500 mm long and 609 mm diameter. In all types and sizes (excluding internally coated pipes)			A.B.S Engineering Corporation (Pvt) Ltd., F-492, S.I.T.E, Karachi- 75700
		v) Power Transmission Towers of Iron or Steel	11 Kv, 66 Kv, 132 Kv, 220 Kv, 500 Kv and Tele- communication Towers, (Green field, Roof top, Triangular, Monopole in all types and sizes)	Angles, Plates and Hardware of M.S., H.T. of grade DIN17100, S355 JR, ASTM A572/572M grade 50, ASTM A394 Type 0, ISO 898 grade 5.8, 6.8 and 8.8, ASTM A36/A36M		Pakistan Engineering Company Limited, 6/7, Ganga Ram Trust Building, The Mall, Lahore
		vi) Lt Steel Structures 31 ftvii) HT Steel Structures 36 ft 40 ft45 ft	WAPDA Specification DDS-78:2008	**	**	Vision Engineering Pvt Ltd., 160/ S, Q.I.E. Kot Lakhpat Lahore
		viii) 11kV Steel Structure		Y-25kg/mm2, T-40~56kg/mm2	C26, M-0.84, S-0.005, P-0.05	Spleen Manufacturing (Pvt) Ltd., 20-KM
		ix) 132/220kV Transmission Line Towers	P139:80, P163:82	Y-26kg/mm2, T-40~56kg/mm2	C26, M-0.84, S-0.005, P-0.05	Ferozepur Road, Off 3/4 KM Asif Town # 2, Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		x) 132/220kV Sub-Station Steel Gantries	P139:80, P163:82	Y-35kg/mm2, T-50~80kg/mm2	C20, M-1.36, S-0.005, P-0.05	
		xi) Telecommunication Tower (Self Supported Towers, Guyed Mast Towers, Monopoles & Releated Accessories) xii) Steel Lighting Tubular & Octangonal Poles& 132kV Tubular Pole	ASTM A-36	Y-250Mpa, T-400~500Mpa	C26, M-0.84, S-0.005, P-0.05	
		xiii) Steel Structures	Ranging Capacities to Client's Requirements			Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi
581	73083000	i) Towers of iron or steel	Self supporting and lattice type masts & Towers upto 60M. (Excluding Masts and Structures for Oil/ Gas Rigs)	Flood Light Towers upto 65000 mm height and Diameter upto 1800 mm diameter.		 A.B.S Engineering Corporation (Pvt) Ltd., F- 492, S.I.T.E, Karachi- 75700 Brothers Engineering Ltd., 135-Upper Mall, Lahore. Heavy Mechanical Complex (Pvt) Ltd., Taxila
		ii) System and Steel Frameworks				Izhar Steel, Izhar House, 35-Tipu Block, New Garden Town, Lahore
582	73084000	i) Towers of iron or steel	Self supporting and lattice type masts & Towers upto 60M. (Excluding Masts and Structures for Oil/ Gas Rigs)	Flood Light Towers upto 65000 mm height and Diameter upto 1800 mm diameter.		 A.B.S Engineering Corporation (Pvt) Ltd., F- 492, S.I.T.E, Karachi- 75700 Brothers Engineering Ltd., 135-Upper Mall, Lahore. Heavy Mechanical Complex (Pvt) Ltd., Taxila
		ii) System and Steel Frameworks	-			Izhar Steel, Izhar House, 35-Tipu Block, New Garden Town, Lahore
		iii) Scaffolding and structural sections	Diameters of 1/2" to 12" Square1 ½" x 1 ½" to 10" x 10" Rectangular1"x2" to 6"x10" 1.8mm to 12.7 mm Wall Thickness	As per Standard	As per Standard	International Industries Ltd., LX 15-16, Landhi Industrial Area, Karachi
583	73089010	 i) Gates of Iron or steel ii) Racks of Iron or Steel iii) Shelvings of Iron or steel 	 i) Gates for Barrages. In accordance to AISC, AWS D.1.1, Sizes (up to 3 MTR heights, 4 MTR wide, 12 MTR lengths (Barrage & Tunnel Gate for Hydle & Irrigation purpose). ii) Racks sizes up to width 1.2 MTR, Height 4, and 12 MTR (bolted structure and can be assembled in any dimension Fencing sizes (up to 4mtr height iii) Racking & shelving system - heavy duty pallet racking system, medium duty racking system, library shelving system, compressed filling system etc. For Warehouse, Stores, Supermarket and Factories etc. 			 A.B.S Engineering Corporation (Pvt) Ltd., F- 492, S.I.T.E, Karachi- 75700 Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan Gujrat Steel (Pvt) Ltd., 183 A.M,Shahrah-e- Iraq, Saddar, Karachi
		iv) Power Transmission Towers of Iron or Steel	11 Kv, 66 Kv, 132 Kv, 220 Kv, 500 Kv and Tele- communication Towers, (Green field, Roof top, Triangular, Monopole in all types and sizes)	Angles, Plates and Hardware of M.S., H.T. of grade DIN17100, S355 JR, ASTM A572/572M grade 50, ASTM A394 Type 0, ISO 898 grade 5.8, 6.8 and 8.8, ASTM A36/A36M		Pakistan Engineering Company Limited 6/7, Ganga Ram Trust Building, The Mall, Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		 v) Steel Building and Structure 	Plate Fabricated Profiles/ Pipe Racks, Modules	Y-25kg/mm2, T-40~56kg/mm2	C26, M-0.84, S-0.005, P-0.05	 Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan Spleen Manufacturing (Pvt) Ltd., 20-KM Ferozepur Road, Off 3/4 KM Asif Town # 2, Lahore
		 vi) Structural Circular/square/ rectangular hollow sections (including all structural grades) 	Diameters of 1/2" to 12" Square 1 ½" x 1 ½" to 10" x 10" Rectangular 1"x2" to 6"x10" Wall Thickness 1.8mm to 12.7 mm	As per Standard	As per Standard	International Industries Ltd., LX 15-16, Landhi Industrial Area, Karachi
584	73089090	 i) Gates of Iron or Steel/ Penstocks, other Structure and parts of iron or steel ii) System and Steel Frameworks, Steel Building and Other Structure and parts of iron or steel iii) Steel Gates/DAM Gates 	 i) Gates for barrages, According to AISC AWS D 1.1, Sizes upto 3 mtr height, 4mtr wide, 12 mtr length (barrage & tunnel gate for Hydel and irrigation purpose. ii) Racks sizes up to width 1.2 MTR, Height 4, and 12 MTR (bolted structure and can be assembled in any dimension iii) Steel Structure (for Equipment, Plant Warehouse, Building and other purposes) Light Structure (stairways , ladder railing and Plate Form) Sizes up to 0 ~ 200 mm Medium Structure (flooring) Sizes up to 200 ~350 Heavy Structure (column and framing beam) Sizes depth up to 350~1500 mm iv) Relief Valve Bulkhead Gates, Redial Gates ,Gate Guides and Frame , Draft Tube Gates, Vertical Lift Gates v) Plate Fabricated Profiles/ Pipe Racks, Modules or As per client's requirment 			 Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 Izhar Steel, Izhar, House, 35-Tipu Block, New Garden Town, Lahore Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi A.J. Corporation, 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore. Industrial & Mechanical Engineers (Pvt) Ltd., 403, Noor Estate Building Shahrah-e-Faisal Karachi Rhino Pre- Engineering Building, 18 KM Ferozpur Road, Lahore.
		Boiler Equipment/ Structure	Drums, Chimneys, Steel Structure, Cuts/ Chutes for upto 350 MW Boilers, ASME Sec. 1 OR As per client's requirment			 A.J. Corporation, 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore. Industrial & Mechanical Engineers (Pvt) Ltd., 403, Noor Estate Building Shahrah-e-Faisal Karachi, Izhar Steel, Izhar House, 35-Tipu Block, New Garden Town, Lahore SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
585		i) Pressure Vessels & Storage Tanks / Reservoirs / Vats / Containers, Compression & Expansion Tanks Centrifugal Air Separator Centrifugal Duct Separator of Steel (Iron or Steel) for water and oil storage, etc	Upto 35,000 cubic metre i.e. Diameter= 60 meters, Height= 17 Meters (Fixed & Floated Roof), Circullar Capacity upto 500,000 Liters, Square Tanks for 26 MVA PMTs upto 4500 mm length, 1600 mm width and 2600 mm height. Vessels: Upto 150 MM Wall Thickness (Vertical and Horizontal, All types) (Road Tankers, Deaerator Tanks, Feed Water Tanks, Clarified Tanks, Underground Storage Tanks, Skid Mounted Fuel Tank, storage tanks for petrochimical/oil/chemical industry, alcohol storage tanks, molasses storage tanks, LPG Bullets and bio gas reactors, M.E.G. road Tanker barrels, Oil Storage Tanks, Low Pressure Feed Water Heater/Deaerator and Feed Water Tank. Clarifier Tanks, Aluminum Tanks for Transportation of Fuel (capacity over 300L), Tow bar fuel tanker, truck mounted fuel tanker, trailer mounted fuel tank, mobile dispenser, etc. In accordance to API-650, API-620, BS-2594, BS-799, BS-7777, BS-1564, BS-2564, BS-7122, API-12B, API-12D, API-12F, AWWA, UL No. 142, UL 58)	Material = HR - 255, HR-275, HR-283, HR-285, SA-36, HR 275&25 Steel Plates., Carbon Steel, mild Steel, Stainless Steel and Alloy or any other.		 SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 A.B.S Engineering Corporation (Pvt) Ltd., F- 492, S.I.T.E, Karachi-75700 Al-Jassar Engineering Co., 3 KM from Brahama Interchange M1, Jhang Bahtar Road, Near By Multi Orchids Residencia, Islamabad. Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi Petrosin Ravi Industries Ltd., Shahra-i- Pakistan Kala Shah Kakoo G.T Road Lahore Cylinders Engg. Industries (Pvt) Ltd 9-C, 13th Commercial Street, Phase-II, Defence H. Authority, Karachi
		 ii) Mud Tank / Mud Suction Tank With Valves And Gates iii) Cutting Bottle / Surge Tank 	Used for mud mixing, Mobile/skid mounted Capacity: 100 BBL upto 600 BBL Or as per our client requirement. Capacity: 35 Cu Ft. upto 50 Cu Ft.	Design Code: ASME, Material: Carbon Steel, Internal Lining: Fibercoating/ Epoxy Design Code: ASME, Material: Carbon	Support stimulation fluids/acid upto 16%	 <u>O)</u> Lzbar Staal Lzbar Houce <u>35 Tim Block</u> M) Al-Jassar Engineering Co., <u>3 KM from</u> Brahama Interchange M1, Jhang Bahtar Road, Near By Multi Orchids Residencia, Islamabad. 2) Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi
			Or as per our client requirement.	Steel, Test Pressure: 50 psig, Working Pressure: 30 psig		
		iv) Cement Silo	Capacity: 1000 Cu Ft. upto 2000 Cu Ft. Or as per our client requirement.	Design Code: ASME, Material: Carbon Steel, Test Pressure: 45 psig, Working Pressure: 30 psig		
		 v) Mobile Frac Tank vi) Skid Mounted Frac Tank 	Capacity: 100 BBL upto 600 BBL Capacity: 10 Ton upto 50 Ton Or as per our client requirement.	Design Code: ASME, Material: Carbon Steel, S.S 316, SS 316L, SS 304, SS 304L, ASTM A516 Gr. 70. Internal Lining: Rubber Lining / Fibercoating /Epoxy	Support acid upto 34%	
586	73101000	i) Steel Drums / Tanks, Drums and Other Containers	Oil storage Drum, under storage tank of steel, skid mounted fuel tank, Boxes and Similar Containers (Material & Size as per Requirement)			 Metal Engineering Works (Pvt) Ltd., S-4, S.I.T.E., Karachi Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore
		ii) Cans and Containers	Of any type of steel, whether or not lined or heat insulated but not fitted with mechanical or thermal equipment (other than compressed or liquefied gas), Chlorine cylinders 01 ton capacity			 Hashmi Can Co. Ltd., B-24, Manghopir Road, SITE, PO Box. 3608, Karachi-75700 Brother Engg. Ltd., 135-Upper Mall, Lahore.

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
587	73102900	i) Storage Tanks/Pressure Vessels, Drums and Other Containers	Reservoirs, Tanks, Road Tankers, Deaerator Tanks, Feed Water Tanks, Clarified Tanks, Underground Tanks, Skid Mounted Fuel Tank, Boxes and Similar Containers (Material, Size & Capacity: as per our client requirement.	Design Code: API 650 / ASME Material: Carbon Steel Internal Lining: Fibercoating/Epoxy	Support stimulation fluids/acid upto 16%	 Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan Al-Jassar Engineering Co., 3 KM from Brahama Interchange M1, Jhang Bahtar Road, Near By Multi Orchids Residencia, Islamabad. Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi
		ii) Nitrogen Tank	Used to store and transport nitrogen in liquid or gaseous form, Capacity: upto 3000 Gallons Or as per our client requirement.	Design Code: ASME, Material: SS 304L Cryogenic (Inside), Carbon Steel. (Outside), Test Pressure: 60 psig, Working Pressure: 45 psig	Support Nitrogen in liquid or gaseous form	Al-Jassar Engineering Co., 3 KM from Brahama Interchange M1, Jhang Bahtar Road, Near By Multi Orchids Residencia, Islamabad.
		iii) Cutting Bottle / Surge Tank	Capacity: 35 Cu Ft. upto 50 Cu Ft. Or as per our client requirement.	Design Code: ASME, Material: Carbon Steel, Test Pressure: 50 psig, Working Pressure: 30 psig		
		iv) Cement Silo	Capacity: 1000 Cu Ft. upto 2000 Cu Ft. Or as per our client requirement.	Design Code: ASME, Material: Carbon Steel, Test Pressure: 45 psig, Working Pressure: 30 psig		
588	73110010	Pressure Vessels/ Storange Tanks / Drums Bullets and Column of Iron or Steel	Pressure Vessel, Knock Out Drums, Steam Drums, Steam Saturation Drums ,Boiler Feed Water Tanks, Deaerator Tanks, Truck Mounted Under Ground/above Ground LPG Vessel/ Bullet /Storage Tank, LPG Transportation Bowzers, LNG Spherical Storage Tank, Column / Filter, Slug/ Sludge Catcher (Finger Type/Vessel Type) mounted. In Accordance to ASME SEC VIII Div 1, 2 & 3. BS 5500 Cat 1&2 TEMA, Type: Horizontal & Vertical Size: Dish Head (2:1 tori-spherical Ø6m x 30mm thick in CS and 20mm thick in S. Steel. Plate benging 120mm thick in CS, 4,000mm long in CS. Desing Code/ Standards: API-620,	 LPG Vessel upto 5000mm dia X 52380 mm length and 31 mm thick. 1100 m³ storage capacity. Largest LPG vessels fabricated in Pakistan. 		 Heavy Mechanical Complex (Pvt) Ltd., Taxila Heavy Mechanical Complex-3, Hattar Road, Taxila Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan Izhar Steel, Izhar House, 35-Tipu Block, New Garden Town, Lahore Industrial & Mechanical Engineers (Pvt) Ltd., 403, Noor Estate Building Shahrah-e-Faisal Karachi A.J. Corporation 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore. A.B.S Engineering Corporation (Pvt) Ltd., F- 492, S.I.T.E, Karachi- 75700

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
589	73110020	i) High Pressure Steel Vessels, Storange Tanks of Iron or Steel, Drums, Bullets and Column, Containers	Pressure Vessels, Knock out drums, Steam drums, Steam saturation drums, Boiler feed water tanks, De-aerator tanks, Truck mounted, Above/Under ground LPG Vessels, LNG Bullet / Storage Tank, Spherical storage Tanks, LPG Transportation Bowzers, LNG Spherical Storage Tank, Column / Filter, Slug/Sludge Catcher (Finger Type/Vessel Type), Columns, Stripper, absorption, distillation, dehydration, Deaeration Equipment & De Gasifiers etc. as per customers requirements In Accordance to ASME sec VIII Div 1 & 2. BS 5500 Cat 1&2 TEMA,	Type: Horizontal & Vertical Size: Dish Head (2:1 tori-spherical Ø6m x 30mm thick in CS and 20mm thick in CS 4,000mm long in CS. Desing Code/ Standards: API-620, ASME Sec. VIII-1- 2, 3. 1) LPG Vessel upto 5000mm dia X 52380 mm length and 31 mm thick. 1100 m3 storage capacity. Largest LPG vessels fabricated in Pakistan. LPG Tanks - Static (Cylindrical upto 125 Mton capacity, Spherical upto 500 Mton capacity) LPGBowzers capacity 30 Ton StoragePressure Vessel (cylindrical/spherical), up to 250 mm plate thick For compressed or liquefied gas, of iron or steel Shop built sizes up to 5 x 5 MTR (Width, Height) Site built sizes up to Dia 20 MTR and Length 20 MTR		 Heavy Mechanical Complex (Pvt) Ltd., Taxila Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan Izhar Steel, Izhar House, 35-Tipu Block, New Garden Town, Lahore Industrial & Mechanical Engineers (Pvt) Ltd., 403, Noor Estate Building Shahrah-e-Faisal Karachi Heavy Mechanical Complex-3, Hattar Road, Taxila TDFC (Pvt) Ltd., East Pharange Drainage, Millat Town, Millat Road, Faisalabad A.B.S Engineering Corporation (Pvt) Ltd., F- 492, S.I.T.E, Karachi- 75700 A.J. Corporation 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore. Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000
		45.4 K b. LP c. LP carriag d. Pre	 a. LPG Cylinders with capacity = (6.0kg, 11.8 Kg, 15 Kg and 45.4 Kg) b. LPG Storage Bullets (from 01 MT Capacity to 100 MT) c. LPG Transportation bowzers (10 MT to 25 MT) with under carriage. d. Pressure vessel (15 PSI to 4000 PSI) as per ASME section VIII Div 1 and material thicknes 8mm to 50.8mm 	Working Pressure : 7 Bar Test Pressure : 30 Bar Burst Test Pr :70 Bar DOT, ASME & BS Standard	Material: HR,SG-255 Steel Sheets. DOT, ASME & BS Standard	 Petrosin Ravi Industries Ltd., Shahra-i- Pakistan Kala Shah Kakoo G.T Road Lahore Cylinders Engg. Industries (Pvt) Ltd 9-C, 13th Commercial Street, Phase-II, Defence H. Authority, Karachi Gujrat Steel (Pvt) Ltd., 183 A.M,Shahrah-e- Iraq, Saddar, Karachi FAS Tube Mills & Engineering Industries, 67 - C Steel Street (Meco)Market, Landa Bazar, Lahore -54000 Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan
		 iii) Pressure Vessels for LPG Storage. LPG bulk storage tanks/ Pressure Vessels for LPG Storage. 	As per ASME Code Sec: VIII Div-1. Ranging from 30 Tons capacity and onwards with Wall Thickness from 20mm to 70mm. LPG bulk storage tanks of capacity 500 kgs and above cylindrical pressure vessels of thickness upto 250mm		Material: HR,SG-255 Steel Sheets.	 Cylinders Engg. Industries (Pvt) Ltd 9-C, 13th Commercial Street, Phase-II, Defence H. Authority, Karachi Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan Izhar Steel, Izhar House, 35-Tipu Block, New Garden Town, Lahore Heavy Mechanical Complex (Pvt) Ltd., Taxila A.J. Corporation, 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore. Industrial & Mechanical Engineers (Pvt) Ltd., 403, Noor Estate Building Shahrah-e-Faisal Karachi
590	73110030	i) Storange Tanks	Type: Horizontal & Vertical Size: Dish Head (2:1 tori-spherical Ø6m x 30mm thick in CS and 20mm thick in S. Steel. Plate benging 120mm thick in CS, 4,000mm long in CS. Desing Code/ Standards: API-620.			 Heavy Mechanical Complex-3, Hattar Road, Taxila Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		ii) Iron or Steel Pressure Vessel, Drums, Bullets and Column	Pressure Vessel, Knock Out Drums, Steam Drums, Steam Saturation Drums, Boiler Feed Water Tanks, Deaerator Tanks, Truck Mounted /Under Ground/above Ground LPG Vessel/Bullet /Storage Tank, LPG Transportation Bowzers, LNG Spherical Storage Tank, Column / Filter, Slug/Sludge Catcher (Finger Type/Vessel Type) LNG Spherical storage Tanks. In Accordance to ASME sec VIII Div 1 & 2. BS 5500 Cat 1&2 TEMA,	 LPG Vessel upto 5000mm dia X 52380 mm length and 31 mm thick. 1100 m³ storage capacity. Largest LPG vessels fabricated in Pakistan. 		 A.B.S Engineering Corporation (Pvt) Ltd., F- 492, S.I.T.E, Karachi- 75700 Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 A.J. Corporation 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore.
		iii) Nitrogen Tank	Used to store and transport nitrogen in liquid or gaseous form. Capacity: 1000 Gallons upto 3000 Gallons, Or as per our client requirement.	Design Code: ASME, Material: SS 304L Cryogenic (Inside), Carbon Steel. (Outside), Test Pressure: 60 psig Working Pressure: 45 psig	Support Nitrogen in liquid or gaseous form	Al-Jassar Engineering Co., 3 KM from Brahama Interchange M1, Jhang Bahtar Road, Near By Multi Orchids Residencia, Islamabad.
591	73110040	Pressure Vessels / Storange Tanks	Type: Horizontal & Vertical, Size: Dish Head (2:1 tori-spherical Ø6m x 30mm thick in CS and 20mm thick in S. Steel. Plate benging 120mm thick in CS, 4,000mm long in CS. Desing Code/ Standards: API-620, ASME Sec. VIII-1-2, 3.			 Heavy Mechanical Complex (Pvt) Ltd., Taxila Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan Izhar Steel, Izhar House, 35-Tipu Block New Garden Town, Lahore Industrial & Mechanical Engineers (Pvt) Ltd., 403, Noor Estate Building Shahrah-e-Faisal Karachi Heavy Mechanical Complex-3, Hattar Road, Taxila
592	73110090	i) Iron or Steel Pressure Vessel, Drums, Bullets and Column, Containers, Storange Tanks	Pressure Vessel, Knock Out Drums, Steam Drums, Steam Saturation Drums ,Boiler Feed Water Tanks, Deaerator Tanks, Truck Mounted /Under Ground/above Ground LPG Vessel/Bullet /Storage Tank, LPG Transportation Bowzers, LNG Spherical Storage Tank, Column / Filter, Slug/Sludge Catcher (Finger Type/Vessel Type) LNG Spherical storage Tanks. In Accordance to ASME sec VIII Div 1 & 2. BS 5500 Cat 1&2 TEMA, Containers for compressed or liquefied gas, of iron or steel	Type: Horizontal & Vertical Size: Dish Head (2:1 tori-spherical Ø6m x 30mm thick in CS and 20mm thick in S. Steel. Plate benging 120mm thick in CS, 4,000mm long in CS. Desing Code/ Standards: API-620, ASME Sec. VIII-1- 2, 3. 1) LPG Vessel upto 5000mm dia X 52380 mm length and 31 mm thick. 1100 m3 storage capacity. Largest LPG vessels fabricated in Pakistan.		 Heavy Mechanical Complex (Pvt) Ltd., Taxila Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan Izhar Steel, Izhar House, 35-Tipu Block, New Garden Town, Lahore Industrial & Mechanical Engineers (Pvt) Ltd., 403, Noor Estate Building Shahrah-e-Faisal Karachi Heavy Mechanical Complex-3, Hattar Road, Taxila A.B.S Engineering Corporation (Pvt) Ltd., F- 492, S.I.T.E, Karachi- 75700 A.J. Corporation 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore. Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000

. No. PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
	ii) LPG cylinders of iron or steel, Pressure Vessels for LPG Storage/ LPG bulk storage tanks	 a. LPG Cylinders with capacity = (6.0kg, 11.8 Kg, 15 Kg and 45.4 Kg) b. LPG Storage Bullets (from 01 MT Capacity to 100 MT) c. LPG Transportation bowzers (10 MT to 25 MT) with under carriage. d. Pressure vessel (15 PSI to 4000 PSI) as per ASME section VIII Div 1 and material thicknes 8mm to 50.8mm ' As per ASME Code Sec: VIII Div-1. Ranging from 30 Tons capacity and onwards with Wall Thickness from 20mm to 70mm. LPG bulk storage tanks of capacity 500 kgs and above cylindrical pressure vessels of thickness upto 250mm 	Working Pressure : 7 Bar Test Pressure : 30 Bar Burst Test Pr :70 Bar DOT, ASME & BS Standard	Material: HR,SG-255 Steel Sheets. DOT, ASME & BS Standard	 Petrosin Ravi Industries Ltd., Shahra-i- Pakistan Kala Shah Kakoo G.T Road Lahore Cylinders Engg. Industries (Pvt) Ltd 9-C, 13th Commercial Street, Phase-II, Defence H. Authority, Karachi Gujrat Steel (Pvt) Ltd., 183 A.M,Shahrah-e- Iraq, Saddar, Karachi FAS Tube Mills & Engineering Industries, 67 - C Steel Street (Meco)Market, Landa Bazar, Lahore -54000 Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan Izhar Steel, Izhar House, 35-Tipu Block, New Garden Town, Lahore A.J. Corporation, 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore. Industrial & Mechanical Engineers (Pvt) Ltd., 403, Noor Estate Building Shahrah-e-Faisal Karachi Heavy Mechanical Complex (Pvt) Ltd., Taxila
	iii) Nitrogen Tank	Used to store and transport nitrogen in liquid or gaseous form. Capacity: 1000 Gallons upto 3000 Gallons, Or as per our client requirement.	Design Code: ASME, Material: SS 304L Cryogenic (Inside), Carbon Steel. (Outside), Test Pressure: 60 psig Working Pressure: 45 psig	Support Nitrogen in liquid or gaseous form	10) Karaoki Shinward & Enginearing Works Al-Jassar Engineering Co., 3 KM from Brahama Interchange M1, Jhang Bahtar Road, Near By Multi Orchids Residencia, Islamabad.
93 73121010	 i) Stranded wire of Iron or steel, not electrically insulated 	As per BSS-4461-1969, ASTM-A36-75, ASTM-615-76a (1977)	**		Metropolitan Steel Corporation Limited, 706- Progressive Plaza, 101-Bemount Road, Karachi
	ii) Galvanized Steel Strands Steel Wire / Rope	BS 302, JIS G3525, BS 2763	As per Standard	As per Standard	Pakistan Wire Industries, E-51, Textile Avenue, SITE, Karachi
	iii) Galvanized Steel Wire Stranded / Galvanized steel wire				Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore
	iv) P.C Strand	Size 3/8", 7/16" & 1/2"		C-Si-Mn-P-S-Cr-Ni-Cu Al & Mo	 Cable & Conductor Ltd., 1st Floor, 41 Civic Centre, Barkat Market New Garden Town, Lahore United Wire Industries (Pvt) Ltd., 19/20 KM, Lahore Sheikhupura Road, Lahore
	 v) Pre-Stressed Concrete steel Wire Spiral/ Plain for Railways Sleeper / Ready made roofs and other 	JJS G 3506 / SWRH-82 B (ASTM A-416/B.s. 5896 Grade 250/270-K, Normal Relaxation, Not Electrically Insulated) ASTM A421-15 BS 5896, JIS G3536 GB-T 5223-2014 and equivalent	7 Wire Strands 1/2", 3/8", 7/16"	C 0.81, Si 0.24, Mn 0.84, P 0.015, S 0.012	 Wire Manufacturing Industry Ltd., 45-KM Lahore-Multan Road, Nathey Khalsa, Bhai Pheru, District Kasur United Wire Industries (Pvt) Ltd., 19/20 KM, Lahore Sheikhupura Road, Lahore
	vi) Prestressed Concrete Wire	JJS G 3506 / 1980 SWRH-82 B(ASTM A-421 Grade 250/270-K, Not Electrically Insulated)	Wire (variable dia)	C 0.80/.84, Si 0.22, Mn .60/.80, P .02X, S.02X, Cr .240/.260, N .010, Cu .007, Ni .014, Mo .001, V .025	Wire Manufacturing Industry Ltd., 45-KM Lahore-Multan Road, Nathey Khalsa, Bhai Pheru, District Kasur
	vii) High Carbon Steel wire strand	JIS G 3536 SWRH-82B-1 (Not Electrically Insulated)	Wire (variable dia)	C 82/83, Si 23/27, Mn 76, P 11/17, S 4/6, Cr 17/19	
	viii) High Tensile Steel Wire	JIS G 3506 /B.S. 5896 (Grade 250/270-K, Normal Relaxation, Not Electrically Insulated)	Wire (variable dia)	C.81%83%, Mn .75-77%, P .010- .014%, S .002%005%, Si .2526%,Sr .17%18%	
	ix) Hard Drawn/ Spring wire	JIS G 3536(Not Electrically Insulated)	Wire (variable dia)	C .83, Mn 0.67, P 0.013, S 0.010, Si 0.19, Cr 0.250, N .006, Cu .007, Ni .014, Mo 0.25, Sn .002	

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
594	73121020	i) Stranded ropes of Iron or steel, not electrically insulated	ASTM, JIS all International spec	Low Carbon to High Carbon Steel Wire & Ropes		 Chaudhri Wire Rope Industries (Pvt) Ltd., Km G.T Road Muridke, Lahore Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore
		ii) Steel Wire Rope	6X7FC,SC & IWrC-6X12, 6X19, 6X24, 6X36, 6X37 FC, SC & IWRD		C-Si-Mn-P-S-Cr-Ni-Cu Al & Mo	Cable & Conductor Ltd., 1st Floor, 41 Civic Centre, Barkat Market New Garden Town, Lahore
		iii) Wire Rope (Not electrically insulated)	SWRH 42B, 47B, 62B & 72B JIS G 3506	8 mm to 20 mm Ø	C/ 62-72, Si 195, Mn 67, P .6, S .13, Si 195-201	Wire Manufacturing Industry Ltd., 45-KM Lahore-Multan Road, Nathey Khalsa, Bhai Pheru, District Kasur
		iv) Galvanized/Ungalvanized Inner Wire Roll/Steel Cable Clutch, Brake Throttle Automotive Sector Galvanized Guy rope/ Strand For the Reinforcement of Optical Fiber Cable And Communication Cable, for Signaling and Galvanized Stay Strand For Power Transmitting Towers	JIS 3540 GB 1200-88 YB/T 5004-93 JISG 3525 JISG3525 GB-1179-1999	As per standard	As per standard	Pakistan Wire Industries, E-51, Textile Avenue, SITE, Karachi
595	73121090	Core Wire for ACSR	JIS G 3506 62 B, 72 B (Not Electrically Insulated)	Wire (variable dia)	C 73, m 67, P 0.06, S 0.013, Si .195	 Wire Manufacturing Industry Ltd., 45-KM Lahore-Multan Road, Nathey Khalsa, Bhai Pheru, District Kasur Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
596	73130000	Barbed wire of Iron or steel	As per BSS-4461-1969, ASTM-A36-75, ASTM-615-76a (1977)			 Metropolitan Steel Corporation Limited, 706- Progressive Plaza, 101-Bemount Road, Karachi ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi
597	73143100	Fencing of Iron or steel	Fencing (up to 4 mtr height)	**	**	 Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan
598	73143900	Fencing of Iron or steel	Fencing (up to 4 mtr height)			 Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
599	73144100	Fencing of Iron or steel	Fencing (up to 4 mtr height)			 Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan
600	73144900	Fencing of Iron or steel	Fencing (up to 4 mtr height)			 Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 ASG Metals Ltd., EIZ/LL/SP-08, Eastern Industrial Zone, Port Qasim Authority, Karachi Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan
601	73170090	Staples Pins of iron or steel	All Sizes			Dollar Industries (Pvt) Ltd., D-85, SITE, Karachi - 75700
602	73181200	Screws (Wood, Threaded, Iron & Steel)	Gauges : 3 SG to 14 SG, Lengths : 1/2" to 5" British & DIN Standards - Twinstart & Full Dia.	Countersunk & Round Head, Slotted & Phillips, Partial & Fully Threaded Screws.	Mild Steel with 0.10% Carbon & Stainless Steel.	Adamjee Engineering (Pvt.) Ltd., Plot No. 1 & 16, Sector 20, Korangi Industrial Area, Karachi
603	73181400 i) Screws (Se	 Screws (Self-Tapping, Threaded) 	Gauges : 4 SG to 14 SG Lengths : 1/2" to 5" (or Metric equivalents) BS-4174 or DIN Standards	Hardened Screws, all types of heads, Nickel, Zinc or Rainbow Plated for use in metal plates & sheets made from Medium Carbon Steel .Torque Strength upto 136 lbs/sg. Inch.	Medium Carbon Steel 0.15-0.20,	Adamjee Engineering (Pvt.) Ltd., Plot No. 1 & 16, Sector 20, Korangi Industrial Area, Karachi
		ii) Machine Screws	Guages : 1/8 to 5/16" & M3 to M8 Lengths : upto 5" or 125mm BS-4183 & DIN Standards 963, 964 & 965.	All types of Heads, Zinc & Rainbow Plated.	Mild Steel & Stainless Steel.	
		iii) Drywall (Bugle Head) Screws.	Guages : 6 to 12 SG Length : Upto 3" DIN Standard in Fine & Coarse Thread.	Hardened Screws, all types of heads, Nickel, Zinc or Rainbow Plated for use in metal plates & sheets made from Medium Carbon Steel .Torque Strength upto 136 lbs/sg. Inch. (Black Phosphated)	Medium Carbon Steel 0.15-0.20, S&P 0.045% max, & Mn 0.20 – 0.60% & Stainless Steel.	
604	73181590	i) Bolts of Iron or steel	i) Dia M6 ~ M24, SAE 4.8, 5.8, 8.8, 10.9, 12.9	SAE 1,2,5,8,A574 Tensile:60,74,120,150,180 KSI Yield Strength: 36,57,92,81,130,160 KSI	S&P 0.045% max, &	Mirza Younas & Co., Zahoor Coloney Momin Pura Road, Near Bhatta Daroghawala,Lahore
			ii) Dia M6 ~ M24, M.S & High Tensile	SAE 5, SAE 8 , SAE 2 Tensile Stress 120 KSI,150 KSI,	Mn 0.20 – 0.60% & Stainless Steel.	
			iii) Dia M6 ~ M24, M.S & High Tensile	SAE 2, 5, 8 Proof Stress 105~ 1050 KSI	C= 0.28~ 0.55 Mn= 0.30max Ph= 0,05 max S=0.15 max Cr= 0.25 max	
			iv) Bolts, Nuts, Rivets, Studs, Washers, Screws of Steel, Mild Steel, Stainless Steel and Galvanized	Grade AISI 1008, 1010, 1012, 1025, 1030, and equivalent grade 8.8, 10.8, 12.8 and equivalent; Galvanized High Tensile Strength	-	Inayat Brothers, P-27 Canal Road, Peoples Colony # 1, Faisalabad
			v) Agricultural and all types of Bolts, Nuts and Washers	AISI 1008, 1010, 1012, 1015, 1025, 1030, and equivalent High Tensile Strength		I. B. Industries, P-27 Canal Road, Peoples Colony # 1, Faisalababad
			vi) Gauges : M3 to M8, Lengths : upto 110mm Hex Head Bolts, Flat & Indented. British & DIN Standards.	Fully or partially threaded, Zinc or Rainbow Plated.	Mild Steel, Medium Carbon Steel & Stainless Steel.	Adamjee Engineering (Pvt.) Ltd., Plot No. 1 & 16, Sector 20, Korangi Industrial Area, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		 ii) Hex Washer Indented / Hex Flange Indented / Hex Top Round Metric Bolts Material: Low carbon steel (Length6 mm-100 mm) (Gauge:M4-M10) - Other than Automotive iii) Hex Head Metric Bolt Material: Low carbon steel (Length6 mm-100 mm) (Gauge:M4-M8)- Other than Automotive 	Used specifically in Industrial, construction and Home Appliances Industry	Length 6 mm-100 mm & Gauge: M4- M10 to be checked against the standard of JIS B 1189 Length 6 mm-100 mm & Gauge: M4- M10 to be checked against the standard of DIN 558/DIN 933/JIS B1180	C:0.08%	
		Nut & Bolts 2 " to 14 "	WAPDA Specification DDS-10:85			Vision Engineering Pvt Ltd., 160/ S, Q.I.E. Kot Lakhpat Lahore
605	73181610	 i) Hex Washer Indented / Hex Flange Indented / Hex Top Round Extruded / Straight Shank Metric Bolts Material: Medium Carbon Steel (Length6 mm-100 mm) (Gauge:M4-M10) - Other than Automotive ii) Hex Head Metric Bolt Material: Medium Carbon Steel(Length6 mm- 100 mm) (Gauge:M3-M10)- Other than Automotive 	Used specifically in Industrial, construction and Home Appliances Industry	Length 6 mm-100 mm & Gauge: M4- M10 to be checked with strength class of 8.8.	C:0.45%, B:0.0017%	Adamjee Engineering (Pvt.) Ltd., Plot No. 1 & 16, Sector 20, Korangi Industrial Area, Karachi
606	73181900	Threaded Nuts of Iron or steel	Dia M6 ~ M24 Medium,High Carbon & Alloy Steel	SAE 4.8,8.8,10.9 & 12.9	C% 15~55 P% 0.03~0.05 S% 0.03~0.05 Ni% 0.15~0.22 Cr% 0.18~0.25	Mirza Younas & Co., Zahoor Coloney Momin Pura Road, Near Bhatta Daroghawala,Lahore
607	73219000	Shelves of Iron or steel	Made of CRC, HRC, Galvanized Steel Sheet			Gujrat Steel (Pvt) Ltd., 183 A.M,Shahrah-e-Iraq, Saddar, Karachi
608	73251000	Articles of Cast Iron	 Cast iron castings upto 28 tons weight (sigle piece) steel casting (low alloy) upto 32 tons weight (single piece) Gray Cast Iron, From 1 kg to 1000 kg 	-		 Heavy Mechanical Complex (Pvt) Ltd., Taxila Jamal-ud-Din Sons & Co., 44 Umer Market Link Railway Road, Near Railway Station Lahore.
609	73259100	Hi-chrome grinding media balls	Hi-chrome grinding media balls of dia 22-100 mm			Heavy Mechanical Complex (Pvt) Ltd., Taxila
610	73259900	i) Articles of Cast Mild Steelii) Articles of SG Iron	Casted Mild Steel From 1 kg to 1000 kg SG Iron From 1 kg to 500 kg			Jamal-ud-Din Sons & Co., 44 Umer Market Link Railway Road, Near Railway Station Lahore.
611	73261100	Forged grinding media balls	Forged grinding media balls of diameter 30-120mm			Heavy Mechanical Complex (Pvt) Ltd., Taxila
612	73261911	Crank Shaft Forgings	Crank shaft forging for motor cycle engine	Apprearance smooth forged steel. Silver grey. Hardness HRC 17-25	AISI 1045, C = 0.43-0.50, Si = ≤ 0.15 - 0.35 Mn = 0.30-0.60	Jin Kwang Jaz (Pvt) Ltd., DSU-33, Down Stream Industrial Estate, Pakistan Steel, Bin Qasim, Karachi
613	73261919	Crank Shaft Forgings	Crank shaft forging for motor cycle engine	Apprearance smooth forged steel. Silver grey. Hardness HRC 17-25	AISI 1045, C = 0.43-0.50, Si = ≤ 0.15 - 0.35 Mn = 0.30-0.60	Jin Kwang Jaz (Pvt) Ltd., DSU-33, Down Stream Industrial Estate, Pakistan Steel, Bin Qasim, Karachi
614	73261990	i) Steel free forged items	Steel free forged items upto 120kg per piece weight			Heavy Mechanical Complex (Pvt) Ltd., Taxila
		ii) Articles, Forged or stamped, iron or alloy steels	Die/ Free forged, Die forging up to 5Kg. Free Forging uo tp 1000Kgs	Machined	All type of alloy steel grades. Chemical composition as per international quality standards or as specified by customers.	Peoples Steel Mills Ltd., Javedan Nagar, Manghpir, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		iii) Other Forgings	 i) Car forging component for towing, hub front axle wheel, engine assembly, gear assembly etc. 	Apprearance smooth forged steel. Silver grey. Hardness HRC 17-25	$\begin{array}{l} - AISI 1025, C=0.22\text{-}0.28, Si = \le 0.15\text{-}\\ 0.35, Mn = 0.30\text{-}0.60\\ - AISI 1035, C=0.32\text{-}0.38, Si = 0.15\text{-}\\ 0.35, Mn = 0.6\text{-}0.9\\ - AISI 1045, C=0.43\text{-}0.50, Si = \le 0.15\text{-}\\ 0.35, Mn = 0.30\text{-}0.60\\ - SVDH23F, C=0.25\text{-}0.26, Si = 0.26, Mn = 1.54\text{-}1.55\\ - S40VCSS1A, C=0.38\text{-}0.43, Si = 0.40\text{-}\\ 0.60, Mn = 0.70\text{-}1.00\\ - S53C, C=0.5\text{-}0.56, Si = 0.15\text{-}0.35, Mn = 0.6\text{-}0.9 \end{array}$	Jin Kwang Jaz (Pvt) Ltd., DSU-33, Down Stream Industrial Estate, Pakistan Steel, Bin Qasim, Karachi
			ii) Tractor forging components for coupling, pump, shaft, weight, differential and gear assembly	Apprearance smooth forged steel. Silver grey. Hardness HB 248-323	$\begin{split} - & \text{SAE-8620}, \text{ C}= 0.17\text{-}0.23, \text{ Si} = \leq 0.15\text{-}\\ 0.35, \text{ Mn} = 0.6\text{-}0.9\\ - & \text{SAE-8620\text{-}H}, \text{ C} = 0.17\text{-}0.23, \text{ Si} = \\ \leq 0.15\text{-}0.35, \text{ Mn} = 0.6\text{-}0.95 \end{split}$	
615	73269060	i) LT ABC Dead End (Anchoring) clamp	Cable Messenger at the Dead End Point			Alsons Industries (Pvt) Ltd., S-18, S.I.T.E., Karachi
		ii) HT ABC Dead end Clamp (Anchoring)	Aerial Bundled Cable (3x185 mm ² Dead End End Connections Specification K-R&D-HTABC-PD-29			
		iii) Dead End Clamp for Dog & Ospery conductor	Holding the Conductor at Dead End in 11 KV Over Head Distribution System			
		iv) Loop dead end clamp LC 10	Making the LT Dead Ends & Tee Offs in Over Head Distribution System			
616	73269090	i) Shelves of Iron or steel	Made of CRC, HRC, Galvanized Steel Sheet			Gujrat Steel (Pvt) Ltd., 183 A.M,Shahrah-e-Iraq, Saddar, Karachi
		ii) Special Spool / Spools (Spacer / Drilling/ Mud Cross)	Size: 2-1/16" to 30" Range: 2K-15K	API Spec 7-1/6A	AISI 4130 / 4140	MEC Energy, Plot No. 80-D, Street No. 6, Industrial Area Sector I-10/3, Islamabad
		iii) Loop Dead End Clamp LC-10 & LC-16	WAPDA Specification PD-111a-05			Creative Engineering (Pvt) Ltd., 160/ S, Q.I.E. Kot Lakhpat Lahore
		iv) Dead End Clamp Dog & Ospery	WAPDA Specification DDS-73:2004			
		v) Transmission Line Hardware (Suspension/Tension String Fittings/Assemblies for Earth Wire)	NTDC-WAPDA P-141:80			Shaheen Traders, 1-KM Abu Bakar Road, Near Saggian Flyover, Ring Road, Lahore
		vi) Transmission Line Hardware Accessories (Mid Span Joints & Repair Sleeves)	NTDC-WAPDA P-144:80			
		vii) Transmission Line Hardware Accessories (Stock Bridge Dampers)	NTDC-WAPDA P-142:83			
		viii) Transmission Line Hardware Accessories (Splice Shunt, Armour Rod)	NTDC-WAPDA P-140:82			
617	74031100	Cathodes	Copper Cathodes cut to pieces			Newage Cables (Pvt) Ltd. Newage Mansion Mcleod Road, Lahore
618	74031200	General House Wiring (PVC)	3/.029", 7/.029", 3/.036", 7/.036", 7/.044", 7/.052", 7/.064" BS-2004, BS-6004	T/S, Elong, DC Resistance IR, HVT	Purity: 99.99%	 H.M. Esmail & Co. (H.M. Cables), SB-5, Madina City Mall, 6th Floor, Abdullah Haroon Road, Karachi Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
619	74031300	Copper Billets/Ingots	QQC 576 Latest	Round & Slab Shapes	99.9% Pure Copper	Wah Brass Mills (Pvt) Ltd., Quaid Avenue (Adjacent POF Main Gate), Wah Cantt.
620	74032100	Brass Billets/Ingots	Def-Stan 95-9 IU 92 & other	Round about 200 kg & Slab From 300kg-6MT	60:40, 70:30, 80:20, 90:10, Any other	Wah Brass Mills (Pvt) Ltd., Quaid Avenue (Adjacent POF Main Gate), Wah Cantt.

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
621	74071020	Copper Rod	ASTM B-49 Dia 8.00 & 10.50mm ASTM B-49 Electrical Conductor	Breaking Load Elongation Resistance	Purity: 99.99%	 Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore H.M. Esmail & Co. (H.M. Cables), SB-5, Madina City Mall, 6th Floor, Abdullah Haroon Road, Karachi Pakistan Cables Limited, B-21, SITE, P.O. Box No.5050, Karachi - 75700 Bawany Metals Ltd., 1001-Unitowers, I.I. Chundrigar Road, Karachi
622	74081900	Copper Wire	ASTM B-2 & B-3			 Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
623	74082900	Copper Wire	ASTM B-2 & B-3	-		 Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
624	74091100	Copper Coils	QQC 576 Latest	0.5 mm – 05 mm Thick, Weighing upto 2.4MT	99.9% Pure Copper	Wah Brass Mills (Pvt) Ltd., Quaid Avenue (Adjacent POF Main Gate), Wah Cantt.
625	74091900	Copper strips/ Sheets/ Plates not in coil	QQC 576 Latest	0.5 mm – 30 mm Thick	99.9% Pure Copper	Wah Brass Mills (Pvt) Ltd., Quaid Avenue (Adjacent POF Main Gate), Wah Cantt.
626	74092100	Brass Coils	Def-Stan 95-9, IU-92, BS-2870, EN-1652	0.5 mm – 05 mm Thick, Weighing upto 2.4MT	60:40, 70:30, 80:20, 90:10, Any other	Wah Brass Mills (Pvt) Ltd., Quaid Avenue (Adjacent POF Main Gate), Wah Cantt.
527	74092900	Brass Strips / Sheets/ Plates not in Coils	Def-Stan 95-9, IU-92, BS-2870, EN-1652	0.5 mm – 30 mm thick	60:40, 70:30, 80:20, 90:10, Any other	Wah Brass Mills (Pvt) Ltd., Quaid Avenue (Adjacent POF Main Gate), Wah Cantt.
628	74111090	i) Aluminum & Copper Pipe / Busbar / Tube	NTDC-WAPDA P-114:2011	-		Shaheen Traders, 1-KM Abu Bakar Road, Near Saggian Flyover, Ring Road, Lahore
		ii) Copper Coated/Cladded Steel Rod	NTDC-WAPDA P-116:81			
		iii) Grounding Set Comprising Copper Coated Steel Road & Copper Wire 1.5M)	P-116:81, P-016:68			
629	74121000	Sockets for Natural Gas and LPG	Type: Bayonet, Angle Bayonet, Compression 10mm, Micro, Leakage test at 1 bar (1KV). Body: Brass (Forged), Size: 1/2:, 3/8",			Tesla Industries Pvt. Ltd., Plot No. 81-F, St. 6, I- 10/3, Islamabad
530	74122000	Sockets for Natural Gas and LPG	Type: Bayonet, Angle Bayonet, Compression 10mm, Micro, Leakage test at 1 bar (1KV). Body: Brass (Forged), Size: 1/2:, 3/8",			Tesla Industries Pvt. Ltd., Plot No. 81-F, St. 6, I- 10/3, Islamabad
631	74130000	i) Stranded Copper Wire/ cables of copper not electrically insulated.	Sizes: 1.5MM to 1000MM, Voltage Grade: upto 220 KV, BSS- 6360:7884	• HDBC • PACC	High Conductivity Copper	 Pakistan Cables Limited, B-21, SITE, P.O. Box No.5050, Karachi - 75700 Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore
		ii) Flexible Cable	0.5mm ² - 240mm ² , BS-6004, BS-6500	T/S, Elong, DC Resistance IR, HVT	Purity: 99.99%	1) H.M. Esmail & Co. (H.M. Cables), SB-5,
		iii) Instrument Cable	0.5mm ² - 4mm ² , BS-5308, Pl & PII (Shielded) (Flexible & Stranded.)	(PVC)		Madina City Mall, 6th Floor, Abdullah Haroon Road, Karachi
		iv) PVC Power Cable	0.5mm ² - 400mm ² , BS-6346, IEC-502 (Armoured & Unarmoured)]		2) Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
		v) XLPE Power Cable	1.5mm ² - 400mm ² , BS-5467, IEC-502 (Armoured & Unarmoured)	1		
632	74151000	Nails and tacks, drawing pins, staples and similar articles	All Sizes			Dollar Industries (Pvt) Ltd., D-85, SITE, Karachi – 75700

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
633	74152100	Washers (Brass) including spring washers.	Sizes a) Outter Dia upto 80mm b) Thickness upto 20mm <u>Types</u> As per customer requirements. Thrust Washers various types.	Sintered Washers made from Bronze Powder.	90% Copper & 10% Tin or 100% Bronze.	Adamjee Engineering (Pvt.) Ltd., Plot No. 1 & 16, Sector 20, Korangi Industrial Area, Karachi
634	74153300	Brass Screws for wood	Guages 3 - 16 & upto 4" In length - British & DIN Standards	Countersunk & Round Head, Slotted & Phillips.	67% Copper, 33% Zinc	Adamjee Engineering (Pvt.) Ltd., Plot No. 1 & 16, Sector 20, Korangi Industrial Area, Karachi
635	74153900	Substation Connectors Mono- metallic / Bi-metallic (Aluminum or Copper Alloys)	NTDC-WAPDA P-176:2011			Shaheen Traders, 1-KM Abu Bakar Road, Near Saggian Flyover, Ring Road, Lahore
636	76012000	Aluminium Alloy Ingots	As per following standards; JIS, BS, HD2, HD2G, HD4, HD1.1, LM6, LM13, LM24, LM28, ADC12, AC3A, AC4B, AC4C, ADC6, B12G19X, AS7GO6, ALSi12Cu	As per International Standards " JIS, Japan, ASTM, USA and BS, British"	Si =9~12%, Fe =0.6~1.2%, Cu =2 ~3.5%, Mn=0.10~0.80%, Mg =0.10~0.50%, Ni =0.10%, Zn=0.10~1.00%, Pb =0.10%, Sn =0.10%	 Sun Metal Industries (Pvt. Ltd., Suite # 108, Anum Trader Center, State Avenue, S.I.T.E. Karachi. New Era Industries, F61/G S.I.T.E, Karachi Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
637	76041010	Aluminium Rod	9.50 mm ASTM B-233	T/S, Elong, Torsion	Conductivity: 61.4%: Silicon:0.1, Iron:0.4, Copper:0.05, Manganese:0.01, Chromium:0.01, Zinc:0.05, Boron:0.05, Gallium:0.03, Vanadium + Titanium: 0.02, Other Elements:0.03, Other Elements:0.01, Aluminum: 99.5	 H.M. Esmail & Co. (H.M. Cables), SB-5, Madina City Mall, 6th Floor, Abdullah Haroon Road, Karachi Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
638	76042100	Hollow Profiles of Aluminum Alloy	Door / Window Sections: BSS 1474, ASTM-B-221, BSS-3987, AAMA CLASS 1, BSS- 1615	• Annodized • Powder Coated	Aluminium Alloy	 Pakistan Cables Limited, B-21, SITE, P.O. Box No.5050, Karachi - 75700 Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
639	76042910	Parallel Grooves Connector S-117, S- 157, T-110, T-150, T-155, T-220	WAPDA Specification P:25-67			Creative Engineering (Pvt) Ltd., 160/ S, Q.I.E. Kot Lakhpat Lahore
640	76042990	Profiles of Aluminum Alloy	Door / Window Sections BSS 1474, ASTM-B-221, BSS-3987, AAMA CLASS 1,BSS-1615	• Annodized • Powder Coated	Aluminium Alloy	 Pakistan Cables Limited, B-21, SITE, P.O. Box No.5050, Karachi - 75700 Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
641	76051100	Aluminium Rod	Aluminium rod dia 9.5 mm			Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
642	76051900	Aluminium Wire	ASTM B-230			 Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
643	76052100	Alloyed Aluminium Rod	Alloyed Aluminium rod dia 9.5 mm			Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
644	76052900	Alloyed Aluminium Wire	Alloyed Aluminium wire All sizes			Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
645	76061200	Aluminium Composite Panel	Size: 8' x 4' Thickness 4mm	Aluminium Coil & Plastic	PE & PVDF	Akbari Engineering (Pvt) Ltd., Plot No. 188, Sunder Industrial Estate, Raiwind Road, Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company	
646	76071100	 i) Aluminium Cable foil for telephone industries ii) Aluminium Finstock in continuous length for all types of air conditionersers, deep freezers & Fridges 	 i) Foil for Telephone industry 0.200mm-0013mm both side of foil with 50u for PE/ Copolymer Coating- 0.004nmm or 0.050mm making on overall substance 0.300mm- 0.005mm (Not over 0.2mm thickness) ii) Aluminium Foil thickness 7-200u, both side or one side with CPV coating, hydrophilic corrosion resistant (Lacquered, Blue, Gold & Silver) not over 0.2mm thick, not backed Aluminium foil not exceeding 0.2mm, 			 Aluminum Processing Industries Int'l (Pvt) Ltd., D-76, S.I.T.E. Karachi Pakistan Metal Industries, D-76, Main Avenue, S.I.T.E. Karachi Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore 	
647	76071990	 i) Aluminium disposable products for air lines & fast food industries (Kitchen Foil, Utensils) ii) Aluminium Finstock for all types of air conditionersers, deep freezers 	(Aluminium Trays, Casseroles & Kitchen Foil) Aluminium foil not exceeding 0.2mm (Thickness from 0.12mm to 0.20mm both side or one side with CPV coating, hydrophilic			 Aluminum Processing Industries Int'l (Pvt) Ltd., D-76, S.I.T.E. Karachi Pakistan Metal Industries, D-76, Main Avenue, S.I.T.E. Karachi 	
		& Fridges iii) Aluminium foil for pharma industries	corrosion resistant (Lacquered, Blue, Gold & Silver) Aluminium Foil for Blister & Strip Pakcing for Pharma Industries (not exceeding 0.2mm). A. Foil 7-20u sanwich+one side polyester film & other side polyethylene. B. Foil 7-10u other side polyester film with polyethylene coatings. C.7-10u foil with 40-50gsm parchment paper/poster paper + LDPE printed/un-printed alu alu cold forming foil				
		iv) Alu Alu Cold forming Foil /Alu Alu Blister Foil/ Tropical foil/ Blister foil	OPA Al-foil PVC	Density 2.7 - 5.2 g/cm3, High elastic Strength High Pressure resistance	Not react with the vast majority of foods and pharmaceutical products.	Zenith Packages Industries (Pvt) Ltd., Village Dhonday Pajian Road, Raiwind Lahore	
648	76072000	iii) Aluminium foil for pharma industries	Aluminium Foil for Blister & Strip Pakcing for Pharma Industries (not exceeding 0.2mm). A. Foil 7-20u sanwich+one side polyester film & other side polyethylene. B. Foil 7-10u other side polyester film with polyethylene coatings. C.7-10u foil with 40-50gsm parchment paper/poster paper + LDPE printed/un-printed alu alu cold forming foil			 Aluminum Processing Industries Int'l (Pvt) Ltd., D-76, S.I.T.E. Karachi Pakistan Metal Industries, D-76, Main Avenue, S.I.T.E. Karachi 	
		Aluminium foil paper backed for cigarette and Tea industries	Thickness not exceeding 0.2mm for aluminum foil 6.0u - 7.0u laminated with paper (tissue paper, poster, paper, board 20 - 400 gsm both Silver & Gold lacquered foil.	N/15am, 45-60gsm elongation 2 - 2.5%			
		iv) Alu Alu Cold forming Foil /Alu Alu Blister Foil/ Tropical foil/ Blister foil	OPA Al-foil PVC	Density 2.7 - 5.2 g/cm3, High elastic Strength High Pressure resistance	Not react with the vast majority of foods and pharmaceutical products.	Zenith Packages Industries (Pvt) Ltd., Village Dhonday Pajian Road, Raiwind Lahore	
		Laminate for Flexible Packaging (Backed)	Plastic and Aluminum Foil based laminates for flexible packaging	Solid in roll form or bags	Aluminum Foil & Polymer	Packages Convertors Ltd., Shahrah-e-Roomi, P.O. Amer Sidhu, Lahore-54760	
649	76109000	Aluminium Rod	9.50 mm ASTM B-233	T/S, Elong, Torsion	Conductivity: 61.4%: Composition: Silicon: 0.1, Iron: 0.4, Copper: 0.05, Manganese: 0.01 Chromium: 0.01, Zinc: 0.05, Boron: 0.05 Gallium: 0.03, Vanadium + Titanium: 0.02 Other Elements: 0.03, Other Elements: 0.01 Aluminum: 99.5	 H.M. Esmail & Co. (H.M. Cables), SB-5, Madina City Mall, 6th Floor, Abdullah Haroon Road, Karachi Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore 	
650	76110000	Aluminium Tanks	Aluminum Tank for Transportation of Fuel (capacity over 300L)	Truck mounted, trailer type, tow bar type, Rectangular/circular and semi clliptical storage tank. Al refuller and Bowser and mobile dispenser.		Metal Engineering Works (Pvt) Ltd., S-4, S.I.T.E., Karachi	

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
651	76121000	Collapsible tubular Containers of Aluminum	Dia=12.5 to 45-mm	Aluminum Purity 99.75 %		Alucan (Pvt) Ltd., E/12, S.I.T.E., Karachi-75730
652	76129030	Aluminium Beverages Cans 250 ML, 300 ML	Aluminium			Pakistan Aluminium Beverage Can Ltd., 29 & 30, M-3 Industrial City, Main Boulevard Sahianwala,, Faisalabad
653	76129090	Pilfer Proof Aluminium Caps	22mm, 25mm, 28mm 30 x 35mm	Aluminium caps		National Metal Packaging Ltd., Plot No. 148, Sector-30, K.I.A, Karachi-74900
654	76141000	i) Aluminium Stranded Conductor / Aluminum Cables	Steel Re-inforced (All Sizes), ASTM B-232, Steel Reinforce (ACSR). Rabbit-Dog-Gopher-Lynx-Osprey, WAPDA P-50-88 Specs. Cables, Aluminum, with steel core, not electrically	As ASTM T/S, Elong, Weight H-12 Strands Aluminium	CU 99% Zinc coating uniformity, Al purity	 Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore H.M. Esmail & Co. (H.M. Cables), SB-5, Madina City Mall, 6th Floor, Abdullah Haroon Road, Karachi Cable & Conductor Ltd., 1st Floor, 41 Civic Centre, Barkat Market New Garden Town, Lahore Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore Multicore Cables, 136 Abid Chembers Tempal Road Lahore
		 ii) Stranded wire, cables, Aluminium not electrically insulated. 	Range of Sizes: 1.5MM ² to 1000MM ² Voltage Grade: upto 220 KV BSS-6360, BSS-215 (Excluding ultra violet treated cables)	ACSR	Aluminium Electrical Grade	 Pakistan Cables Limited, B-21, SITE, P.O. Box No.5050, Karachi - 75700 Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
		iii) Conductors (ACSR)	All Types and Sizes			Universal Cables Industries Ltd., 61-C, Jami Commercial Street # 7, Phase 7, D.H.A., Karachi.
		iv) Aluminum Conductor Composite Core (ACCC)	ASTM B857 Specs., Casablanca, Drake, Plano, Helsinki, Silvassa, Gdansk, Oceanside, Warsaw, Brussels, Lisbon, Vienna	Trapezoidal Aluminum Conductor Stranded over Carbon Fiber Core	Aluminum Electrical Grade	Pakistan Cables Limited, B-21, SITE, P.O. Box No. 5050, Karachi - 75700
655	76149000	i) Aluminium Stranded Conductor / Aluminum Cables / Conductors / Aerial Bundle Cable	All Sizes Steel Re-inforced ASTM B-232, ASTM B-231, ACSR, AAC, Rabbit-Dog-Gopher-Lynx-Osprey, WAPDA P-50-88 Specs., Cables, Aluminum, with steel core, not electrically Range of Sizes: 1.5MM ² to 1000MM ² Voltage Grade: upto 220 KV BSS-6360, BSS-215 (Excluding ultra violet treated cables) Ant-Wasp (AAC) WAPDA P-63-79 Specs. 35mm2 - 120mm2, IEC-60502 NEMA, (XLPE & PVC) (ABC)	As ASTM T/S, Elong, Weight XLPE Aging Test H-12 Strands Aluminium	CU 99% Zinc coating uniformity, Al purity Aluminium Electrical Grade	 Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore Pakistan Cables Limited, B-21, SITE, P.O. Box No.5050, Karachi - 75700 Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore Universal Cables Industries Ltd., 61-C, Jami Commercial Street # 7, Phase 7, D.H.A., Karachi. H.M. Esmail & Co. (H.M. Cables), SB-5, Madina City Mall, 6th Floor, Abdullah Haroon Road, Karachi Cable & Conductor Ltd., 1st Floor, 41 Civic Centre, Barkat Market New Garden Town, Lahore Multicore Cables, 136 Abid Chembers Temnpal Road Lahore
		ii) Aluminum Conductor Composite Core (ACCC)	ASTM B857 Specs., Casablanca, Drake, Plano, Helsinki, Silvassa, Gdansk, Oceanside, Warsaw, Brussels, Lisbon, Vienna	Trapezoidal Aluminum Conductor Stranded over Carbon Fiber Core	Aluminum Electrical Grade	Pakistan Cables Limited, B-21, SITE, P.O. Box No. 5050, Karachi - 75700
		iii) All Aluminium Alloy Conductor (AAAC)	All sizes			Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
656	76169910	i) Cast Steel Castings	As per client's requirement		Steel Scrap=95.7% Ferro Manganese=2% Ferro Silicon=2% Ferro Chrome=0.3%	Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi
		ii) Mn Steel Casting	As per client's requirement		Steel Scrap=82%FerroManganese=14%Ferro Silicon=0.8%Ferro Chrome=2.5%Recarborizer=1.3%	

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		iii) Cast Iron Castings	As per client's requirement		Pig Iron=75%Steel Scrap=21%Ferro Manganese=2%Ferro Silicon=2%	
657	76169990	 i) Aluminium disposable products for air lines & fast food industries (Kitchen Foil, Utensils) 	(Aluminium Trays, Casseroles & Kitchen Foil) aluminum Metal 65u to 100u with Food grade Coating. (Not over 0.2mm thickness)			 Aluminum Processing Industries Int'l (Pvt) Ltd., D-76, S.I.T.E. Karachi Pakistan Metal Industries, D-76, Main Avenue, S.I.T.E. Karachi
		ii) Aluminum Finstock in continuous length for air conditioning industry	Not exceeding 0.2mm thickness from 0.12mm to 0.20mm both side or one side with CPV Coating hydrophllic corrosion resistant (lacquered Blue, Golden & Silver)			Aluminum Processing Industries Int'l (Pvt) Ltd., D-76, S.I.T.E. Karachi
		iii) Transmission Line Hardware (Tension / Suspension String Fittings/Assemblies for Aluminum Conductors)	NTDC-WAPDA P-143:82 NTDC-WAPDA P-140:82			Shaheen Traders, 1-KM Abu Bakar Road, Near Saggian Flyover, Ring Road, Lahore
658	82021000	Hand saws of base metal	Hand saw for wood cutting size 10 " to 36 "	1650 -1850 Nmm ²	Cr 1 . C .75 % Mn .7 % Cr .35 % si .04 %	Abid Industries, CA 318 Goth Shah Beg Gabol Sector 16 B North Karachi
659	82023100	Steel Saws	Gang saw for stone cutting/Marble cutting	Tensile Strength 1350-1400 Nmm ²	Cr 1 , C75 , Mn .7 %Cr .35 % Si .04 %	Abid Industries, CA 318 Goth Shah Beg Gabol Sector 16 B North Karachi
660	82023900	Steel Saws	Circular saw for wood cutting sizes 4 " to 14"	Cr 1, C 75, C 60. High Carbon alloy steel strip, High Carbon steel strip, Carbon steel strip Tensile Strength 1550 - 1750 Knmm2	C 75 % , Si 0.4 , Cr 0.37 Mn 0.70 %	Abid Industries, CA 318 Goth Shah Beg Gabol Sector 16 B North Karachi
661	82032000	Hand Tools	Pliers, hand, base metal 4" to 6"			Qureshi Industries Behind Women Degree College Nizamabad (52020) Wazirabad Punjab, Dist. Gujranwala
662	82041100	Non-adjustable Spanners	8x10mm, 12x14mm, 16x17mm, 20x22mm, 24x26		-	Qureshi Industries Behind Women Degree College Nizamabad (52020) Wazirabad Punjab, Dist. Gujranwala
663	82054000	Hand Tools	Screwdrivers, base metal 2 way 4"	-		Qureshi Industries Behind Women Degree College Nizamabad (52020) Wazirabad Punjab, Dist. Gujranwala
664	82081000	Steel Blades	High Carbon Alloy Steel / High Carbon Steel Strip	CR 1 , C60-80 ,1450- 1700 Nmm ²		Abid Industries, CA 318 Goth Shah Beg Gabol Sector 16 B North Karachi
665	82082000	Steel Blades	High Carbon Alloy Steel / High Carbon Steel Strip, Wood cutting band saw blade size 10 mm -255 mmx0.5mm - 1.5 mm	CR 1 , C60-80 , TS 1450- 1700 Nmm ²	C .75 , si 0.4 cr .35 mn .7 %	Abid Industries, CA 318 Goth Shah Beg Gabol Sector 16 B North Karachi
666	82121000	Razors, non-electric	Double edge razor blades and plastic bonded disposable razor	-		Treet Corporation Limited, 72-B, Kot Lakhpat Industrial Area, Lahore
667	82122000	Razors, non-electric	Double edge razor blades and plastic bonded disposable razor			Treet Corporation Limited, 72-B, Kot Lakhpat Industrial Area, Lahore
668	82141000	Pencil Sharpeners	For Pencils			 Indus Pencil Industries, B-54, Manghopir Road SITE Karachi Toray Plast, Al Jannat Road, Saggian Ravi By Pass, Nain Sukh, Lahore Oro Industries, 86-87, Sector 23, Korangi Industrial, Karachi
669	83013000	Furniture Locks	Chrome plated			Babar Metal Industries, E/34, Estate Avenue, S.I.T.E., Karachi
670	83030000	Metal Lockers	CRC sheet 0.5mm to 1.2mm			Gujrat Steel (Pvt) Ltd., 183 A.M,Shahrah-e-Iraq, Saddar, Karachi
671	83040000	i) Shelvings of base metal	Mobile Shelving (Compressed Filing System), For offices. Shelving for Supermarkets & Stores.			Gujrat Steel (Pvt) Ltd., 183 A.M,Shahrah-e-Iraq, Saddar, Karachi
		ii) Sorting Boxes for office use	Box Type Office and Base Metal for any Equipment	Skid mounted box type office, Living carvan, Kitchen, Laboratoires, Skid mounted medical treatment centre, toilets and rest houses etc.		Metal Engineering Works (Pvt) Ltd., S-4, S.I.T.E., Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
672	83071000	Flexible Tube of Base Metals with or without fittings of Iron or Steel or other base metals	- Spiral/Corrugated/Wire Braided Flexible Hose/Tubes/Pipes, Sanitary & Tap's - Flexible Connection	O/D: 12, 14, & 16 mm Pressure: 5 Bar T.S: 500 N	S. Steel of 200, 300 series Brass & Aluminium	Faco Industries Ltd., 204, Bank & Business Centre, Near Duty Free Shop, Off. Shahra-e- Faisal Karachi.
673	83079000	Other Base Metal	- Spiral/Corrugated/Wire Braided Flexible Hose/Tubes/Pipes, Sanitary & Tap's - Flexible Connection	O/D: 12, 14, & 16 mm Pressure: 5 Bar T.S: 500 N	S. Steel of 200, 300 series Brass & Aluminium	Faco Industries Ltd., 204, Bank & Business Centre, Near Duty Free Shop, Off. Shahra-e- Faisal Karachi.
674	83082000	Rivets	Aluminum Blind Rivets Guages : 3.00, 4.20 & 4.80mm Lengths: 5.00 to 25.00mm	Aluminium tubes with steel mandrel.	Al. 98% Si 0.4%, Cu 0.2%, Mn 0.2%, Mg. 0.5 to 1.1%, Cr. 0.1%	Adamjee Engineering (Pvt.) Ltd., Plot No. 1 & 16, Sector 20, Korangi Industrial Area, Karachi
675	83099090	i) Threaded Bungs and bung-covers	2", 3/4" British Standard			Babar Metal Industries, E/34, Estate Avenue, S.I.T.E., Karachi
		ii) Aluminium PP Caps for Bottles	22mmPP; 25mmPP; 25mmRO; 28mmRO; 30*34mmED; 30*60mmED		Food Grade	Daim Pak (Pvt) Ltd., 18 Km Sheikhpura Road, Lahore
		iii) Aluminium Caps	20mm to 50mm	Aluminium caps		National Metal Packaging Ltd., Plot No. 148, Sector-30, K.I.A, Karachi-74900
676	83111000	i) Metal Electrodes	ASTM, JIS All International Spec			Chaudhri Electrode Industries (Pvt) Ltd., 29 Km Lahore Sheikupura Road, Lahore
		ii) Welding Electrode (Hard Surfacing, Cast Iron, SS, etc)	E-6013, E-7016, E-7018,	As per AWS standards	As per AWS standards	Shanghai Industries (Pvt.) Ltd., Suite # 408, Marine Point, Block -9, Khayaban-e-Romi, Clifton, Karachi.
			Different specifications (for mild steel, chamfering, low/ high- alloyed steel, cast iron machinable, welding Aluminium, welding bronze and overlays). Special Electrodes with high nickel, Brazing Alloys (brass/ nickel silver)	Different	Different	Metallogen (Pvt) Ltd., 175 – S, Industrial Estate, Kot Lakhpat, Town Ship, Lahore 54000.
			AWS/ASME SFA-5.1 E6013 AWS/ASME SFA-5.1 E7018 AWS/ASME SFA-5.15 E NiFe-C1 AWS/ASME SFA-5.1 E 7016 DIN 8555 E 6-UM-60 DIN 8555 E 1-UM-60 R AWS/ASME SFA-5.4 E 312-16			Pakistan Welding Electrodes (Pvt) Ltd., Plot No. E-19, S.I.T.E. Karachi
677	83112000	CO ₂ Gas Shielded Arc Welding/Mig Welding Wire 0.80 mm, 0.90 mm, 1.00 mm, 1.20 mm and 1.60 mm	AWS ER70S6/DIN SG2/GB ER56-6	Copper Coated/Tensile Strength>490 Mpa/Elongation>26%/Shrinkage>72%	C: 0.06~ 0.15 SI: 0.80~ 1.15 Mn: 1.40~ 1.85	Bead Tech (Pvt) Ltd., 22-KM, Lhr-Skp. Rd, Stop Qilla Sattar Shah, Pindi Das Rd., Lahore
678	83113000	CO ₂ Gas Shielded Arc Welding/Mig Welding Wire 0.80 mm, 0.90 mm, 1.00 mm, 1.20 mm and 1.60 mm	AWS ER70S6/DIN SG2/GB ER56-6	Copper Coated/Tensile Strength>490 Mpa/Elongation>26%/Shrinkage>72%	C: 0.06~ 0.15 SI: 0.80~ 1.15 Mn: 1.40~ 1.85	Bead Tech (Pvt) Ltd., 22-KM, Lhr-Skp. Rd, Stop Qilla Sattar Shah, Pindi Das Rd., Lahore
679	83119000	CO ₂ Gas Shielded Arc Welding/Mig Welding Wire 0.80 mm, 0.90 mm, 1.00 mm, 1.20 mm and 1.60 mm	AWS ER70S6/DIN SG2/GB ER56-6	Copper Coated/Tensile Strength>490 Mpa/Elongation>26%/Shrinkage>72%	C: 0.06~ 0.15 SI: 0.80~ 1.15 Mn: 1.40~ 1.85	Bead Tech (Pvt) Ltd., 22-KM, Lhr-Skp. Rd, Stop Qilla Sattar Shah, Pindi Das Rd., Lahore
680	84021110	i) Boiler Feed Water Heaters	For upto 350 MW Boilers, ASME Sec. 1 / B.S.S. & as per customers requirements			 SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore

S. No. P	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		iii) Oil/gas/bagasse fired water tube boiler iv) Coal /Biomas Fired Steam Boilers	 i) Direct Fired Water Tube Boiler Capacity up to 350 TPH & 150 Kg/cm2) ii) UPTO 290 TPH, 136 Barg, 535°C iii) Oil/gas/bagasse fired water tube boiler upto 200 ton/hr capacity and 87 bar pressure Travelling grate bed, Bubling fluidized bed, Circulating fluidized bed 	ASME Sec. 1	High pressure/Low pressure steam production	 Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 Gresham's Eastern (Pvt) Limited, F-302, S.I.T.E, Karachi SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan Heavy Mechanical Complex (Pvt) Ltd., Taxila A.J. Corporation, 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore. Industrial & Mechanical Engineers (Pvt) Ltd., 403, Noor Estate Building Shahrah-e-Faisal Karachi, Izhar Steel, Izhar House, 35-Tipu Block, New Garden Town, Lahore Karachi Shipyard & Engineering Works Ltd., Wast Wharf Dockward P.O. Rox 4410 K Arachi
		v) Thermal power plants	Thermal power plants upto 360MW			Heavy Mechanical Complex (Pvt) Ltd., Taxila
681 8	84021120	-	Waste Heat Recovery Boiler (WHRB) capacity up to 350 TPH & 150 Kg/cm ²			 Descon Engineering Limited, DESCON Manufacturing Business Area , 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 Haseeb Waqas Engineering Ltd., 103, B/1, M.M. Alam Road, Gulberg.III Lahore Brothers Engineering Ltd., 135-Upper Mall, Lahore. Heavy Mechanical Complex (Pvt) Ltd., Taxila
			Waste Heat Recovery Boilers, 1.5 to 50T/PH Capacity & pressure upto 6 bar to 50kg/cm2 inclusive of Parts & equipments			DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore
		Waste Heat Recovery Boiler	As per client's requirment			 A.J. Corporation, 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore. Industrial & Mechanical Engineers (Pvt) Ltd., 403, Noor Estate Building Shahrah-e-Faisal Karachi, Izhar Steel, Izhar House, 35-Tipu Block, New Garden Town, Lahore
682 8	84021130		Heat Recovery Steam Generators (HRSG) 200 MW, water tube type. Single or multiple unit, behind all types of Gas Turbines, Diesel and Gas Engines & as per customers requirements	••		 Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore A.J. Corporation, 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore. Industrial & Mechanical Engineers (Pvt) Ltd., 403, Noor Estate Building Shahrah-e-Faisal Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		ii) Condensers, Mixing Steam	Capacity up to 350 TPH & 150 BARG for (water tube, fire tube, waste heat recovery boiler, heat recovery steam generator)	-		TDFC (Pvt) Ltd., East Pharange Drainage, Millat Town, Millat Road, Faisalabad
683	84021190	i) Thermal power plants	Thermal power plants upto 360MW			Heavy Mechanical Complex (Pvt) Ltd., Taxila
		ii) Coal /Biomas Fired Steam Boilers	Travelling grate bed, Bubling fluidized bed, Circulating fluidized bed	High pressure/Low pressure steam production		 Descon Engineering Ltd., 2-Km Defence Road, Off 24th Km, Multan Road, Chung, Lahore Gresham Eastern (Pvt) Ltd., F-302, S.I.TE., Karachi Heavy Mechanical Complex, Taxila SEFEC Engineering (Pvt) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi The Sitara Engineers, Nishatabad, Sheikhupura Road,
684	84021200	i) Boilers, steam generating, watertube type	 i) Package Type Fire Tube (upto 30T/PH & pressure upto 24 to 50 kg/cm2 inclusive of Parts & equipments) ii) Upto 65 ton/hr, 40 kg/cm2, ASME Sec. 1 iii) Water tube boilers (4 HP TO 155 HP, 120,000 BTUS/HR to 5,200,000 BTUS/HR) iv) Steam Generators (100 to 1200 Kg/Hr steam output. v) Forced Draft, Water Tube Heater With Natural Gas (150,000 to 6,500,000 Btub input) vi) 1 TPH ~ 100 TPH 1 BAR ~ 15 BAR, etc vii) Direct Fired Water Tube (up to 350 TPH & 500 Kg/cm2) viii) UPTO 290 TPH, upto 136 Barg, 535°C ix) Coal /Biomas Fired Steam Boilers (Travelling grate bed, Bubling fluidized bed, Circulating fluidized bed) 	As per clients requirement		 DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi Industrial & Mechanical Engineers (Pvt) Ltd., 403, Noor Estate Building Shahrah-e-Faisal Karachi Gresham's Eastern (Pvt) Limited, F-302, S.I.T.E, Karachi Gresham's Eastern (Pvt) Limited, First Floor, Qazi House, ST-5, Block 16, Gulshan-e-Iqbal, Karachi- 75300. Haseeb Waqas Engineering Ltd., 103, B/1, M.M. Alam Road, Gulberg.III Lahore Borthers Engineering Ltd., 135-Upper Mall, Lahore. A.J. Corporation, 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Labore
		 ii) Duct Heaters Gas or Oil Fired iii) Electric Hot Water & Steam Boiler iv) Hot Water Storage Heater 	As per client's requirment	As per clients requirement		Labora Industrial & Mechanical Engineers (Pvt) Ltd., 403, Noor Estate Building Shahrah-e-Faisal Karachi
		v) Oil/gas/ fired, water tube, membrane walled boilers	(upto 45 tons/hr, 64 Kg/cm ² pressure) Bagasse fired (upto 45 tons/hr & pressure 42 Kg/cm ²	As per clients requirement		Heavy Mechanical Complex (Pvt) Ltd., Taxila
		vi) Thermal power plants	Thermal power plants upto 360MW	As per clients requirement		

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
685	84021910	Fired Tube Boilers	 i) Upto 45 tons/ hr/ More than 45 tons/ hr ii) Upto 25 ton/hr steam and 24 kg/cm2 pressure. iii) Up-to 30 TPH, 2PASS, 3 PASS and 4 PASS & as per customers requirements 	As per clients requirement		 IKAN Engineering Services (Pvt) Ltd., 34- Km, Shamki Bhattian, Multan Road, Lahore DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan A.J. Corporation, 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore. Industrial & Mechanical Engineers (Pvt) Ltd., 403, Noor Estate Building Shahrah-e-Faisal Karachi - Izhar Steel, Izhar House, 35-Tipu Block New Garden Town, Lahore Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi Heavy Mechanical Complex -3, Hattar Road, Taxila Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence
		Coal /Biomas Fired Steam Boilers	Travelling grate bed, Bubling fluidized bed, Circulating fluidized bed	High pressure/Low pressure steam production		 Descon Engineering Ltd., 2-Km Defence Descon Engineering Ltd., 2-Km Defence Road, Off 24th Km, Multan Road, Chung, Lahore 2) Gresham Eastern (Pvt) Ltd., F-302, S.I.TE., Karachi SEFEC Engineering (Pvt) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi
686	84021920	Waste Heat Recovery Boilers / Waste Heat Boilers (WHB's)	up to 350 TPH & 500 Kg/cm2 with steam turbine Behind Cement Kilns, Incinerators, Furnaces, Gen Sets & Other Process Applications Upto 136 Barg & as per customers requirements Any type of boiler / waste heat recovery, heat recovery steam generator excluding water tube	As per clients requirement		 IKAN Engineering Services (Pvt) Ltd., 34- Km, Shamki Bhattian, Multan Road, Lahore DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore A.J. Corporation, 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore. Industrial & Mechanical Engineers (Pvt) Ltd., 403, Noor Estate Building Shahrah-e-Faisal Karachi Izhar Steel, Izhar House, 35-Tipu Block, New Garden Town, Lahore Raiwind Road, Lahore TDFC (Pvt) Ltd., East Pharange Drainage, Millat Town, Millat Road, Faisalabad Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000
687	84021930	Heat Recovery Steam Generators/ Other boilers	Behind gas turbines, gen sets upto 275 mw/ Any type of boiler / waste heat recovery, heat recovery steam generator excluding water tube			 Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
688	84021990	i) Complete Hybrid Boiler.	Saturated Steam, Furnace with Combustion Grate Deduster with accessories and auxiliary machinery for boiler comprising of boiler drum, economizer, draft fan and accessories 1-15 TPH, 12 Bar, 500 Kg/hr to 1000 KG/hr 2 Bar to 10 Bar & as per customers requirement			 Descon Engineering Ltd., 2-Km Defence Road, Off 24th Km, Multan Road, Chung, Lahore Gresham Eastern (Pvt) Ltd., F-302, S.I.TE., Karachi Heavy Mechanical Complex, Taxila SEFEC Engineering (Pvt) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi The Sitara Engineers, Nishatabad, Sheikhupura Road, DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore
		ii) Boilers, vapour generating, excluding watertube type	 i) Upto 20 ton/hr, 40 kg/cm², SME Sec. 1 / B.S.S. & as per customers requirements ii) 4 Pass , Fire Tube, 250 TO 1000 H.P. 	Forced Draft, consisting, Shell, Fire Tubes, Tube Plates, ASME code	**	 SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore Industrial & Mechanical Engineers (Pvt) Ltd., 403, Noor Estate Building Shahrah-e-Faisal Karachi
		iii) Coal /Biomas Fired Steam Boilers	Travelling grate bed, Bubling fluidized bed, Circulating fluidized bed	High pressure/Low pressure steam production		 Descon Engineering Ltd., 2-Km Defence Road, Off 24th Km, Multan Road, Chung, Lahore Gresham Eastern (Pvt) Ltd., F-302, S.I.TE., Karachi Heavy Mechanical Complex, Taxila SEFEC Engineering (Pvt) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi The Sitara Engineers, Nishatabad, Sheikhupura Road,
689	84022000	i) Boiler Superheaters	 i) Capacity Up to 350 TPH, 150 BARG (water tube, fire tube, waste heat recovery boiler, heat recovery steam generator), used for upto 350 MW Boilers, ASME Sec. 1 / B.S.S. & as per customers requirements ii) Upto 65 ton/hr, 40 kg/cm2, ASME Sec 	-	**	 SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		ii) Boilers, high pressure	i) Upto 65 ton/hr, 40 kg/cm ² , ASME Sec. 1 ii) Upto 290 TPH, 136 barg, 535 C or As per customer's requirement iii) 1 TPH-100 TPH, 250-550 °C, 1Bar ~100 Bar			 SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 A.J. Corporation, 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore. Industrial & Mechanical Engineers (Pvt) Ltd., 403, Noor Estate Building Shahrah-e-Faisal Karachi Gresham's Eastern (Pvt) Limited, F-302, S.I.T.E, Karachi
690	84029090	Boiler Equipment/Parts	Parts/Accessories/Ancillaries of all types of Boilers like Drum, Deaerator, Economizer, Condenser, Evaporator, Tube Panel, Chimneys, Steel Structure, Cuts/ Chutes up to 350 TPH for upto 350 MW Boilers, Capacity , 150 BARG (water tube, fire tube, waste heat recovery boiler, heat recovery steam generator) Drums for steam boilers (ASME, Corten Steel, Size as per capacity of boiler 3Ft Dia, 15 Ft Thickness - 5mm - 25mm 8" - 16" as per customers requirements)	ASME Sec. 1		 Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan A.J. Corporation, 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore. Industrial & Mechanical Engineers (Pvt) Ltd., 403, Noor Estate Building Shahrah-e-Faisal Karachi, Izhar Steel, Izhar House, 35-Tipu Block, New Garden Town, Lahore SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi Gresham's Eastern (Pvt) Limited, F-302, S.I.T.E, Karachi
691	84031000	Boilers, central heating	Fire Tube, Dry Back,Boilers For Steam and Hot Water, All As Per AMSE Codes. 250 To 1000 H.P., 3.8 Tons to 15.4 Tons	As per ASME Code		 Industrial & Mechanical Engineers, 403, Noor Estate Building Shahrah-e-Faisal Karachi Haseeb Waqas Engineering Ltd., 103, B/1, M.M. Alam Road, Gulberg.III Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
692	84041000	Auxiliary plants for use with boilers of heading 84.02 or 84.03	Following equipments for water tube, fire tube, waste heat recovery boiler, heat recovery steam generator of capacity Up to 350 TPH, 150 BARG) (Economizer, Dearator, Air pre heater, Steam Coil Air Pre Heater, Evaporator, Silencer, Super Heater, Collector /Accumlator for Steam, Boiler Feed Water unit, Steam storage, Collectors for steam boilers, De-super-heaters for steam or vapour-Generating,			 SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 A.J. Corporation 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore. Industrial & Mechanical Engineers, 403, Noor Estate Building Shahrah-e-Faisal Karachi
693	84042000	Condensers for steam or other vapour power / Boilers	tube, waste heat recovery boiler, heat recovery steam generator)	10050 mm length. 2) Shell & Tube Type Pre Condensers upto 1700 mm dia & 6000 mm length. 3) Vertical Condensers upto 2012 mm dia & 6800 mm length. Horizontal Condensers upto 2012 mm	In accordance to ASME Sec 1, TEMA HEI	 SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan A.B.S Engineering Corporation (Pvt) Ltd., F- 492, S.I.T.E, Karachi- 75700
		Condensers, steam	 i) Steam heating Coils (1HP, 1.5 HP, 2HP, 2.5HP, 3HP, 5HP, 7.5HP, 10HP, 20HP, 30HP, 40HP, 50HP, 60HP and 80HP & as per customers requirements) ii) Chilled Water Coils (Aluminium Fins-Coated & Un-coated) 6HP, 10HP, 12.5HP, 18HP, 25HP, 30HP, 38HP, 50HP, 60HP, 75HP and 100HP iii) Chilled Water Coils (Copper Fins) 10HP, 20HP, 30HP, 40HP, 50HP, 60HP and 80HP iv) Shell & Tube (Condensers/ Evaporators & Chillers) 3HP, 5HP, 7.5HP, 10HP, 15HP, 50HP and 75HP. 			 Breeze Frost Industries (Pvt) Ltd., Harbanspura Road, P.O. Tajpura, Lahore DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore
694	84068200	Combined Cycle Power Plants	As per customer requirements			 DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore Ravi Green Engineering (Pvt) Ltd., 20th KM (Pajian), Raiwind Road, Lahore
695	84089000	Single Cylinder Diesel Engines	3HP to 36 HP			 Best Engineers, 31-KM Ferozepur Road, Lahore Perfect Engineering Company, Moza Bahi Kot, Raiwind, Industrial Estate, Raiwind, Lahore Kam Engineering (Pvt) Ltd., Behind Glaxo Lab. Off 19 Km Ferozepur Road, Lahore Naveed Brothers, 23-KM Multan Road, Mohlanwal Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
696	84109010	Parts of Hydraulic turbines, water wheels, and regulators	Radial Gates. Draft tube gates, fixed wheel gates, bulk head gates, penstock, draft tube, tail race liners, spirla/ involute turbine casing, head covers, botton rings, trash rack, sill beams, stop logs, wicket gates etc. (For any type and range)			Heavy Mechanical Complex (Pvt) Ltd., Taxila
697	84109090	Regulators for hydraulic turbines and water wheels / Penstocks	Penstocks of upto 10.6M dia x 40mm thickness, AISI, BS-7191, BS-5950 / As per client's requirment			 Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan A.J. Corporation 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore. Izhar Steel, Izhar House, 35-Tipu Block, New Garden Town, Lahore SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi
698	84131100	i) CNG Dispenser				 Tesla Industries Pvt. Ltd., Plot No. 81-F, St. 6, I-10/3, Islamabad Comcept Private Limited, Plot No. 291, Street No. 03, Sector I-9/3, Islamabad Advance Electronics International, L/21-D, Block-21, F.B. Industrial Area, Rashid Minhas Road, Karachi – 75700
		ii) Fuel Transfer Pump [Others]	Used for diesel/water transfer, Capacity: 1500 Ltr/min	Material: Carbon Steel		Al-Jassar Engineering Co., 3 KM from Brahama Interchange M1, Jhang Bahtar Road, Near By Multi Orchids Residencia, Islamabad.
699	84131910	Acid Shifting Pump	Used for acid shifting, filling Capacity: 160 Ltr/min	Material: Alluminium with rubber hose	-	Al-Jassar Engineering Co., 3 KM from Brahama Interchange M1, Jhang Bahtar Road, Near By Multi Orchids Residencia, Islamabad.
700	84133090	Gear Oil Pump	Sizes a) Outter Dia upto 80mm b) Height upto 35mm As per customers requirements.	Hardness of upto 90 HRB. Also includes Grindings & other secondary operations	Iron / Steel.	Adamjee Engineering (Pvt.) Ltd., Plot No. 1 & 16, Sector 20, Korangi Industrial Area, Karachi
701	84137011	Centrifugal pumps (Submersible)	 i) Submersible motor sewage disposal pumps with non clogging impeller ii) Submersible motor water lubricated vertical bore hole single or multistage pumps 	 DN: 100-175,Q upto 480 m³/hr, H upto 250 m. DN: 75-350, Q upto 840 m3/hr, H upto 480m. 	 i) Cast Iron (GG-25), SS, Duplex and Super Duplex ii) Cast Iron (GG-25), Bronze (G- CuSn10), SS, Duplex, Super Duplex 	KSB Pumps Company Limited, 16/2, Sir Agha Khan Road, Lahore
702	84137019	Submersible Pumps	 i) Flow range from 2.4 m3/h (40 LPM) up to 156m3/h (2600 LPM), Head range from 3 meter (10 Feet) up to 567 meters (1860 Feet) ii) Flow range from 12 m3/h (200 LPM) up to 324m3/h (5400 LPM)Head range from 7 meter (23 Feet) up to 560 meters (1837 Feet) 		i) Stainless Steel AISI 304 ii) Cast Iron GG25	Komax Pvt Ltd., Plot No. 722, Sunder Industrial Estate, Raiwind Road, Lahore
			iii) Upto 100 Watt			Khawaja Adhesive Tapes (Pvt) Ltd., 4-H, Gulberg-III, Lahore
703	84137090	i) Centrifugal pumps	 i) Stainless Steel Submersible Bore Hole Pump ii) Horizontal centrifugal pumps with non-clogging impeller (Excluding API 610 and NACE MR 0175 compliance) 	 DN: 40-700, Q: upto 10000 m ³ /hr, H upto 100m.	 Cast Iron (GG-25),Bronze (G- CuSn10),Ni Resist D-2,SS (1.4408),Duplex and Super Duplex	 HMA Pumps, 604, Israr Plaza, Ground Floor, Near Lane No. 5, Main Peshawar Road, Rawalpindi Cantt., KSB Pumps Co. Ltd., 16/2, Sir Agha Khan

No. PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		iii) Single stage, Axially split volute casing pump with double flow impeller (Excluding Jet pumps and downhole positive displacement pumps for artificial lift from oil wells alongwith spares)	DN: 200-350,Q:2900 cu m/hr, H upto 100 m.	Cast Iron (GG-25),Stainless Steel	Road, Lahore
		iv) High pressure multistage pump in ring section design	DN:40-150,Q: 760 m ³ /hr,H:630m (max pressure 63 bars)	Cast Iron (GG-25),Cast Steel (GS-C25N)	
		 v) Vertical single stage sewage and effluent disposal pumps in wet and dry pits design with non clogging impeller. 	DN:65-700,Q upto 10000 m ³ /hr, H upto 85 m.	Cast Iron (GG-25), Bronze(G-CuSn10), Wear Resist Nickel Cast Iron (ERN),Austenitic NiCrMo,Stainless Steel(1.4408),Creep Resist Ferritic,Cast Steel,Duplex and Super Duplex.	
		 vi) Vertical line shaft bore hole single or multistage pump (Excluding jet pumps and down hole positive displacement pumps artificial lift from oil wells along with spares) 	DN: 80-500,Q upt 2600 m ³ /hr, H upto 250 m.	Cast Iron (GG-25),Bronze (G- CuSn10),Ni-Resist D2 (ERN), Duplex and Super Duplex	
		vii) Tubular Casing pumps	DN: 300-800, Q upto 9500 m ³ /hr, H upto 50 m.	Cast Iron (GG-25),Ni-Resist D2,Stainless steel, Duplex and Super Duplex.	
		viii) Multistage Vertical / Horizontal High Pressure Centrifugal Pump (CR) [Excluding High Pressure / Alloy Steel / API / NACE Standard Compliant]	DN 25-125. Q: up to 120 m3/h,H: 320 m	Cast Iron (CG-25), Stainless Steel DIN W Nr. (1.4301),AISI (304),Temp: 120 C°	
		ix) Booster Pumping Station [Excluding High Pressure / Alloy Steel / API / NACE Standard Compliant]	DN 25-125. Q: up to 420 m3/h,H: 200 m	Cast Iron (CG-25), Stainless Steel DIN W Nr. (1.4301),AISI (304),Temp: 120 C°	
		x) Deep Well Turbine Pumps (BP) [Excluding High Pressure / Alloy Steel / API / NACE Standard Compliant]	DN 75-150. Q: up to 5-280 m3/h,H: 200 m	Cast Iron (CG-25), Stainless Steel DIN W Nr. (1.4301),AISI (304/316),Temp: 120 C°	
		xi) Bore Hole Submersible Pump (SP) [Excluding High Pressure / Alloy Steel / API / NACE Standard Compliant]	DN 25-125. Q: up to 280 m3/h,H: 600 m	Stainless Steel DIN W Nr. (1.4301),AISI (304),Temp: 120 C°	
		xii) End Suction Single Stage Centrifugal Pump (NB/NP) [Excluding High Pressure / Alloy Steel / API / NACE Standard Compliant]	DN 32-200. Q: up to 450 m3/h,H: 120 m	Pump Housing Cast Iron (EN-GJL- 250),Impeller Cast Iron / Bronze (EN- GJL-250/ CuSn10),Temp: 120 C°	
		xiii) RPK Type in accordance with API 610 (6th Edition). (Excluding Jet Pumps and downhole positive dsiplacement pumps for artifical lift from Oil Wells Alongwith spares)	DN: 80-100 Q: up to 270 cumetre/hr H: up to 58 m RPM: up to 2900	Available in Cast Steel (GS-C25N) and Stainless -Steel (1.4408) in accordance with API 610 Material Combinations	
	ii) Self-Priming, Centrifugal, High- Pressure Pumps	Size: DN 50x50 to DN 600x500mm Flow: 10 gpm (2 cu.m/hr) to 30,000 gpm (6815 cu.m/hr) Pressure/Head: 10 ft (3m) to 140 ft (43m)	Casing: Ductile Iron ASTMA48/ Aluminum / Copper Alloy. Impeller:Close-Type, 5 To 6-Vanes. Cast Steel ASTMA48 / Bronze/ Copper Alloy / S.S. Impeller Shaft: Stress Proof Steel SAE1144 Wearing & Back Plates: ASTMA48 / Aluminum / Copper Alloy Flanges: ASTMA48 / Aluminum / Copper Alloy Gasket & O-Rings: Buna-N / Compressed Synthetic Rubber Mechanical Seal: Self-lubricated, self- aligning, double floating seal sustains max. liquid temperature up to 160F or 71°C.		Meraj Limited, Plot No. 11, Sector 15, Korangi Industrial Area, P.O. Box 3135, Karachi – 74900

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		iii) Self-Priming, Centrifugal (Non- Clog) Trash Pumps/ Irrigation pumps	Size: DN 38x38mm to DN 450x450mm Flow: 50 gpm (11.4 cu.m/hr) to 8660 gpm (1970 cu.m/hr) Pressure/Head: 20 ft (6m) to 475 ft (145m)	Casing: Ductile Iron ASTMA48 / Impeller: Close-Type, 2 To 5-Vanes. Cast Steel ASTMA48 Impeller Shaft: Stress Proof Steel SAE1144 Wearing & Back Plates: ASTMA48 Flanges: ASTMA48 Gasket & O-Rings: Buna-N / Compressed Synthetic Rubber Mechanical Seal: Self-lubricated, self- aligning, double floating seal sustains max. liquid temperature up to 160F or 71°C.		
		iv) Combined Normal and High Pressure Fire Pump	Flow: 100 gpm (22.8 cu.m/hr) to 2000 gpm (455 cu.m/hr)			
		 v) Gland Pump Centrifugal Single stage end suction top discharge horizontal Shaft Tool mounted Pump. 	Head : 15-210 feet Discharge : 3180-50 US gmp	Casing : S. S. (Commercial), Cast Iron Shaft : S.S., Carbon Steel Impeller : S.S., Bronze, Cast Iron Stuffing Box : Gland Packing, Mechanical Seal.		Golden Pumps (Pvt) Ltd., G.T. Road Gujranwala
704	84138100	Pumps	i) RPH Pumps Horizontal configuration in accordance with API 610 (11th Edition) suitable for all API Pump applications in chemical, Oil & Gas sector, energy and petrochemical industry	DN:25-400,Q upto 4150 m ³ /hr, H upto 270 m,T:-70C to 450C.	Available in all types of material cmbination in accordance with API 610/ISO 13709	KSB Pumps Company Limited, 16/2, Sir Agha Khan Road, Lahore
			ii) Horizontal volute casing and suction pump with radial vane impeller (Excluding API 610 and NACE MR 0175 Compliance)	DN:32-300,Q upto 1900 m ³ /hr, H upto 102 m.		
			iii) RPK Type in accordance with API 610 (6th Edition). (Excluding Jet Pumps and downhole positive dsiplacement pumps for artifical lift from Oil Wells Alongwith spares)	DN: 80-100 Q: up to 270 cumetre/hr H: up to 58 m RPM: up to 2900	Available in Cast Steel (GS-C25N) and Stainless -Steel (1.4408) in accordance with API 610 Material Combinations	
705	84144000	i) Air Compressor mounted on Wheeled Chasis / Air Compressor Mounted	0-15 bar screw type, 3.5-250 kw 4.5-12 kw	Screw type		Alpine Industrialcon (Pvt) Ltd., 305/2, G.T. Road, Baghbanpura, Lahore
		ii) Cyclone (Dust Collector)	Output: 5 - 15 TPB	To reduce moisture of grain and make it feasible for processing		Al Karam Rice Engineering (Pvt) Ltd., 7Km Sheikhupura - Muridke Road, Near Khanna Labana, Muridke
706	84145110	Ceiling Fans	i) 80-88 Volts, not over 125 W	Grade - A		 Metro Hi-Tech (Pvt.) Ltd., G.T. Road, Gujrat Yunas Metal Works (Pvt) Ltd. (Yunas Fan), Yunas Colony, G. T Road Gujrat
			 ii) Size:56", Volts: 220/230, RPM: 315, Cycle: 50, Type: Capacitor, Watts: 70, Air Dislacement cu.ft. /min: 12000, Service Value: 170 Size: 48", Volts: 220/230, RPM: 330, Cycle: 50, Type: Capacitor, Watts: 62, Air Dislacement cu.ft. /min: 8500, Service Value: 140 Size: 36", Volts: 220/230, RPM: 400, Cycle: 50, Type: Capacitor, Watts: 55, Air Dislacement cu.ft. /min: 6500, Service Value: 130 			 Wahid Industries Ltd., G. T. Road, Gujrat Yunas Metal Works (Pvt) Ltd. (Yunas Fan), Yunas Colony, G. T Road Gujrat

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
707	84145120	Pedestal Fan	Size: 20", Volts: 220/230, RPM: 1300, Cycle: 50, Type: Capacitor, Watts: 75, Air Dislacement cu.ft. /min: 3500, Service Value: 46 Size: 22", Volts: 220/230, RPM: 1250, Cycle: 50, Type: Capacitor, Watts: 80, Air Dislacement cu.ft. /min: 5000, Service Value: 50 Size: 24", Volts: 220/230, RPM: 1250, Cycle: 50, Type: Capacitor, Watts: 110, Air Dislacement cu.ft. /min: 6000, Service Value: 48 Size: 26", Volts: 220/230, RPM: 950, Cycle: 50, Type: Capacitor, Watts: 110, Air Dislacement cu.ft. /min: 6000, Service Value: 46			 Wahid Industries Ltd., G. T. Road, Gujrat Super Asia Group of Companies, Near Lahori Octori, G. T Road, Gujranwala Yunas Metal Works, (Pvt) Ltd. (Yunas Fan), Yunas Colony, G. T Road Gujrat CECO Electrical Industries, G.T Road Gujrat
708	84145130	Table Fans,	 1400mm Size = 56" Volts = 220v RPM=325 Cycles = 50 Type= Capacitor Watts = 80 Air Displacement Cft/Min = 8825 Service			 Super Asia Group of Companies, Near Lahori Octori, G. T Road, Gujranwala Yunas Metal Works (Pvt) Ltd. (Yunas Fan), Yunas Colony, G. T Road Gujrat CECO Electrical Industries, G.T Road Gujrat General Fan Company (Pvt) Ltd., G.T. Road, Gujrat
			Value = 110.31 Size: 16", Volts: 220/230, RPM: 1350, Cycle: 50, Type: Capacitor, Watts: 55, Air Dislacement cu.ft. /min: 2500, Service			 Yunas Metal Works, (Pvt) Ltd. (Yunas Fan) Yunas Colony, G. T Road Gujrat Wahid Industries Ltd., G. T. Road, Gujrat Yunas Metal Works (Pvt) Ltd. (Yunas Fan),
	0.000		Value: 45 Size: 18", Volts: 220/230, RPM: 1350, Cycle: 50, Type: Capacitor, Watts: 65, Air Dislacement cu.ft. /min: 3000, Service Value: 46			Yunas Colony, G. T Road Gujrat
709	84145140	Exhaust Fans	 Size: 8", Volts: 220/230, RPM: 1400, Cycle: 50, Type: Capacitor, Watts: 30, Air Dislacement cu.ft. /min: 800, Service Value: 27 Size: 10", Volts: 220/230, RPM: 1400, Cycle: 50, Type: Capacitor, Watts: 35, Air Dislacement cu.ft. /min: 1000, Service Value: 29 Size: 12", Volts: 220/230, RPM: 14000, Cycle: 50, Type: Capacitor, Watts: 50, Air Dislacement cu.ft. /min: 1500, Service Value: 30 Size: 16", Volts: 220/230, RPM: 950, Cycle: 50, Type: Capacitor, Watts: 85, Air Dislacement cu.ft. /min: 2500, Service Value: 38 Size: 18", Volts: 220/230, RPM: 950, Cycle: 50, Type: Capacitor, Watts: 85, Air Dislacement cu.ft. /min: 3000, Service Value: 40 Size: 24", Volts: 220/230, RPM: 900, Cycle: 50, Type: Capacitor, Watts: 140, Air Dislacement cu.ft. /min: 6000, 			 Wahid Industries Ltd., G. T. Road, Gujrat Yunas Metal Works (Pvt) Ltd. (Yunas Fan), Yunas Colony, G. T Road Gujrat
		Exhaust / vent Fans (Various Types);	Service Value: 43 300 to 129,000 cfm			Sabro Technologies (Pvt) Ltd., Plot No. 270, Industrial Triangle, Kahuta Road Islamabad
710	84145190	i) Box Fans/Misting Fan	1400mm Size = 56" RPM = 325 Cycles = 50 Type = Capacitor Watts = 80 Air Displacement CFT/Min = 8825 Service Value = 110.31			General Fan Company (Pvt) Ltd., G.T. Road, Gujrat

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		ii) Other (Fans)	Bracket Fan: Size: 16", Volts: 220/230, RPM: 1350, Cycle: 50, Type: Capacitor, Watts: 50, Air Dislacement cu.ft. /min: 2500, Service Value: 45 Size: 18", Volts: 220/230, RPM: 1300, Cycle: 50, Type: Capacitor, Watts: 65, Air Dislacement cu.ft. /min: 3000, Service Value: 46 Plastic Louver Fan: Size: 14", Volts: 220/230, RPM: 1350, Cycle: 50, Type: Capacitor, Watts: 55, Air Dislacement cu.ft. /min: 2000, Service Value: 36			Wahid Industries Ltd., G. T. Road, Gujrat
711	84145910	Centrifugal Fans (VFB & VBI)	350-20000 CFM			 Sabro Technologies (Pvt) Ltd., Plot No. 270, Industrial Triangle, Kahuta Road Islamabad Petal Engineering (Pvt) Ltd, 10 Umar Khan Road, Manawan near Batapur Lahore
712	84145990	i) Industrial fans	- Rotor diameter upto 1.6 meter			Heavy Mechanical Complex (Pvt) Ltd., Taxila
			 Axial and Centrifugal Types of Centrifugal Fans: Backward, Forward, Radial Air Flow Rate Range: 1000 to 500,000 CFM Static Pressure Range: 0.1 to 150 inch of WG 	Material: Aluminum, Stainless Steel, FRP		Jalal Engineering, B-425, Block 13, F.B. Area, Karachi – 75900
		ii) Split Package, Ceiling suspended/ Wall mounted/Floor standing units	up to 48000 btu/hr			 Sabro Technologies (Pvt) Ltd., Plot No. 270, Industrial Triangle, Kahuta Road Islamabad Petal Engineering (Pvt) Ltd, 10 Umar Khan Road, Manawan near Batapur Lahore
		iii) Length Grader (Rice Indented Cylinder)	Rotation Speed: 2900 RPM, Air Pressure: 600 - 2000 (Pa), Power: 3.5 - 30 Kw	To use as Dust Blower, Destoner Fan, Paddy/Rice cleaning		Al Karam Rice Engineering (Pvt) Ltd., 7Km Sheikhupura - Muridke Road, Near Khanna Labana, Muridke
		iv) Damper Valve	500mm to 5000mm dia, square & Round			TDFC (Pvt) Ltd., East Pharange Drainage, Millat
		v) Air Slidesvi) Industrial Fans	300 Ton / hours Fan with Rotor Dia Upto 3 mtr with Flow Volume Upto 735000			Town, Millat Road, Faisalabad
		vi) Industriai Fans	BM3/h			
713	84146000	Kitchen Hood	60 to 90 cm Tempered Glass, VDF or LED Display, Filter, Chimney etc.			Super Asia Muhammad Din Sons Ltd., G.T. Road Gujranwala
714	84148010	Piston Type Compressor	300-500 bar pressure	Piston type		Alpine Industrialcon (Pvt) Ltd., 305/2, G.T. Road, Baghbanpura, Lahore
715	84148020	Low Pressure Compressor	0-15 bar screw type, 3.5-250 kw	Screw type		Alpine Industrialcon (Pvt) Ltd., 305/2, G.T. Road, Baghbanpura, Lahore
716	84148040	Air Curtains	680 to 1355 cfm			 Sabro Technologies (Pvt) Ltd., Plot No. 270, Industrial Triangle, Kahuta Road Islamabad Coolpoint (Pvt) Ltd, Adda Plot, Sharaiz Avenue jatti Umra Road, 'Raiwind Road, Lahore
717	84148090	Compression Skid	Reciprocating Types	-	-	 Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
718	84151019	Air Conditioners:	Window or wall type (9000 BTU, 12000 BTU, 18000 BTU, 24000 BTU along with commercial HVAC equipment upto 60000 BTU)	Window or wall type		 Cool Industries (Pvt) Limited, 9th KM Multan Road, Hanjarwal Lahore Coolpoint (Pvt) Ltd, Adda Plot, Sharaiz Avenue jatti Umra Road, 'Raiwind Road, Lahore Sabro Group (S.a Brother), Street No. 77,78, Sector 1-9/2, Islamabad Pakistan Elektron Ltd (PEL), 14-km, Ferozepur Road Lahore Dawlance (Pvt) Ltd., Dawlance Center 7/4, Civil Lines 9 Dr. Ziauddin Ahmed Road Karachi.
719	84151029	Air-conditioners, self-contained,	 12000BTU to 240,000 BTU/hr Packaged Type 02-60 HP Split Type ES Series 0.75 Ton to 2.5 Ton EQ Series LCD Display 1.0 Ton to 1.25 Ton Window type A/C 1.5 Ton to 2.5 Ton Air cooled self contained 4-30 Tons Air Cooled split packeged 4-30 Tons A/Cs with ducted and vertical Cabinet Ttype evaporators EM Series floor standing plastic body 1.5 - 4.25 Tons Cassette type EY series 1.5 - 6.0 Tons Water / air cooled packaged type A/Cs 4-42 Tons 	Split Type		 Cool Industries (Pvt) Limited, 9th KM Multan Road, Hanjarwal Lahore Coolpoint (Pvt) Ltd, Adda Plot, Sharaiz Avenue jatti Umra Road, 'Raiwind Road, Lahore Sabro Group (S.a Brother), Street No. 77,78, Sector 1-9/2, Islamabad Pakistan Elektron Ltd (PEL), 14-km, Ferozepur Road Lahore Dawlance (Pvt) Ltd, Dawlance Center 7/4, Civil Lines 9 Dr. Ziauddin Ahmed Road Karachi. Habibullah Industries (Pvt)Ltd, 3rd Floor,Progressive Plaza, Beamount Road,Civil Lines, Karachi Sabro Technologies (Pvt) Ltd., Plot No. 270, Industrial Triangle, Kahuta Road Islamabad Ageco (Pvt) Ltd., Office No. 7&8, 1st Floor, Hill View Plaza, Blue Area, Islamabad.
720	84151099	i) Air-conditioners, self-contained, wall type	9000 BTU, 12000 BTU, 18000 BTU, 24000 BTU along with commercial HVAC equipment upto 60000 BTU	 Packaged Type 02-60 HP Split Type ES Series 0.75 Ton to 2.5 Ton EQ Series LCD Display 1.0 Ton to 1.25 Ton Window type A/C 1.5 Ton to 2.5 Ton Air cooled self contained 4-30 Tons Air Cooled split packeged 4-30 Tons A/Cs with ducted and vertical Cabinet Ttype evaporators EM Series floor standing plastic body 1.5 - 4.25 Tons Cassette type EY series 1.5 - 6.0 Tons Water / air cooled packaged type A/Cs 4-42 Tons 	-	 Pakistan Elektron Limited (PEL), 14- Kilometer, Ferozepur Road, Lahore Cool Industries (Pvt) Limited, 9th KM Multan Road, Hanjarwal Lahore Coolpoint (Pvt) Ltd, Adda Plot, Sharaiz Avenue jatti Umra Road, 'Raiwind Road, Lahore Sabro Group (S.a Brother), Street No. 77,78, Sector 1-9/2 Islamabad Dawlance (Pvt) Ltd., Dawlance Center 7/4, Civil Lines 9 Dr. Ziauddin Ahmed Road Karachi. Habibullah Industries (Pvt)Ltd, 3rd Floor,Progressive Plaza, Beamount Road,Civil Lines, Karachi Sabro Technologies (Pvt) Ltd., Plot No. 270, Industrial Triangle, Kahuta Road Islamabad
		ii) Precision Cooling Split Package Air conditioners	102023 to 288562 btu/hr		-	 Sabro Technologies (Pvt) Ltd., Plot No. 270, Industrial Triangle, Kahuta Road Islamabad
			300 to 2000 CFM			2) Petal Engineering (Pvt) Ltd, 10 Umar Khan

No. PCT	Cod Product Description	Specifications	Physical Properties	Chemical Properties	Company
84158	i) Air Conditioners (Reverse Cycle)	 i) Wall/floor/ceiling/cassette type etc.(9,000 to 30,000 Btu/hr) ii) Air Cooled Self Contained & Spli Package Commerical (39,000 to 471,000 Btu/hr) iii) Trolley mounted, self contained units (50,400 to 600,000 Btu/hr) iv) Air Cooled Split Type, Em Series (Cooling/ Heating) (49,200 / 49,500 Btu/hr) v) Water Cooled Packaged type (45,000 to 498,000 Btu/hr) vi) Air Conditioning/ Heating Unit vii) Free Cooling Unit, Flexi Box 450/48 TWCA 	 Packaged Type 02-60 HP Split Type ES Series 0.75 Ton to 2.5 Ton EQ Series LCD Display 1.0 Ton to 1.25 Ton Window type A/C 1.5 Ton to 2.5 Ton Air cooled self contained 4-30 Tons Air Cooled split packeged 4-30 Tons A/Cs with ducted and vertical Cabinet Ttype evaporators EM Series floor standing plastic body 1.5 - 4.25 Tons Cassette type EY series 1.5 - 6.0 Tons Water / air cooled packaged type A/Cs 4-42 Tons 		 Coolpoint (Pvt) Ltd, Adda Plot, Sharaiz Avenue jatti Umra Road, Raiwind Road, Lahore Sabro Group (S.a Brother), Street No. 77,78, Sector I-9/2 Islamabad Petal Engineering (Pvt) Ltd, 10 Umar Khan Road, Manawan near Batapur Lahore Ageco (Pvt) Ltd., Office No. 7&8, 1st Floor, Hill View Plaza, Blue Area, Islamabad. Habibullah Industries (Pvt) Ltd., 3rd Floor, Progressive Plaza, Beamount Road, Civil Lines, Karachi. Dakiane (Pvt) Ltd., Dawlance Centre, 7/4 Civil Lines 9, Dr. Ziauddin Ahmed Road, Karachi Pakistan Elektron Limited (PEL), 14- Kilometer, Ferozepur Road, Lahore Sabro Technologies (Pvt) Ltd., Plot No. 270, Industrial Triangle, Kahuta Road Islamabad
	ii) Hybrid Cooling System				Sabro Technologies (Pvt) Ltd., Plot No. 270, Industrial Triangle, Kahuta Road Islamabad
2 84158	3290 i) Fan coil units	Fan Coil Units Ceiling Suspended ducted type, Fan Coil Units with Sheet Metal Body Industrial type. Computer Room Airconditioners 48,000 to 240000 BTU's /HR.with Humidifiers & Electric Heater.			 Habibullah Industries (Pvt)Ltd, 3rd Floor, Progressive Plaza, Beamount Road,Civil Lines, Karachi Pakistan Elektron Limited (PEL), 14- Kilometer, Ferozepur Road Lahore
	ii) Refrigeration units for cold rooms & trucks	+15c to -40c	To Compress & Heat Exchange		 Koldkraft Refrigeration (Pvt) Ltd., 243-S, Quaid-e-Azam, Industrial Estate, Kot Lakhpat, Lahore. Petal Engineering (Pvt) Ltd, 10 Umar Khan Road, Manawan near Batapur Lahore
84158	3390 i) Air Handling Units	 Horizontal draw through Vertical draw through Multi Zone blow through 	Construction with Bio-Pharma grade material and specified filters to control microbial counts. Plug Fan and Frequency Devices (VFDs) for pharmaceuticals industry.		 Sabro Technologies (Pvt) Ltd., Plot No. 270, Industrial Triangle, Kahuta Road Islamabad Habibullah Industries (pvt) Ltd., 3rd Floor, Progressive Plaza, Beaumont Road, Civil Lines, Karachi Coolpoint (Pvt) Ltd, Adda Plot, Sharaiz Avenue jatti Umra Road, 'Raiwind Road, Lahore Petal Engineering (Pvt) Ltd, 10 Umar Khan Road, Manawan near Batapur Lahore Ageco (Pvt) Ltd., Office No. 7&8, 1st Floor, Hill View Plaza, Blue Area, Islamabad.
	ii) Air handling/ Humidification / Filtration Plant	Irons & Al Sheets etc.	For Textile Mills (Spinning, weaving, Knitting) Power Plants, Tobacco Factories, Paper Plants etc. etc.		Manstock Engineering Company (Pvt) Ltd., 11/A (Commercial), 2nd Floor, Sector XX, Khe- Iqbal, Phase-3, Lahore Cantt.

S. No. PO	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		iii) Air Conditioners:	 Packaged Type 02-60 HP Split Type ES Series 0.75 Ton to 2.5 Ton EQ Series LCD Display 1.0 Ton to 1.25 Ton - Window type A/C 1.5 Ton to 2.5 Ton Air cooled self contained 4-30 Tons Air Cooled split packeged 4-30 Tons A/Cs with ducted and vertical Cabinet Ttype evaporators EM Series floor standing plastic body 1.5 - 4.25 Tons Cassette type EY series 1.5 - 6.0 Tons Water/air cooled packaged type A/Cs 4-42 Tons 		**	 Habibullah Industries (Pvt)Ltd, 3rd Floor,Progressive Plaza, Beamount Road,Civil Lines, Karachi Pakistan Elektron Limited (PEL), 14- Kilometer, Ferozepur Road, Lahore Sabro Technologies (Pvt) Ltd, Plot No. 270, Industrial Triangle, Kahuta Road Islamabad Coolpoint (Pvt) Ltd, Adda Plot, Sharaiz Avenue jatti Umra Road, 'Raiwind Road, Lahore Ageco (Pvt) Ltd, Office No. 7&8, 1st Floor, Hill View Plaza, Blue Area, Islamabad.
		iv) Fan Coil Units	300 to 1600 cfm			 Sabro Technologies (Pvt) Ltd., Plot No. 270, Industrial Triangle, Kahuta Road Islamabad Coolpoint (Pvt) Ltd, Adda Plot, Sharaiz Avenue jatti Umra Road, 'Raiwind Road, Lahore
		v) Electric Steam Humidifiers;	Steam output: (3.0 & 6.0 kg/Hr)			Sabro Technologies (Pvt) Ltd., Plot No. 270, Industrial Triangle Kahuta Road Islamabad
		vi) Hot Water Generators (Gas Fired);	Heating capacity: 35,000 to 360,000 & as per customers requirements			 Sabro Technologies (Pvt) Ltd., Plot No. 270, Industrial Triangle, Kahuta Road Islamabad DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore,
		vii) Evaporator Chillers	Custom Make			 Sabro Technologies (Pvt) Ltd., Plot No. 270, Industrial Triangle, Kahuta Road Islamabad Petal Engineering (Pvt) Ltd, 10 Umar Khan Road, Manawan near Batapur Lahore
724 84	34159011	Evaporators, refrigerating	Evaporators (for Air Conditioners) 1HP (old model), 1HP (new model), 1.5HP (old model), 1.5HP (new model), 2HP, 2.5HP, 3HP, 5HP, 7.5HP, 10HP, 15HP, 20HP, 30HP, 40HP, 60HP, 80HP and 120HP.			Breeze Frost Industries (Pvt) Ltd., Harbanspura Road, P.O. Tajpura, Lahore
725 84	34159019	i) Evaporators, refrigerating	Evaporators (for Air Conditioners) 1HP (old model), 1HP (new model), 1.5HP (old model), 1.5HP (new model), 2HP, 2.5HP, 3HP, 5HP, 7.5HP, 10HP, 15HP, 20HP, 30HP, 40HP, 60HP, 80HP and 120HP.			Breeze Frost Industries (Pvt) Ltd., Harbanspura Road, P.O. Tajpura, Lahore
		ii) Evaporators (other)	+15c to -40c	Aluminium Fin & Copper Tube		Koldkraft Refrigeration (Pvt) Ltd., 243-S, Quaid- e-Azam, Industrial Estate, Kot Lakhpat, Lahore.
726 84	34159029	i) Condensers for Air-conditioners,	Condensers (Air-conditioners) (Coated & Uncoated) 1HP (old model), 1HP (new model), 1.5HP (old model), 1.5HP (new model), 2HP, 2.5HP, 3HP, 5HP, 7.5HP, 10HP, 15HP, 20HP, 30HP, 40HP, 60HP, 80HP and 120HP.		**	Breeze Frost Industries (Pvt) Ltd., Harbanspura Road, P.O. Tajpura, Lahore
		ii) Condensers (others)	+15c to -40c	Aluminium Fin & Copper Tube		Koldkraft Refrigeration (Pvt) Ltd., 243-S, Quaid- e-Azam, Industrial Estate, Kot Lakhpat, Lahore.

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
727	84159099	Cooling & Heating Coils used in air conditioners	Custom Made			 Sabro Technologies (Pvt) Ltd., Plot No. 270, Industrial Triangle, Kahuta Road Islamabad Coolpoint (Pvt) Ltd, Adda Plot, Sharaiz Avenue jatti Umra Road, 'Raiwind Road, Lahore
		Heaters for Precision Heating	3.3 to 12 KW			 Sabro Technologies (Pvt) Ltd., Plot No. 270, Industrial Triangle, Kahuta Road Islamabad Petal Engineering (Pvt) Ltd, 10 Umar Khan Road, Manawan near Batapur Lahore
728	84169000	Expansion Joints	100mm to 5500mm dia	-		TDFC (Pvt) Ltd., East Pharange Drainage, Millat Town, Millat Road, Faisalabad
729	84171010	Kilns, non-electric	 i) upto 5000 mm dia x 65 mm thickness, Capacity upto 4,000 TPD Cement Plants "HEI" (Heat Exchange Institute) ii) Rotary Kilns upto 556 Tons weight for Cement Plants. iii) Kiln for Cement Plant (As per requirement) iv) Kiln upto 5500 mm dia x Upto 70 mm thickness x 69 M length 			 SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 A.B.S Engineering Corporation (Pvt) Ltd., F- 492, S.I.T.E, Karachi-75700 Heavy Mechanical Complex (Pvt) Ltd., Taxila TDFC (Pvt) Ltd., East Pharange Drainage, Millat Town, Millat Road, Faisalabad
730	84171090	Furnaces, Industrial , non-electric,	Heaters/Furnaces for Refineries and Fertilizer Plants upto 100,000 bpd & 970 tpd respectively "HEI" (Heat Exchange Institute)			SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi
731	84178000	Incinerators	Incinerators for disposal waste management as per site requirements upto 1000kg/Hrs			TDFC (Pvt) Ltd., East Pharange Drainage, Millat Town, Millat Road, Faisalabad
732	84181090	Refrigeration/ freezing/air conditioning machines;	Combined refrigerator-freezers, fitted with separate external doors			 Pakistan Elektron Limited (PEL), 14- Kilometer, Ferozepur Road, Lahore United Refrigeration Industries Ltd. And Dawlance (Pvt) Ltd., Dawlance Centre, 7/4 Civil Lines 9, Dr. Ziauddin Ahmed Road, Karachi
733	84182190	Refrigerators, compression-type, electrical, domestic	Refrigerators, House hold type (Compression type) Combined refrigerator-freezers, fitted with separate external doors			 Pakistan Elektron Limited (PEL), 14- Kilometer, Ferozepur Road, Lahore United Refrigeration Industries Ltd. And Dawlance (Pvt) Ltd., Dawlance Centre, 7/4 Civil Lines 9, Dr. Ziauddin Ahmed Road, Karachi Cool Industries (Pvt) Limited, 9th KM Multan Road, Hanjarwal Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company	<u>Annex-I (Fin</u>
734	84182990	Refrigeration/ freezing/air conditioning machines;	 Refrigerators (direct cool/no-frost) Deep Freezers, Triplet Freezers Bottle coolers CS (cold storage) split package Units (16000 to 106500 btu/hr) 			 Pakistan Elektron Limited (PEL), 14- Kilometer, Ferozepur Road, Lahore United Refrigeration Industries Ltd. and Dawlance (Pvt) Ltd., Dawlance Centre, 7/4 Civil Lines 9, Dr. Ziauddin Ahmed Road, Karachi Varioline Intercool Pakistan (Pvt) Ltd., 3-KM Kahna Kacha Road Kahna, Lahore Sabro Technologies (Pvt) Ltd., Plot No. 270, Industrial Triangle, Kahuta Road Islamabad Petal Engineering (Pvt) Ltd, 10 Umar Khan Road, Manawan near Batapur Lahore 	
735	84183090	Refrigeration/ freezing/air conditioning machines;	Freezers of the chest type, not exceeding 800 l capacity			 Pakistan Elektron Limited (PEL), 14- Kilometer, Ferozepur Road, Lahore Cool Industries (Pvt) Limited, 9th KM Multan Road, Hanjarwal Lahore United Refrigeration Industries Ltd. and Dawlance (Pvt) Ltd., Dawlance Centre, 7/4 Civil Lines 9, Dr. Ziauddin Ahmed Road, Karachi Varioline Intercool Pakistan (Pvt) Ltd., 3-KM Kahna Kacha Road Kahna, Lahore 	
736	84184090	Refrigeration/ freezing/air conditioning machines;	Freezers of the upright type, not exceeding 900 litres capacity			 Pakistan Elektron Limited (PEL), 14- Kilometer, Ferozepur Road, Lahore United Refrigeration Industries Ltd. And Dawlance (Pvt) Ltd., Dawlance Centre, 7/4 Civil Lines 9, Dr. Ziauddin Ahmed Road, Karachi 	
737	84185000	Refrigeration/ freezing/air conditioning machines;	Other furniture (chests, cabinets, display counters, show-cases and the like) for storage and display, incorporating refrigerating or freezing equipment.			 Pakistan Elektron Ltd (PEL), 14-km, Ferozepur Road Lahore Cool Industries Ltd (Waves), 9th KM Multan Road, Hanjarwal, Lahore Varioline Intercool Pakistan (Pvt) Ltd., 3- Km, Ferozepur Road, Lahore Mumtaz Engineering (Pvt) Ltd. 141- Industrial Area, Kot Lakhpat Lahore 	
738	84186910	Milk Cooling Tanks	Milk chillers, direct expansion and ice bank type, capacities : uptill 3400 liters, manufactured under license from "packo Inox- belgium"			Unitech International (Pvt.) Ltd., Plot # 09,Holiday Park, Musharafabad , Raiwind Road, Lahore.	
739	84186920	Insulated Reefer Container	Size: 6' To 40' Temp Range +15c To c-40			Koldkraft Refrigeration (Pvt) Ltd., 243-S, Quaid- e-Azam, Industrial Estate, Kot Lakhpat, Lahore.	
740	84186939	Water Dispenser	Hot & Colsd Water Dispenser: Cooling capacity 3 L/h, Hot capacity 2 L/h, Refrigerator Compartment, Glass Panels, Compressor Cooling			Super Asia Muhammad Din Sons Ltd., G.T. Road Gujranwala	
741	84186990	i) Cold Storage Units	Not below (-4°C) temp.			 Sabro Technologies (Pvt) Ltd., Plot No. 270, Industrial Triangle, Kahuta Road Islamabad Coolpoint (Pvt) Ltd, Adda Plot, Sharaiz Avenue jatti Umra Road, 'Raiwind Road, Lahore Pakistan Insulations (Pvt.) Ltd., 107 Business Avenue, PECHS BLock-6, Karachi 	

No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		 ii) Refrigerated containers/Cold Rooms/ Walk ins ii) Refrigeration Units and Insulated Reefer Boxes 	Refrigerated Containers suitable for mounting on locally manufactured vehicles/chasis. Cold Rooms, Walk ins			 Kold Kraft (Pvt) Ltd, 247/S, Industrial Estate, Kot Lakhpat, Lahore Coolpoint (Pvt) Ltd, Adda Plot, Sharaiz Avenue jatti Umra Road, 'Raiwind Road, Lahore Sabro Technologies (Pvt) Ltd., Plot No. 270 Industrial Triangle Kahuta Road Islamabad Pakistan Insulations Pvt. Ltd., 107 Business Avenue, PECHS BLock-6, Karachi Varioline Intercool Pakistan (Pvt) Ltd., 3-KM Kahna Kacha Road Kahna, Lahore
		 iii) Air Cooled Packaged Water Chillers; (34,800 to 1944,000 Btu/hr) iv) Water Cooled Packaged Water Chillers (40,200 to 2180,400 Btu/hr) v) Flooded Type Water Cooled Chiller vi) Air Cooled Water chillers (32500 to 1770000 btu/hr) vii) Water Cooled Water chillers (36179 to 2112375 btu/hr) 				 Coolpoint (Pvt) Ltd, Adda Plot, Sharaiz Avenue jatti Umra Road, 'Raiwind Road, Lahore Sabro Group (S.a Brother), Street No. 77,78, Sector I-9/2 Islamabad Petal Engineering (Pvt) Ltd, 10 Umar Khan Road, Manawan near Batapur Lahore Ageco (Pvt) Ltd., Office No. 7&8, 1st Floor, Hill View Plaza, Blue Area, Islamabad. Habibullah Industries (Pvt) Ltd., 3rd Floor, Progressive Plaza, Beamount Road, Civil Lines, Karachi.
		viii) Evaporators	For sugar mills Up to 1250 Tons per hours			The Star Mughal Industries (Pvt) Ltd., Sharifpura, G.T. Road Gujranwala
		ix) Residential Containers, Offices,Dining Hall, Guard Rooms,Washrooms etc	 Containers suitable for mounting on locally manufactured vehicles/ chasis. Insulated, Length up to 40ft, Width up to 10ft, Height up to 12ft 	Fiber Glass Reinforced Plastic (FRP) - Steel Structure	As per standard	Fibre Craft Industries, Canal Bank Hanif Park, Harbanspura Lahore - 54850
742	84189100	Evaporators, refrigerating				 Breeze Frost Industries (Pvt) Ltd., Harbanspura Road, P.O. Tajpura, Lahore Varioline Intercool Pakistan (Pvt) Ltd., 3-KM Kahna Kacha Road Kahna, Lahore A.J. Corporation 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore.
	84189100	Coolers, evaporative air	Evaporators for Deep Freezers and Visi Coolers 1/5HP, 1/4HP, 1/3HP and 1/2hp			Breeze Frost Industries (Pvt) Ltd., Harbanspura Road, P.O. Tajpura, Lahore
	84189920	Wire Condensers	1/3HP, 1/4HP, 1/5HP, 1/6HP, 1/8HP, 1/10HP and 1/12HP	Steel Tube Copper Coated, Steel Wire and Black Powder Coating		Breeze Frost Industries (Pvt) Ltd., Harbanspura Road, P.O. Tajpura, Lahore
745	84189990	i) Condensers for Deep Freezers & Water Coolers	 i) Condensers (For Deep Freezers & Visi Coolers) 1/5HP, 1/4HP, 1/3HP and 1/2HP ii) Condensers for Refrigerators (Sheet on Tube) 1/16HP, 1/12HP, 1/10HP, 1/8HP, 1/6HP, 1/5HP, 1/4HP and 1/3HP. iii) Condensers for Refrigerators (Wire on Tube) 1/12HP, 1/10HP, 1/8HP, 1/6HP, 1/5HP, 1/4HP and 1/3HP. iv) Bunch Condensers for Deep freezers & Water Coolers (Wire on Tube) 1/2HP - 8 Row, 1/3HP - 6 Row, 1/4HP - 4 Row, 1/5HP - 4 Row, 1/5HP - 2 Row 			 Breeze Frost Industries (Pvt) Ltd., Harbanspura Road, P.O. Tajpura, Lahore Varioline Intercool Pakistan (Pvt) Ltd., 3-KM Kahna Kacha Road Kahna, Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		ii) Falling Film Evaporator	Heating Surface 55m2 Surface	-	-	 Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 Qadbros Engineering (Pvt) Ltd., 9-A Link Ravi Road, Badami Bagh, Lahore Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan
		iii) Pig Launcher/ Reciever	As per requirement	-	-	 Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan
746	84191190	Instant Gas Water Heater	From 10 L to 100 Liter, Burner, safety device, various options of heat exhanger and burners			Super Asia Muhammad Din Sons Ltd., G.T. Road Gujranwala
747	84193400	Dehydration Plant	Ranging capacities to client's requirements			Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi
748	84193900	Dryer/Spray Dryer Machine with all standard accessories	All Types and Sizes (except for vaccum dryers used in Tanneries)			 The Star Mughal Industries (Pvt) Ltd., Sharifpura, G.T. Road Gujranwala SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi Heavy Mechanical Complex (Pvt) Ltd., Taxila Qadbros Engineering (Pvt) Ltd., 9-A Link Ravi Road, Badami Bagh, Lahore
749	84194000	i) Falling Film Evaporator	Heating Surface 55m2 Surface	-	-	 Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 Qadbros Engineering (Pvt) Ltd., 9-A Link Ravi Road, Badami Bagh, Lahore Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		ii) Crude Oil Distillation Towers/Columns / Distilling or rectifying plant	 For Refineries of upto 100,000 bpd and for Chemical, Petrochemical & Fertilizer Plants (DiaxHeightxWall Thickness of Towers/ Columns (1500-3500 mm x 10000mm - 35000mm x 10-50mm), ASME Sec. VIII Div. 1 & 2 Refinery/ Oil & Gas Distillation Towers Type = Atmospheric Pressure, Pressure and Vacuum Type Distillation Towers Pressure = Full Vacuum to 1500 PSI Temperature = -100 F to 600 F Material = Carbon Steel, Normalized Carbon Steel, Stainless Steel and Alloy Steel Maximum Length = 40000mm & Max. dia = 3400mm, Wall thickness = 5mm thk to 50.8mm thk, As per Client's requirement. In accordance to ASME Sec VIII, Div 1& 2 / B.S.S. 			 SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi A.B.S Engineering Corporation (Pvt) Ltd., F- 492, S.I.T.E, Karachi-75700 DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore Petrosin Ravi Industries Ltd., Shahra-i- Pakistan Kala Shah Kakoo G.T Road Lahore Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan FD & C (Pvt) Ltd., F -116, S.I.T.E. Karachi
		iii) Ethnol Plant/ equipment	Upto 100,000 L / day			Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000
		iv) Absorption Tower, Columns, Process Reactors, Heat Exchange, Condensers, Air Coolers, LPG/Oil/LNG Storage Tanks, Heat Recovery Boilers, Steel Structure, Process and Utility Piping, Gas Sweetning Unit, Amine Absorption, Flare Stack System, LPG Recovery Unit, Sulphur Recovery Unit, Process and Power Piping Installation and Modification	as per customer requirements			 DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan A.J. Corporation 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore. Shaheen Tank Trailers Manufacturing Company (Pvt) Ltd., Plot #306,Wali Town Near Port Qasim Mor, National Highway Karachi.
750	84195000		 ii) Multi Blow Double Heat Exchangers. iii) Multi Blow Double Heat Exchangers. iv) Shell & Tube Type of Carbon, Alloy & SS, Range upto 2500 psi v) Shell & Tube Type (as per TEMA standard for oil /gas processing, chemical & fertilizer plants) v) Fixed & Floating Tube sheets with straight & U-Tubes. vi) Air Cooled with Finned Tubes of Carbon, Alloy & Non-Ferrous Materials ASME Sec. VIII Div. 1 & 2, TEMA, HEI, API-660, API-661, ANSI, B-78.1, ANSI B-78.2 vii) Type: U-Tube, Fixed, Floating, Horizontal & Vertical Size: 	a. Type = Shell/ Tube, as per TEMA Standard Pressure Range = 15 PSI to 1500 PSI Temperature Range = -150 to 500F Material used = Carbon Steel, Stainless Steel, Brass and Alloy Minimum Dia = 300mm, Max Dia = 1500mm Minimum Length = 1000mm; Max Length = 10000mm b. Type = Fin Fan/ Air Cooled Cooler Pressure Range = 15 PSI to 1500 PSI Temperature Range = ambient to 600F Material used = Carbon Steel, Stainless Steel, Brass and Alloy Minimum Size = 5000mm; Max Size = 12000mm as per customers requirements	1) Air Cooled Cross Flow Heat Exchangers upto 45 Bars and Tube specifications as 9377 mm length, 2668 mm width & 972 mm height. 2) Shell & Tube Type Pre Condensers upto 1700 mm dia & 6000 mm length. 3) Vertical Condensers upto 2012 mm dia & 6800 mm length. 4) Horizontal Condensers upto 2012 mm dia & 6800 mm length. 5) Shell & Tube type Heat Exchangers upto 1700 mm dia & 5000 mm length. 6) Shell & Tube type evaporators upto 5500 mm dia & 14000 mm length.	 A.J. Corporation, 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore. Industrial & Mechanical Engineers (Pvt) Ltd., 403, Noor Estate Building Shahrah-e-Faisal Karachi Al-Jassar Engineering Co., 3 KM from Brahama Interchange M1, Jhang Bahtar Road, Near By Multi Orchids Residencia, Islamabad. Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi Ravi Green Engineering (Pvt) Ltd., 20th KM (Pajian), Raiwind Road, Lahore Shaheen Tank Trailers Manufacturing Company (Pvt) Ltd., Plot #306, Wali Town Near Port Qasim Mor, National Highway Karachi. Heavy Mechanical Complex (Pvt) Ltd., Taxila DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi Labret Staal, Labare Huare, 35 Tinu Block

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
751	84198100	Kettles, steam, Industrial	Pressure Vessels with steam heating helical coils inside and fitted with or without agitator. Diameter upto 5000mm, height 6000mm and wall thickness upto 30mm fabricated of carbon, alloy or stainless steel. ASME Sec. VIII Div. 1 & 2 & as per customers requirements Capacity Up to 350 TPH, 150 BARG (water tube, fire tube, waste heat recovery boiler, heat recovery steam generator)			 SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000
752	84198910	i) Cooling Towers	Cooling Tower Designs: Counter flow and Cross flow Air Flow: Induced and Forced Fills: Film Fill and Splash Fill Type: Industrial and Package Size per Cell: 50 GPM to 12000 GPM Other Accessories: Drift Eliminators (PVC/FRP), FRP Louvers, FRP/GRP Water Distribution Header, Fan Blades, FRP/GRP Fan Stack etc.	Structure: Stainless Steel, Galvanized Mild Steel, FRP Pultruded Profiles, Stainless Steel, Concrete		 Jalal Engineering, B-425, Block 13, F.B. Area, Karachi – 75900 ARCO International, 305-307, Poonch House Plaza, Adamjee Road, P.O. Box 1056, Rawalpindi Imtiaz Engineering Services, 12, 3rd Floor, Hyder Plaza, Main Rashid Minhas Road, Gulshan-e-Iqbal, Block-5, Karachi Liang Chi Industry Pakistan (Pvt) Ltd., 304 Anum Classic, 48 Darul Aman Society, Opposite Duty Free Shop, Shara-e-Faisal, Karachi - 75350 Fibre Craft Industries, Canal Bank Hanif Park, Harbanspura Lahore - 54850
		ii) Tanks, fitted with heating or cooling elements,	Atmospheric Tanks from 500 barrels to 380,000 barrels capacity. Large tanks can be of fixed roof, floating roof or dome roof. ASME Sec. VIII, Div. 1 & 2, API-650, API-620, API-12B, API- 12D, API-12F			 SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore Izhar Steel, Izhar House, 35-Tipu Block, New Garden Town, Lahore Ravi Green Engineering (Pvt) Ltd., 20th KM (Pajian), Raiwind Road, Lahore Shaheen Tank Trailers Manufacturing Company (Pvt) Ltd., Plot #306, Wali Town Near Port Qasim Mor, National Highway Karachi.

Product Description	Specifications	Physical Properties	Chemical Properties	Company
 i) Tanks, Receivers, Vessels, Drums and Other Containers 	De-Ethanizer OH Drum, Blow Case Vessel, Water Degassing Boot, Expandor Suction Drum, Low Temperature Separator, De- Ethanizer Column, LPG/NGL Splitter OH Drum, Chilled Water Expansion Tank, Thermosyphon Receiver, Slops Tanks, Flare Knok out drum, NGL Flash Vessel, Condensate Flash Vessel, Digester & Reactor for Pulp & Paper Plant, Seal System Nitrogen Receiver, Instrument Air Receiver, Plant Air Receiver, Nitrogen Receiver, Knock Out Drums, Coalescer Vessels, Columns and Strippers, Spherical Tank (LPG), Absorption Tower, Columns, Process Reactors, Heat Exchange, Condensers, Air Coolers, Process And Utility Piping, Gas Sweetening Unit, Amine Absorption, Flare Stack System, LPG Recovery Unit, Sulphur Recovery Unit, Slug Catcher (Finger type, Vessel type), Shell & Tube Type of Carbon/Alloy/SS. Fixed & Floating Tube sheets with straight & U-Tubes. Air Cooled with Finned Tubes of Carbon, Chemical Injection / Dosing Skids (Corrosion Inhibitor Skid, Methanol Injection Skid, Drag Reducing Agent injection skid, Anti-Foam Injection skid, De-Emulsifier Injection skid, Wax Inhibitor Injection skid, Odorizer Injection skid, Sour Gas Conditioning Skids (Instrument Gas Scrubber Skid, Sour Gas Conditioning Skid, Scrubbers, Filters), Tanks, fitted with heating or cooling			 Computy Computy Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan IKAN Engineering Services (Pvt) Ltd., 34- Km, Shamki Bhattian, Multan Road, Lahore Izhar Steel, Izhar House, 35-Tipu Block, New Garden Town, Lahore, Shaheen Tank Trailers Manufacturing Company (Pvt) Ltd., Plot #306, Wali Town Near Port Qasim Mor, National Highway Karachi SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi A.J. Corporation 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore.
ii) Kettles for Pharmaceuticals Industry	Pressure Vessels with Limet Coil, Jackets for steam heating & cooling in stainless steel or higher alloys design as per ASME Sec. VIII Divt. 1 & 2 complete with agitator & variable / fixed speed drives & as per customers requirement.			DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore
iii) Thermal Oil Boiler System (Hot Oil Boiler)	All types/sizes			 Descon Engineering Ltd., 2-Km Defence Road, Off 24th Km, Multan Road, Chung, Lahore The Sitara Engineers, Nishatabad, Sheikhupura Road, Heavy Mechanical Complex, Taxila SEFEC Engineering (Pvt) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi
iv) Complete Ethanol Plants / Equipment	Low carbon stainless steel, consisting of Distillation Columns, Shell and Tube Type Heat Exchangers, Fermentation tanks, Plant piping, Molasses Storage tanks, Bio Gas reactors and other large and small tanks. We also do complete erecting and installation of these plants.In accordance to ASME/ANSI 31.3, API 650, API 620, CODAP, TEMA type B&C / B.S.S. & as per customers requirements	Each Ethanol plant comprises of the following: 1) 10 nos of Distillation columns with diameter ranges from 300 mm to 2300 mm and length of upto 47000mm. 2) 13 nos of shell and tube type heat exchangers with dia 400 mm to 2450 mm. 3) 22 nos of tanks with dia 2200 mm to 6000 mm. All equipments are made from SS316L and SS304L		 A.B.S Engineering Corporation (Pvt) Ltd., F- 492, S.I.T.E, Karachi- 75700 DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore A.J. Corporation 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore.
 v) Pasteurizers, electro-thermic, Industrial 	Juice and milk pasteurizers			NKR Engineering (pvt) Ltd., 304, Anum Classic, 48 Darul Amman Society, Opposite Duty Free Shop, Shahra-e-Faisal, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company	
		refining, Industrial	Sugar Mill eqpt.of upto 10,000tpd: Cane Carrier, Cane leveler, Cane cutting knives, Cane shredder, Prepared cane elevator, Cane crushing mills, cooling water piping, Inter conveyors, Service platform & gangways MS & SS receiving tanks, imbinition & juice piping, service hand box only, belt conveyor, Juice Heaters, Bucket elevator, Lime slaker, Flashing vessel, Door type & SRI type clarifier, Vacuum filters, Cascade condenser Mud overflow tank, Mud mixer Cyclone, bagacillo separator and ducting, Bagacillo screen with hopper Evaporators, Condensate receiver, Vacuum pans(batch type), Crystallizers (air cooled & water cooled) Vertical crystallizer, Open seed crystallizer, Vacuum crystallizers, Multi jet condensers, Continuous centrifugals, Feed mixer, Screw conveyor, Sugar remeltor, Magma minglers single/double paddle, Raw sugar remelter, First/ Second carbonation tank tank, Remelt sulphitator, Rotary pressure filter, Aeration tank, Telofloc clarifier, Scum clarifier, hopper conveyor, White sugar dryer, Air heater Dry cyclone, wet cyclone, Sugar Storage bins, Boiler supporting structure, Working platform, Steel casing, Air heater Dumping grates & feeder, Economizer, I.D.F.D. & S.A. fans, Fly ash arrestor, Observation ports, inspection/ access doors, Hoppers, Flue gas ducts, Chimney stacks, Integral piping,	 Vertical Crystallizer upto 300 tons weight, 4000 mm diameter and 13000 mm length. 2) Air Cooled Crystallizer upto 3000 mm diameter and 5500 mm length. 3)Vacum Crystallizer upto 2800 mm diameter and 5000 mm length. 4) Agitators upto 8000 mm diameter and 6500 mm length. 5) Condensors upto 1400 mm diameter and 5600 mm length. 6) Seperators upto 1500 mm diameter and 9500 mm length. 7) Filters and screens upto 5000 mm dia and 6000 mm length. 8) Mixers upto 2400 mm dia and 8000 mm length. 9) Pressure Filters and Reactors upto 3000 mm dia and 4000 mm length. 10) Vacuum Filters upto 3000 mm dia and 6000 mm length 		 i) A.B.S Engineering Corporation (Pvt) Ltd., F-492, S.I.T.E, Karachi- 75700 ii) SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi iii) The Star Mughal Industries (Pvt) Ltd., Sharifpura, G.T. Road Gujranwala 	
754	84199090	Cooling & Heating Coils used in Refrigerators	Rhow down task Water compling device. Thermal deseastor Custom Made			 Sabro Technologies (Pvt) Ltd., Plot No. 270, Industrial Triangle, Kahuta Road Islamabad Coolpoint (Pvt) Ltd, Adda Plot, Sharaiz Avenue jatti Umra Road, 'Raiwind Road, Lahore 	
755		(filtering or purifying machinery) ii) Brine Filtration Unit / Bag	by the fluid through cartridges. Capacity: 30 Cartridge upto 100 Cartridge (Dual POD) Or as per our client requirement. Used to filter the sediments	Design Code: ASME Material: Carbon Steel. Test Pressure: 100 psig Working Pressure: 75 psig Design Code: ASME		Al-Jassar Engineering Co., 3 KM from Brahama Interchange M1, Jhang Bahtar Road, Near By Multi Orchids Residencia, Islamabad.	
		machinery)	transported by the fluid through bag. Capacity: Duplex, Fourplex Or as per our client requirement.	Material: SS 316L Test Pressure: 100 psig Working Pressure: 75 psig			
756	84212100	i) Sand Water Filter, Automatic Water Softner, Activated Carbon Filter Water Pressure Booster	As per client's requirment			Industrial & Mechanical Engineers (Pvt) Ltd., 403, Noor Estate Building Shahrah-e-Faisal Karachi	
		Filter, (Automatic/Manual Operation) Cartridge Filters	Filteration Media Sand, Gravel, Anthracite (all capacities for all industrial sectors)			 Water Engineering & Management Services, N, Model Town Extension, Lahore Fluid Technology International, 424, 4th 	
		(Automatic/Manual Operation)	Filtration Media Granular or Powderd Activated Carbon (all capacities for all industrial sectors) Filtration Media Birm, Filter Ag and Manganese Green (all			 Floor, Bhayani Centre, Block M, North Nazimabad, Karachi-74700 3) B. H Industries (Pvt) Ltd., 05-Chenab Market Madina Town Faisalabad 4) FD & C (Pvt) Ltd., F -116, S.I.T.E. Karachi 5) Aqua Regia, House No. 33, G-4 Johar Town 	
		/ Manaul Operation) v) Water Softener Plants (Automatic & Manual Operation)	capacities for all industrial sectors) Filling Media Cation Exchange Resin (all capacities for all industrial sectors)				
		vi) Demineralized/ De-ionization	Strong, Weak Cation & anion Exchange Resin including Mixed Bed Grade (all capacities for all industrial sectors)			Lahore 6) Faiz Enterprises, 3/II, Shadman Plaza Shadman Market Lahore	

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		vii) Automatic WFI / Distilled Water Plant	(all capacities for all industrial sectors)			
		viii) Rerverse Osmosis (RO) / Desalination Plants	Removal of ions / salts through Reverso Osmosis Membranes. (all capacities for all industrial sectors)			
		ix) Ultra Filtration (UF) Plants	Removal of Suspended Solids through Ultra Filtration Membranes (all capacities for all industrial sectors)			
		x) Nano Filteration (NF) Plants	Removal of Selective ion through Nano Filtration Membranes (all capacities for all industrial sectors)	-		
		xi) Industrial Wastewater / Effluent Treatment Plant	Biological System (Aerobic/Anaerobic), Membrane Bio Reactor (MBR), Dissolved Air Floatation (DAF) Unit, (all capacities for all industrial sectors)			
		xii) Sewage Treatment Plant	Biological System (Aerobic/Anaerobic) (all capacities for all industrial sectors)			
757	84212900	i) Dearator Feed Tank Vessel	as per customer requirements			 DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan
		ii) Filters for oil refineries	As per fabrication drawings and Client's requirement.	Sand Filters for Oil Refineries. Inner dia 1980mm x 2930mm length. All water collection and Air distribution system is made of SS-304 material		 A.B.S Engineering Corporation (Pvt) Ltd., F- 492, S.I.T.E, Karachi- 75700 Fluid Technology International, 424, 4th Floor, Bhayani Centre, Block M, North Nazimabad, Karachi-74700 Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan
		iii) Air Filters / Oil Filters	Air Filters for Power Generation and Customized Industrial application other than automotive (All Types and Sizes)			 Malik Auto and Agricultural Ind. (Pvt) Ltd., 80-Badami Bagh, P.O. Box 465, Lahore Qaim Automotive Mfg. (Pvt) Ltd., 203-206, Prince Centre, Preedy Street, Saddar, Karachi- 74400 Skyways Manufacturers (Pvt) Ltd., A/1-A-3, SITE Karachi Exarachi Bsas Engineering Industries (Pvt) Ltd., S- 19/A, g. Allana Road, S.I.T.E, Karachi
		iv) Clarifiers	36' x 18' (upto 141000 Gallons) Dorr Olive, SRI, FCB Type			The Star Mughal Industries (Pvt) Ltd., Sharifpura, G.T. Road Gujranwala
758	84213940	Air Filters	Other than automotive (All Types and Sizes)			 Malik Auto and Agricultural Ind. (Pvt) Ltd. 80-Badami Bagh, P.O. Box 465., Lahore Qaim Automotive Mfg. (Pvt) Ltd., 203-206, Prince Centre, Preedy Street, Saddar, Karachi- 74400 Skyways Manufacturers (Pvt) Ltd., A/1-A-3, SITE Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company	<u>Annex-I (F</u>
759	84213950	Bag Filters	Other than automotive Used for air filtration as substitute of cartage air filter and also used for removal of dry and wet smokes for cleaning the air or controlling the pollution as part of national environmental quality standards. (All Types and Sizes)	Usages: Gas turbines, generators, (air intake for circulation) cement, Coal power stations for controlling the emissions for environmental controls, dust collectors, vacuum cleaners and for all the machines which are producing fumes, unwanted vapors which act as air cleaner for operation as creating suction or for purpose of environment standard compliance. Bag filters are also used for liquid filtration in which case the filter media is for filtration of liquid and with the change of filter media the character of bag filtration can be changed.		 Malik Auto and Agricultural Ind. (Pvt) Ltd. 80-Badami Bagh, P.O. Box 465., Lahore Qaim Automotive Mfg. (Pvt) Ltd., 203-206, Prince Centre, Preedy Street, Saddar, Karachi- 74400 Skyways Manufacturers (Pvt) Ltd., A/1-A-3, SITE Karachi TDFC (Pvt) Ltd., East Pharange Drainage, Millat Town, Millat Road, Faisalabad 	
760	84213990	 i) Incinerators for Oil and Gas/Refinery and Industrial units ii) Gas Filter Separators iii) Two Phase / Three Phase Separators v) Instrument Gas Scrubbers vi) Deodorizer Vessel vii) Guel Gas Scrubber viii) Vertical Scrubber (Capacity. Flow 450 mmcfd) ix) Incenerators 			-	 Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan IKAN Engineering Services (Pvt) Ltd., 34- Km, Shamki Bhattian, Multan Road, Lahore DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore Shaheen Tank Trailers Manufacturing Company (Pvt) Ltd., Plot #306, Wali Town Near Port Qasim Mor, National Highway Karachi A.J. Corporation 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore. 	
		x) Hepa Filter: xi) Filters, vacuum	Used for clean & purified air by pharmaceutical industry and other allied industries, health sector and labs For Sugar mills and other allied Industries .In accordance to ASME sec VIII Div 1 & 2.	 Having diameters of 3500mm and length of 6000mm ASME Sec. VIII, Div. 1 & 2	**	 Malik Auto and Agricultural Ind. (Pvt) Ltd., 8th K.M. Raiwind Road, Lahore 1) SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi 2) A.B.S Engineering Corporation (Pvt) Ltd., F-492, S.I.T.E, Karachi-75700 	
		xii) Plate and frame type filter	36' x 36' (upto 650' filtering) For Ceramic & Sugar Industry 13' x 32' - 1310 filtering area, Rotary Filter type			The Star Mughal Industries (Pvt) Ltd., Sharifpura, G.T. Road Gujranwala	
		xiii) Vacuum Filter xiv) Pressure Filter	As per Sugar Industry Specifications and other as per client			1	
		xv) Filters, Air	design Other than automotive (All Types and Sizes)	••		 Malik Auto and Agricultural Ind. (Pvt) Ltd. 80-Badami Bagh, P.O. Box 465., Lahore Qaim Automotive Mfg. (Pvt) Ltd., 203-206, Prince Centre, Preedy Street, Saddar, Karachi- 74400 Skyways Manufacturers (Pvt) Ltd., A/1-A-3, SITE Karachi 	

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		xvi) Gas Filter Separator System	Dia 8", 12", 18", 24" and 30" with optional instruments like level gauges, pressure gauges, level controller, control valve pressure regulator etc. Equipment tobe complete with quick opening end enclosure, filter elements and mist eliminator	Design Pressure 1400 psig; Temp. 130°F, Flow ASME "U", Stamp coded to Section VIII Div. I. Flow Range from 1 mmscfd to 150 mmscfd.		 DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore Ravi Green Engineering (Pvt) Ltd., 20th KM (Pajian), Raiwind Road, Lahore Shaheen Tank Trailers Manufacturing Company (Pvt) Ltd., Plot #306, Wali Town Near Port Qasim Mor, National Highway Karachi.
761	84223000	i) Machines, filling, for bottles, cans,	Variable specifications as per requirements for Juice, Water Treatment, Cosmatics and liquid Food processing.			Al-Qarni Flow Tech International, 9/34 Civic Centre New Garden Town, Lahore
		ii) Liquid / Solid & Bulk Packaging Machines	Liquid Packaging Machines Output:1000 to 2700 pouches/hr, Capacity : 5ml to 5000ml, Weight: 200-550 kg Dimensions:L:600-872mm x W:355-830 mm x H: 1795-3000 mm <u>Solid Packaging Machines</u> Output:18-45 pouches/min, Capacity:5-2000 grams, Weight: 575 to 600 Kgs Dimensions: L:1110-1160 mm x W:830-1700 mm x H: 2080-2750 mm <u>Bulk Packaging Machines</u> Metering Mode:Weighing (Net weight form) Output: 6-9 bag per min, Capacity: 05~50 Kg (20~100 kg for oversized ones), Weight: 800 kgs, Weight accuracy: 0.2%, Dimensions: 3700 (variable depending on the conveyor) x 1600 x 3100 mm	Pouch Type: pillow/standing shape, center/side/sachet 3 side, 4 side seal with or without photocell or continuous /centralized design Options: Strip applicator, date coding system, English folding system, feeding conveyor, conveyor, thermic sealing system. Packaging Materials: PE, BOPP, PP, nylon, laminate, cotton, jute, paper aluminum foil etc. Water: 100 Ltr/hr, 2° C > 10°, P 2 bar Air : 800 Ltr / min, P 6 bar Power : 220/380 V, 1 phase & 3 phase, 50 Hz, 2~7 KW		Centre New Garden Town, Lahore Prepac Engineering Industries (Pvt) Ltd., Plot No. 20 Rasheed Industrial Estate, 18 KM Feroza Pur Road, Lahore
		iii) Automatic vertical form-fill-seal machine for liquid, viscous & semi viscous products	PRODUCTS: edible oils, ghee, liquid milk, lube oil, grease, juices, ketchup, mayonnaises, liquid soap, detergent, egg liquid, cosmetic creams, sauces, gel, recota cheese, water, shampoo, Liquid choclate. Capacity:2-15ml; 20-100 ml; 100-1000 ml; 1000-5000 ml, Output Speed:600-1200 packs/ hour; 1200-2400 packs/hour; 2400~5000 packs/ hour; 5000~10000 packs/ hour	Pouch Shape: 3 side seal, 4 side seal center seal stand pouch		
		iv) Automatic vertical form-fill-seal machine for solid, granule, powder, ununiform shaped products	PRODUCTS: rice, sugar, pulses, beans, spice powder, whole spices, recepies masala, instant drink powder. Milk powder. Confectionary, nimko, chips, pasta, microni, salt, flour, sugi, meda, cement, seeds, pecticide powder, choclate powder, frozen fries, frozen cheese, pickle paste, whole pickle, consentrate powder, joshanda, ispaghol, detergent, coffee powder, cereals, frozen vegetables, frozen fruits Capacity: 2g to 15g; 20g to 100g; 100g to 1000g; 1000g to 10000g, Output Speed: 600–1200 packs/hour; 1200–2400 packs/hour; 2400–5000 packs/ hour	Pouch Shape: 3 side seal, 4 side seal center seal quad seal side gusseted handle punch		

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company	<u>Annex-I (Final List)</u>
		 v) Automatic HFS pre-made bag filling machine for packaging of all type of liquid & solid products 	PRODUCTS: rice, sugar, pulses, beans, spice powder, whole spices, recepies masala, instant drink powder. Milk powder. Confectionary, nimko, chips, pasta, microni, salt, flour, sugi, meda, cement, seeds, pecticide powder, choclate powder, frozen fries, frozen cheese, pickle paste, whole pickle, consentrate powder, joshanda, ispaghol, detergent, coffee powder Edible oils, ghee, liquid milk, lube oil, grease, juices, ketchup, mayonnaises, liquid soap, detergent, egg liquid, cosmetic creams, gel, recota cheese, water, shampoo, Liquid chocolate, cereals, frozen vegetables, frozen fruits Capacity: 20-100g; 100-1000g; 1000-10000g, Output Speed: 600-1200 packs/hour; 1200-2400 packs/hour	Pouch Shape: 3 side seal, 4 side seal center seal quad seal side gusseted handle punch flat bottom Doy pouch zipper pouch	-		
		vi) Semi automatic bag filling machine for packaging of solid products granule, powder, ununiform shaped products	Products: rice, sugar, pulses, beans, spice powder, whole spices, recepies masala, instant drink powder. Milk powder. Confectionary, nimko, chips, pasta, microni, salt, flour, sugi, meda, cement, seeds, pecticide powder, choclate powder, frozen fries, frozen cheese, pickle paste, whole pickle, consentrate powder, joshanda, ispaghol, detergent, coffee powder, cereals, frozen vegetables, frozen fruits Capacity: 2g to 15g; 20g to 100g; 100g to 1000g; 01 kg to 05 kg; 05 kg to 10 kg; 10 kg to 50 kg; 50 kg to 100 kg Output Speed: 600~1200 packs/hour; 1200~2400 packs/hour	Pouch Shape: 3 side seal, 4 side seal center seal quad seal side gusseted handle punch Flat bottom Doy pouch zipper pouch cotton bags jute bags PP woven bags			
		vii) Automatic VFFS multilane machine for liquid & solid products	Products: rice, sugar, pulses, beans, spice powder, whole spices, recepies masala, instant drink powder. Milk powder. Confectionary, nimko, chips, pasta, microni, salt, flour, sugi, meda, cement, seeds, pecticide powder, choclate powder, frozen fries, frozen cheese, pickle paste, whole pickle, consentrate powder, joshanda, ispaghol, detergent, coffee powder Edible oils, ghee, liquid milk, lube oil, grease, juices, ketchup, mayonnaises, liquid soap, detergent, egg liquid, cosmetic creams, gel, recota cheese, water, shampoo, Liquid chocolate, cereals, frozen vegetables, frozen fruits Capacity: 02g to 05g; 05g to 20g; 20g to 100g, Output Speed: 4000~9000 packs/hour; 9000~20000 packs/hour; 20000~36000 packs/hour	Pouch Shape: 3 side seal, 4 side seal center seal			
		viii) Bottle & Jar filling machine for	Products: rice, sugar, pulses, beans, spice powder, whole spices, recepies masala, instant drink powder. Milk powder. Confectionary, nimko, chips, pasta, microni, salt, flour, sugi, meda, cement, seeds, pecticide powder, choclate powder, frozen fries, frozen cheese, pickle paste, whole pickle, consentrate powder, joshanda, ispaghol, detergent, coffee powder Edible oils, ghee, liquid milk, lube oil, grease, juices, ketchup, mayonnaises, liquid soap, detergent, egg liquid, cosmetic creams, gel, recota cheese, water, shampoo, Liquid chocolate, cereals, frozen vegetables, frozen fruits Capacity : 20-100g, 10-1000g, 01-10 kg, 10-20 kg. Output Speed: 600-1200 packs/hour 1200-2400 packs/hour 4800-7200 packs/hour				

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
762	84224000	Pharmaceutical Machines	Cream Ointment & Paste Processing and packaging machines Capacity upto 1500 Kg/Hr			FD & C (Pvt) Ltd., F -116, S.I.T.E. Karachi
763	84241000	Fire Extinguishers	Fire Extinguishers of AFFF Type Size: 10 litres (portable); 45 and 150 litres (Trolly mounted); 1000 litres (trailer mounted) Dry Powder Type Size: 1 to 12 Kg (portable); 20 to 100 Kgs (trolley mounted; 250, 500, 1000kgs (trailer mounted) Halotron-1 Type Size: 1 to 12 Kg (portable); 20 to 100 Kgs (trolley mounted); 250, 500kgs (trailer mounted) Water type Size: 1 to 12 Kg (portable); 45 & 150 litres (trolley mounted)			Haseen Habib Corporation [Pvt] Limited, 123/3 Quaid e Azam Industrial Estate, Lahore
764	84261110	Cranes	Overhead travelling cranes 0.5 tons to 300 tons Desing Code/ Standards: FEM, CMAA.			 Heavy Mechanical Complex (Pvt) Ltd., Taxila Qadbros Engineering (Pvt) Ltd., 9-A Link Ravi Road, Badami Bagh, Lahore
			•Electric Overhead Cranes •Hand Operated Cranes •Gantry Cranes •Double boom level luffing cranes. •Magnetic Crane. Ranging Capacities to Client's Requirements			Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi
765	84261990	Grantry Cranes	0.5 tons to 250 tons.			 Heavy Mechanical Complex (Pvt) Ltd. Taxila Heavy Mechanical Complex-3, Hattar Road, Taxila
766	84263000	Jib Cranes	Jib cranes upto 5 tons and monorail cranes upto 10 tons			 Heavy Mechanical Complex (Pvt) Ltd. Taxila Heavy Mechanical Complex-3, Hattar Road, Taxila
767	84264100	Catering High Loader	Catering High Loader Upto 22Ft Working Height from ground Suitable for airchraft upto Boeing 777			 Bilal Engineering Company G.T Road Opp. Rescue 1122 Office, Pindi Bypass, Gujranwala Javaid Industrial Company (JIC), Jinnah Interchange G.T. Road, Gujranwala Shaheen Tank Trailers Manufacturing Company (Pvt) Ltd., Plot #306,Wali Town Near Port Qasim Mor, National Highway Karachi.
768	84269100	Cranes, designed for mounting on road vehicles	Lift Capacity: 800, 1000, 1500, 2000, 2500 and 3000 kgs. Can be Mounted on any available local truck chassis.			 Agripak International, A - 263 Block - C, North Nazimabad, Karachi Javaid Industrial Company (JIC), Jinnah Interchange G.T. Road, Gujranwala
769	84269900	Cableways / Cable trays	Ladder Type & Perforated Type (size 100mm ~ 700mm wide)			Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000
			Ladder Type & Perforated Type with & without covers (size 50mm ~ 300mm wide)	Fiber Glass Reinforced Plastic	Corrosion Resistant	Fibre Craft Industries, Canal Bank Hanif Park, Harbanspura Lahore - 54850
770	84272010	Forklift Truck	Upto 3 tons lifting capacity			Millat Tractors, Ltd., Sheikhupura Road, Shahdara, Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
771	84283100	Conveyors, continuous-action, for goods or materials (Specially designed for underground use)	Width = 1,000 mm Length = 100 Meters BS-6318 & as per customers requirements			 SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore
772	84283200	Bucket Elevators	Bucket capacity = 0.3 cubic meters Height = 30 Meters BS-6318			SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi
773	84283300	Belt Conveyors	Width = 1,000 mm Length = 100 Meters BS-6318			SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi
774	84283910	Conveyors (for Cement plants)	Width = 1.000 mm Length = 100 Meters BS-2890 & as per customer requirements			 SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore
775	84283990	Conveyors	Width = 1,000 mm Length = 100 Meters BS-2890 & as per customer requirements			 SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore
776	84292000	Graders	50 Tons per hours	-		The Star Mughal Industries (Pvt) Ltd., Sharifpura, G.T. Road Gujranwala
777	84294000	Static Road Rollers	Static Road Rollers 10 to 12 tons Upto 55 HP			Heavy Mechanical Complex (Pvt) Ltd., Taxila
778	84295100	 Loaders, shovel, front-end, mechanical, self-propelled 	1 - 3 cub meter bucket handler tractor front end loader for Industrial and Agricultural work.	[Bucket Attachment of the Tractor used on the front Side of Tractor for the Uplifting of Garbage or Construction Disposables.]		Agripak International, A - 263 Block - C, North Nazimabad, Karachi
		ii) Front End Loaders for Tractor	loading and lifting of material	Tractor Attachment		Javaid Industrial Company (JIC), Jinnah Interchange G.T. Road, Gujranwala
779	84304100	Mud Tank/ Mud Suction Tank With Valves And Gates	Used for mud mixing Mobile/skid mounted Capacity: 100 BBL upto 600 BBL Or as per our client requirement.	Design Code: ASME Material: Carbon Steel. Internal Lining: Fibercoating/ Epoxy	Support stimulation fluids/acid upto 16%	 i) Al-Jassar Engineering Co., 3 KM from Brahama Interchange M1, Jhang Bahtar Road, Near By Multi Orchids Residencia, Islamabad. li) Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi
780	84304900	Mud Tank/ Mud Suction Tank With Valves And Gates	Used for mud mixing Mobile/skid mounted Capacity: 100 BBL upto 600 BBL Or as per our client requirement.	Design Code: ASME Material: Carbon Steel. Internal Lining: Fibercoating/ Epoxy	Support stimulation fluids/acid upto 16%	 i) Al-Jassar Engineering Co., 3 KM from Brahama Interchange M1, Jhang Bahtar Road, Near By Multi Orchids Residencia, Islamabad. Ii) Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi
781	84314900	i) Blades for Tractors	Dozing Blades for different hp of Tractors; Width: 6ft, 7ft, 8ft	Tractor Attachment	**	 Agripak International, A - 263 Block - C, North Nazimabad, Karachi Javaid Industrial Company (JIC), Jinnah Interchange G.T. Road, Gujranwala
		ii) Cutting Bottle	Capacity: 35 Cu Ft. upto 50 Cu Ft. Or as per our client requirement.	Design Code: ASME, Material: Carbon Steel, Test Pressure: 50 psig, Working Pressure: 30 psig		Al-Jassar Engineering Co., 3 KM from Brahama Interchange M1, Jhang Bahtar Road, Near By Multi Orchids Residencia, Islamabad.

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		iii) Cement Silo	Capacity: 1000 Cu Ft. upto 2000 Cu Ft. Or as per our client requirement.	Design Code: ASME, Material: Carbon Steel, Test Pressure: 45 psig, Working Pressure: 30 psig		
		iv) Surge Tank	Capacity: 35 Cu Ft. upto 50 Cu Ft. Or as per our client requirement.	Design Code: ASME, Material: Carbon Steel, Test Pressure: 50 psig, Working Pressure: 30 psig		
782	84321010	Chisel ploughs, for agricultural Machines	Ploughs for 2,3,4,5 Discs. Reversible and Standard with tubular frame. With 2 Discs: 42" With 3 Discs: 63" With 4 Discs: 84" With 5 Discs: 105"	Tractor Attachment		 Agripak International, A - 263 Block - C, North Nazimabad, Karachi Javaid Industrial Company (JIC), Jinnah Interchange G.T. Road, Gujranwala
783	84321090	Ploughs, for agricultural Machines	Ploughs for 2,3,4,5 Discs. Reversible and Standard with tubular frame. With 2 Discs: 42" With 3 Discs: 63" With 4 Discs: 84" With 5 Discs: 105"	Tractor Attachment		 Agripak International, A - 263 Block - C, North Nazimabad, Karachi Javaid Industrial Company (JIC), Jinnah Interchange G.T. Road, Gujranwala
784	84322100	Harrows, disc, for agricultural Machines	 14, 16, 18, 22 and more discs with hydraulic attachments With 14 Discs: Front 70" & Rear 65" With 16 Discs: Front 78" & Rear 70" With 18 Discs: Front 86" & Rear 78" With 22 Discs: Front 102" & Rear 94" 			 Agripak International, A - 263 Block - C, North Nazimabad, Karachi Javaid Industrial Company (JIC), Jinnah Interchange G.T. Road, Gujranwala
785	84322910	Cultivators, for agricultural Machines	5, 9, 11, 14, 19 tines with ront and fixed frame. Have an options with Tyres assembly and Hydraulic Functions With 5 Tines: 66" With 9 Tines: 86" With 11 Tines: 96" With 13 Tines: 106" With 19 Tines: 146"			 Agripak International, A - 263 Block - C, North Nazimabad, Karachi Javaid Industrial Company (JIC), Jinnah Interchange G.T. Road, Gujranwala
786	84324100	Spreaders, manure	200lit fertilizer spreaders tractor mounted, and pto operated.			Agripak International, A - 263 Block - C, North Nazimabad, Karachi
787	84328090	Machines, stone-removing, agricultural	Laser Land Leveling system consisting of: 1. Rotary laser transmitter 2. 360 degree laser receiver 3. Control Box 4. Bottomless bucket hydraulic scraper	Minimum 300 meter radius operating range Within one millimeter per 20 meter level accuracy 0 to 50 degree Celsius operating temperature Moisture and dust proof Mil.Spec. C-5015 electrical connectors		Pakistan Atomic Energy Commission, Applied Physics Division, PINSTECH, Nilore, Islamabad
788	84329000	Mouldboards for plough	2,3,4 furrows with Hydraulically Revisible and One-way Simple fabrication. For 2 Furrow: 32" For 3 Furrow: 60" For 4 Furrow: 88"			 Agripak International, A - 263 Block - C, North Nazimabad, Karachi Javaid Industrial Company (JIC), Jinnah Interchange G.T. Road, Gujranwala
789	84331100	i) lawn mower	For Cleaning and ground leveling	Tractor Attachment		 Javaid Industrial Company (JIC), Jinnah Interchange G.T. Road, Gujranwala Shaheen Tank Trailers Manufacturing Company (Pvt) Ltd., Plot #306,Wali Town Near Port Qasim Mor, National Highway Karachi.
		ii) Tree Transplanter	Digging and Trenching			Javaid Industrial Company (JIC), Jinnah
		iii) Backhoe / Excavator	Digging and Trenching	Tractor Attachment		Interchange G.T. Road, Gujranwala
790	84331900	lawn mower	For Cleaning and ground leveling	Tractor Attachment		 Javaid Industrial Company (JIC), Jinnah Interchange G.T. Road, Gujranwala Shaheen Tank Trailers Manufacturing Company (Pvt) Ltd., Plot #306,Wali Town Near Port Qasim Mor, National Highway Karachi.

5. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
791	84332000	lawn mower	For Cleaning and ground leveling	Tractor Attachment		 Javaid Industrial Company (JIC), Jinnah Interchange G.T. Road, Gujranwala Shaheen Tank Trailers Manufacturing Company (Pvt) Ltd., Plot #306, Wali Town Near Port Qasim Mor, National Highway Karachi.
92	84371000	i) Rice Husking Machine (Huller)	Output : 1200 ~ 2000kg/h of rice Power : 12 ~18.5kw 4D Huller: Output:1800-2500kg/h of rice Power : 9 ~15kw			Jamal-ud-Din Sons & Co., 44 Umer Market Link Railway Road, Near Railway Station Lahore.
		ii) Horizontal Type SM-18 Emery Roller rice Polisher	Jet-Air Emery Doll Rice Husker & Whitener: Output : 2000 ~ 2500kg/h of rice Power : 18.5 ~ 22kw			
		iii) Rice Polisher NF-14	Jet-Air Emery Roll Rice Whitener & Polisher: Output : 1500 ~ 2100kg/h of rice Power : 18.5kw			
93	84378000	i) Danish Type Vertical Flour grinder.	Vertical Type Flour & Spices Grinding Machine. (Chukki):, Output wheat:160-240kg/h of Flour, Power : 7.5kw			Jamal-ud-Din Sons & Co., 44 Umer Market Link Railway Road, Near Railway Station Lahore.
		ii) Disk Mill 45	Output wheat:200-300kg/h of Flour, Power:12kw			Jamal-ud-Din Sons & Co., 44 Umer Market Link Railway Road, Near Railway Station Lahore.
		iii) Paddy Cleaner (Pre-Cleaner)	Power: 0.75 x 2KW	Removing light & heavy impurity from Paddy		Al Karam Rice Engineering (Pvt) Ltd., 7Km Sheikhupura - Muridke Road, Near Khanna
		iv) Combi Cleaner	Power: 0.75 x 2 Kw	Removing light & heavy impurity from Rice		Labana, Muridke
		v) (Rotary/Vibrating Cleaner)	Power: 5.5 - 7.5 Kw Aspiration Capacity: 3000 - 4500 m2/h)	Paddy Hulling Removing the Rice from its peels		
		vi) Paddy Husskar	Output: 0.9 - 1.8 TPH, Air Volume: 3600 - 10800 m3/h	To separate husk from brown rice		
		vii) (Pneumatic/Double Pneumatic Husker	Sieves: 20 -40 Units, Power: 2.2 - 4 Kw	To separate paddy from brown rice		
		viii) Husk Separator/ Paddy Separator (All Type)	Cylinder: V-Wire S.S. Cyliner, No. of Cyliner: 4 - 8 Units	To separate immature grains from rice		
		ix) Thickness Grader	Power: 37 - 55 Kw, Air Volume: 40 - 80 m3/min, Static Pressure: 1.0 - 1.5 Kpa	To remove brown layer from Rice and give bright whiteness from raw rice		
		x) Width Grader	Complete Automatic Operation No of Roll: Single, Shaft Material: S.S., Control: PLC, Power: 45 - 75 Kw	To give silky shine with less brokage to rice		
		xi) Vertical Emery Roller Whitener (All Type of Rice Whitener)	Power: 4Kw, Rotating Speed: 180 - 220 RPM	To separate broken rice from head rice very efficiently		_
		xii) Water Polisher/Silky Polisher (All Type of Rice Polisher)	Power: 1.5 - 2.2 Kw, Output: 2.5 - 5 TPH	To separate rice & broken rice by the advatage of length difference		_
		xiii) Rotary Air Lock Valve Feeder	Output: 5 - 10 TPH, Power: 250 - 400 Kw	To produce high quality export rice		
		xiv) Grain Dryer (All Types)	Output: 3 - 8 TPH, Power: 150 - 250 Kw	To produce good quality raw rice for further re-processing		
		xv) Rice Processing Plant (Complete Rice Milling Unit)		To make parboiled (Sela) Rice		
		xvi) Rotary Sifter/Rice Grading Machine	Power: 1.5 TO 7.5 Kw, Low speed, Compact design, Noiseless, Vibration less	To drive the raw material (Paddy/Rice) from one machine to another		
94	84379000	i) Emery Stones	Different sizes which are 10",12",14",16",20",24",30".			Jamal-ud-Din Sons & Co., 44 Umer Market Link Railway Road, Near Railway Station Lahore.
		ii) Bucket Elevator (Belt Conveyor)	Diameter: 36 - 72 inch Material: M.S/S.S.	To collect dust from every machine by means of suction blower		Al Karam Rice Engineering (Pvt) Ltd., 7Km Sheikhupura - Muridke Road, Near Khanna

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		iii) Suction Blower (Centrifugal Fan)	Power: 0.75 - 1.5 Kw	To seal, discharge and dust catch of		Labana, Muridke
			Rotary Speed: 45 R/min	pneumatic transportation or ventilation		
				dust catch network at processing plant		
795	84383010	Sugar Plant / Equipment	Complete Sugar plants upto 12000 TCD	Mill Roller (various types) – for Sugar	Different As Per Client Requirements	1) Heavy Mechanical Complex (Pvt) Ltd., Taxila
		0 11		Mills (Local & Export Customers)	-	2) Qadbros Engineering (Pvt) Ltd., 9-A Link
						Ravi Road, Badami Bagh, Lahore
						3) Descon Engineering Limited, DESCON
						Manufacturing Business Area, 2 KM Defence
						road, Off: KM Multan Road, Chung Lahore -
						53000
						4) A.J. Corporation, 86-D, Commercial Area,
						Phase 12, DHA EME Sector, Multan Road,
						Lahore.
						5) Karachi Shipyard & Engineering Works Ltd.,
						West Wharf Dockyard P.O. Box 4419, Karachi
796	84383090	i) Diffusing apparatusfor sugar	For upto 6,000 TCD Sugar Plant			1) SEFEC Engineering (Pvt.) Ltd., 44-C, First
		extraction,	API 650, API 620, ASME Sec. VIII Div. 1			Floor, 11th Jami Commercial Street, Phase-VII,
						Defence Housing Authority, Karachi
						2) Qadbros Engineering (Pvt) Ltd., 9-A Link
						Ravi Road, Badami Bagh, Lahore
		ii) Extracting Equipment	Equipment for extraction in sugar industry: Cane Carrier. Cane	1) High extraction can crushing rollers		A.B.S Engineering Corporation (Pvt) Ltd., F-492,
			leveler. Cane cutting knives. Cane shredder Prepared cane	with hydraullic arrangement and feed		S.I.T.E, Karachi- 75700
			elevator Cane crushing mills Mill cooling water piping. Inter	rollers. 2) De- Pithers. 3) Cane		
			conveyors Service platform & gangways Receiving tanks made	Shredders upto 8000 TCD. 4) Cane		
			of mild steel & stainless	Cutters upto 5060 mm wide. 5)		
		iii) Diffusing apparatusfor sugar extraction,	As per fabrication drawings and Client's requirement. In accordance to API 650, API 620, ASME Sec VIII Div 1	Centrifugal machines. 6) Chip Board forming machines. 7) Brequetting		
797	84388090	i) Machines, cutting and rolling, for	As per fabrication drawings and Client's requirement.			A.B.S Engineering Corporation (Pvt) Ltd., F-492,
		tea ii) Agitator for sugar plants	Up to 40 Feet dia, As per Client Specification			S.I.T.E, Karachi- 75700 The Star Mughal Industries (Pvt) Ltd.,
		ii) Agitatol loi sugai plants	Up to 40 Feet that, As per Chefit Specification			Sharifpura, G.T. Road Gujranwala
798	84389010	of machines of heading 8438.3000	as per customer requirements			Qadbros Engineering (Pvt) Ltd.
		and 8438.4000				9-A Link Ravi Road, Badami Bagh, Lahore
799	84454010	Weft Pirn Winder	- Horizontal Type used for filling of bobbins for weaving			Talib Brothers Engineering Works, P-290, Sant
			process. Machine stops automatically after completion of			Singh Road, Opposite Javed Weighing Scale,
			Bobbins. The capacity is from 12 spindles to 48 Spindles.			Sheikhupura Road, Faislabad.
			- Vertical Type used for filling of bobbins for weaving process.			
			Machine stops automatically after completion of Bobbins. The			
			capacity is from 12 spindles to 48 Spindles.			
800	84454020	Cone Winders.	For the rewinding of cones in weaving mills. Machine stops			Talib Brothers Engineering Works, P-290, Sant
000	51151020	cone tradets.	automatically after completion of Process. The capacity is from			Singh Road, Opposite Javed Weighing Scale,
			06 spindles to 48 Spindles.			Sheikhupura Road, Faislabad.
801	84454090	Sectional Warping Machines	from 72" to 210" widths. For the filling of warp beams for all			Talib Brothers Engineering Works, P-290, Sant
501	0110-070	sectional traping trachines	kind of looms. Mechanical machines equipped with Auto			Singh Road, Opposite Javed Weighing Scale,
			electric warp stop motion, variable motor system. Creel capacity			Sheikhupura Road, Faislabad.
			as per requirement.			Sheharapuru Koud, Fulsidodu.
802	84462100	i) Terry Towel Drop Box Shuttle	Shuttle power loom for the Weaving of Export Quality Terry			Talib Brothers Engineering Works, P-290, Sant
		loom.	Towel products. Loom width ranging from 64" to 105".			Singh Road, Opposite Javed Weighing Scale,
		1	1		1	Sheikhupura Road, Faislabad.

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		ii) Automatic Cop Change Shuttle Loom	For weaving of Towel and Fabric. For fabric: width of loom from 44" to 126". For Towel: width of loom, from 64" to 105". The ejection of empty bobbin from shuttle and insertion of filled bobbin from magazine to shuttle is automatic.	-		
		iii) Grey Cloth Plain Shuttle Loom.	From 44" to 120" width Grey Cloth Plain Shuttle Looms used for the weaving of fabric.			
803	84463000	i) Terry Towel Rapier Loom.	With Provision of Manual and electronic Jacquard, Paper and Electronic dobby. Width of looms from 76" to 110". Shuttle less technology used for the weaving of terry towel products. Paper and Electronic dobby can be used on the loom. Up to 18 Nos frames can be operated. 4 Clours, clour selector is installed. The manual and electronic Jacquard can also be fitted on these looms.			Talib Brothers Engineering Works, P-290, Sant Singh Road, Opposite Javed Weighing Scale, Sheikhupura Road, Faislabad.
		ii) Grey Cloth Rapier Looms.	With Provision of Manual and electronic Jacquard, Paper and Electronic dobby. Grey Cloth Rapier loom. Width of looms from 56" to 134". Shuttless technology used for the weaving of fabric. Electronic and manual Jacquards are used on these looms. The Paper and Electronic dobby can also be installed.			
804	84481100	Dobbies for looms	Mechanical, used for the designing of different kind of Towel and fabric, and also used for the brand name writing on the edge of fabric. Range, from 8 lever to 22 levers, 1 cylinder to 4 cylinders in heavy and light duty.			Talib Brothers Engineering Works, P-290, Sant Singh Road, Opposite Javed Weighing Scale, Sheikhupura Road, Faislabad.
805	84483330	Spinning Ring	Any Size, Alloy bearing steal	Alloy bearing steal	Chrome plated	Punjab Spring & Engg. Works, Chak no.65, Manga Road Near Makkah Sugar Mill.
806		 Textile Spinning Ring Rubber Cots Textile Spinning simplex Rubber Cots Textile Spinning Dawing Rubber Cots 	Any Size with any Hardness with aluminium bush inside.	press fit type with aluminium bush	antistatic properties, Ozone resistance, vegetable oil resistance, abrasion resistance moisture resistance, tear resistance	Punjab Spring & Engg. Works, Chak no.65, Manga Road Near Makkah Sugar Mill.
		iv) Mesh Apron/Lattice Apron For Compact, Spinning	Any Size with, any mesh	nylon, monofilament, resistant yarn	antistatic resistance, tear resistance, abrasion resistance, moisture resistance	
807	84484210	Reeds for looms	 i) Profile / Terry Reeds Density: 3.0 d/cm to 40 d/cm, M/c width: 150 cm to 390 cm ii) Flat Reeds. Density: 3.0 d/cm to 40 d/cm, M/c width: 150 cm to 390 cm Tunnel Reeds for Air Jet looms, Flat reeds for Water Jet, Rapier, Projectile, Shuttless and Shuttle looms, Double / towel looms Circular reeds, Sizing reeds, Knotting reeds (All sizes and counts) 	i) Highest quality Stainless Steel ii) Highest quality Carbon/ Stainless Steel	i) Stainless Steel: 90% aluminum: 5% Misc: 5% ii) Carbon Stainless Steel: 90% aluminum: 5% Misc: 5%	 Textile Technics (Pvt.) Ltd., 6th Floor EFU House, Gulberg Road, Lahore Abid Industries, E-43, SITE, Karachi – 75700
808	84484290	Heald-frames for textile weaving Machines	Heald Frames for shuttless looms in all sizes		**	Abid Industries, E-43, SITE, Karachi – 75700
809	84484990	Beams and Emry Rolls	Forall types of looms and weaving machines		**	Talib Brothers Engineering Works, P-290, Sant Singh Road, Opposite Javed Weighing Scale, Sheikhupura Road, Faislabad.
810	84501290	Washing machines	Voltage: 220V AC, Net Weight Kgs: 19.60, Gross Weight Kgs: 24.00, General Operation Duration: 1-15 minutes, Frequency: 50/60 HZ, Input: 220 Volts/ 175 watts, Capacity of wash tub: 85 litres With built-in centrifugal dryer			 Wahid Industries Ltd., G. T. Road, Gujrat Dawlance (Pvt) Ltd., Dawlance Center 7/4, Civil Lines 9 Dr. Ziauddin Ahmed Road Karachi.

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
811	84501919	Washing machines	Voltage: 220V AC, Net Weight Kgs: 19.60, Gross Weight Kgs: 24.00, General Operation Duration: 1-15 minutes, Frequency: 50/60 HZ, Input: 220 Volts/ 175 watts, Capacity of wash tub: 85 litres			 Dawlance (Pvt) Ltd., Dawlance Center 7/4, Civil Lines 9 Dr. Ziauddin Ahmed Road Karachi. Wahid Industries Ltd., G. T. Road, Gujrat
812	84501999	Washing machines	Single Tub Washer			 Dawlance (Pvt) Ltd., Dawlance Center 7/4, Civil Lines 9 Dr. Ziauddin Ahmed Road Karachi. Wahid Industries Ltd., G. T. Road, Gujrat
813	84542000	Ingot Moulds and Ladles	As per customer requirements			Qadbros Engineering (Pvt) Ltd. 9-A Link Ravi Road, Badami Bagh, Lahore
814	84581100	i) CNC Lathes, horizontal, numerically controlled	Desktop CNC Lathe with X=145, Z=225, with CNC Control, Center distance 270mm, for Educational & Training Institutes	-		Pakistan Machine Tool Factory (Pvt) Limited PMTF Road, Off National Highway, Landhi, Karachi-75030
		ii) CNC Milling Machine numerically controlled	Desktop CNC Milling Machine with X=240, Y=170, Z=220, CNC Control, Table 500x160. for Educational & Training Institutes			
		iii) CNC Turning Centre numerically controlled	CNC Control, and Tool Turret. with X=190, Z=400, Swing 380mm, Center distance 450mm, for mass production			
		iv) CNC Lathe numerically controlled	CNC Control, and Tool Turret. with X=150, Z=600, Swing 365mm, Center distance 700mm, for Production and Educational purpose			
815	84581900	Lathes, horizontal, Precision type with and without DRO	Precision Centre Lathe Centre distance upto 1500 mm			Pakistan Machine Tool Factory (Pvt) Limited PMTF Road, Off National Highway, Landhi, Karachi-75030
816	84592910	Machine-tools, Drilling by removing metal, not numerically Controlled	 i) Universal Drilling Machine with Drilling capacity upto 32mm & boring capacity upto 65 mm in Cast Iron ii) Pillar Drilling Machine with Drill Capacity upto 20 mm in Steel 			Pakistan Machine Tool Factory (Pvt) Limited PMTF Road, Off National Highway, Landhi, Karachi-75030
817	84593100	Machine-tools, boring Milling by removing metal, (Numerically Controlled)	Modular boring Heads, 02 ways & 4 ways configuration. Drilling Capacity 32 mm in Cast Iron & 25mm In steel.			Pakistan Machine Tool Factory (Pvt) Limited PMTF Road, Off National Highway, Landhi, Karachi-75030
818	84593910	Machine-tools, boring by removing metal	Vertical Copy Milling, Drilling boring Machine Drill Dia 25 mm			Pakistan Machine Tool Factory (Pvt) Limited PMTF Road, Off National Highway, Landhi, Karachi-75030
819	84595100	Machine-tools, Milling by removing metal, numerically controled	Desktop PC Based for Educational & Training Institutes Milling Machine, Knee Type Numerically Controlled			Pakistan Machine Tool Factory (Pvt) Limited PMTF Road, Off National Highway, Landhi, Karachi-75030
820	84595910	Machine-tools, Milling by removing metal, knee-type,	Knee Type Milling Machine Horizontal, Vertical & Universal Version with long Traverse upto 810 mm and table size upto 1300x300 mm			Pakistan Machine Tool Factory (Pvt) Limited PMTF Road, Off National Highway, Landhi, Karachi-75030
821	84596910	Machine-tools, Milling by removing metal, not numerically controled	Turret Milling Machine (Bridge Port Type) Travels long. 750, Cross 300, Vert. 400 mm			Pakistan Machine Tool Factory (Pvt) Limited PMTF Road, Off National Highway, Landhi, Karachi-75030
822	84596920	Machine-tools, Milling by removing metal, not numerically controled	Universal Engraving Machine Clamp Area 500x200 mm Pantograph ratio 1:1 to 1:50			Pakistan Machine Tool Factory (Pvt) Limited PMTF Road, Off National Highway, Landhi, Karachi-75030

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
823	84615010	i) Hack Sawing Machine	Diemension of Saw Blade 450x32x1.6x10mm, Round Bar Dia 180mm, Squar Bar 160x160mm, Flat 180mm, Stoke 160mm	Stoke 160 mm		Pakistan Machine Tool Factory (Pvt) Limited PMTF Road, Off National Highway, Landhi, Karachi-75030
		ii) Band Sawing Machine	Band Speed 16-30-52-98 m/min, Blade Size16"x1 1/4" x0.042" 4876,8 x 31.75x1mm, Size 2430x700x1180 mm, weight 700 kg			Pakistan Machine Tool Factory (Pvt) Limited PMTF Road, Off National Highway, Landhi, Karachi-75030
824	84642090	Polishing Machines				Smart Power Systems (Pvt) Ltd., Near Super Highway,Ashanabad Industrial Area Karachi.
		Diamond Wire Saw Stone Cutting Machine	Diamond Wire Linear Speed 30-50 m/Sec, Feed 300-1000 mm/min, length of Rail 2-3 meter, size 880x800x730, weight 650kg to 2000 kg, Flywheel die meter 405mm to 1000 mm	- D75 HP, D50 HP, D25 HP		Pakistan Machine Tool Factory (Pvt) Limited PMTF Road, Off National Highway, Landhi, Karachi-75030
		Down the Hole Drilling	Hight/Width max 2870 x 680mm, Rotation speed max 70rpm, Hammer up/down 5m/min, Drilling Depth max, 15m, Hammer and Road Diameter Max 90mm, Air Consumption 5100 L/m, Supply Pressure 6-7 bar, Machine Weight 160 kg	- Drilling Depth 15 m		
		Air Pillow Plant	Machine Tools for working stone, ceramics concrete asbestos- cement			
825	84659110	Machine-tools, sawing, for working wood/ cork/ hard rubber	Blade Length not exceeding 45.7 cm			Pakistan Machine Tool Factory (Pvt) Limited PMTF Road, Off National Highway, Landhi, Karachi-75030
826	84713010	Desktop Computer	With all Intel AMD Processor			OneApple International Corporation Plot # 12 Sector 24• Main Korangi Road, Sector 24, Karachi
827	84713020	i) Mini PC Barebone	Mini Pc barebone without processor, Ram, HDD with 7 th & 8 th Generation motherboard	-		OneApple International Corporation Plot # 12 Sector 24 Main Korangi Road, Sector
		ii) All in One Computer	All in one computer with Intel & AMD all type of processor including DDR3 & DDR4 ram screen size 18.5", 19.5", 21.5", 27", 32"			— 24, Karachi
828	84715000	SNMP to MODBUS Protocol Converter	Intelligent SNMP Master to MODBUS Slave converter specially tailored to suit telecom requirement where remort monitoring of Ethernet/SNMP enabled devices is required over standard MODBUS interface. Used for monitoring of large rectifires, UPS & environment equipment in data centers. Operating Voltage Range: 12-35Vdc. Power Consumption: < 3 watts. SNMP Manager Port: Standard Ethernet Interface. MODBUS Slave Port: RS485. Baud Rate: upto 115200 bps (default: 9600bps). Connector (for configuration): USB	Enclosure: ABS Plastic. Mounting Style: Din Rail / Panel Mount Dimensions: 90x115x40 mm. Weight: 150g		SalTec Powerlink, 1-A/2, Sector 15, Korangi Industrial Area, Karachi
829	84716010	Wired Keyboard	Wired keyboard in PS/2, USB port			OneApple International Corporation Plot # 12 Sector 24• Main Korangi Road, Sector 24, Karachi
830	84716020	Mouse	Mouse in PS/2, USB port			OneApple International Corporation Plot # 12 Sector 24 Main Korangi Road, Sector 24, Karachi
831	84732100	Biometric Time Attendance Control Solution				Digitec Systems, Plot No. 178, Sector-24, Korangi Industrial Area, Karachi.

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company	Annex-I (Final List)
832	84741010	Cement Plant/ equipment /Machines, screening, for earth, stone,	Chain Cleats, End Carriage, Steel Mandrills, Kiln Supporting Structures, Clinker Dryer Shell, Apron Feeder, Screw Conveyors, Air Slide Conveyors, Pan Conveyor, Bucket Elevators, Chain Conveyors, Dust Collectors, Dust Chamber, Cyclones, Hoppers / Silos, Clinker Cooler's Supporting Structure, Kiln shell, M.S Pans, Fabrication of vertical grinding Mill (VR-7), Grate Coolers, Electrostatic Precipitators for Kiln & Cooler de-dusting up gradation	For Cement Plants of upto 3500 TONS/DAY AISI	-	 Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 Qadbros Engineering (Pvt) Ltd., 9-A Link Ravi Road, Badami Bagh, Lahore A.J. Corporation 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore. Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi 	
833	84741020	Machines, screening, for earth, stone,	For Cement Plants of upto 3500 TONS/DAY AISI	**		SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi	
834		Machines, grinding / crushing, for earth, stones,	For Cement Plants of upto 3500 TONS/DAY AISI			 SEFEC Engineering (Pvt.) Ltd., 44-C, First Floor, 11th Jami Commercial Street, Phase-VII, Defence Housing Authority, Karachi Qadbros Engineering (Pvt) Ltd., 9-A Link Ravi Road, Badami Bagh, Lahore A.B.S Engineering Corporation (Pvt) Ltd., F- 492, S.I.T.E, Karachi- 75700 	
835	84742090	Machines, crushing, for earth, stone,	As per fabrication drawings and Client's requirement.			 A.B.S Engineering Corporation (Pvt) Ltd., F- 492, S.I.T.E, Karachi- 75700 Qadbros Engineering (Pvt) Ltd., 9-A Link Ravi Road, Badami Bagh, Lahore 	
836		i) Machines, agglomerating, for mineral products	Two three phase separators, absorption tower columns wall thickness upto 120 mm, process reactors wall thickness up to 120 mm, pressure vessels based on ASME codes, tubular heat exchangers tema standards, tubular condensers TEMA standards, plain / fin tube air collar , LPG storage tanks base on ASME codes , Oil storage tanks base on API codes , Heat recovery boilers, steel structures, process & utilities piping off ,site utilities, Gas sweetening unit ,Amine absorption unit, Gas dehydration unit, Glycol dehydration plant, Flare Stack system, LPG recovery unit, Sulphur recovery unit.			 Petrosin Ravi Industries Ltd., Shahra-i- Pakistan Kala Shah Kakoo G.T Road Lahore Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 	
		ii) Storage Tanks/Pressure Vessels	Reservoirs, Tanks, Road Tankers, Deaerator Tanks, Feed Water Tanks, Clarified Tanks, Underground Tanks, Skid Mounted Fuel Tank Capacity: as per our client requirement.	Design Code: API 650 / ASME Material: Carbon Steel Internal Lining: Fibercoating/Epoxy	Support stimulation fluids/acid upto 16%	 Al-Jassar Engineering Co., 3 KM from Brahama Interchange M1, Jhang Bahtar Road, Near By Multi Orchids Residencia, Islamabad. Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi 	
837	84749020	Parts of Cement plant	Cement plant upto 4000 TPD			 Heavy Mechanical Complex (Pvt) Ltd., Taxila Qadbros Engineering (Pvt) Ltd., 9-A Link Ravi Road, Badami Bagh, Lahore 	
838		Room Air Coolers	Power source: 220 CV/230V, 50 Hz, Fan Speed: High 1350 RPM, Low 1150 RPM, Water Tank Capacity: 60 litres, Net weight: 45.50 Kg, Gross wieght: 49.50 Kg			Wahid Industries Ltd., G. T. Road, Gujrat	
839	84798290	i) Pharmaceutical Machines	Mixer/ Blenders Capacity upto 5.0 tons/ hr			FD & C (Pvt) Ltd., F -116, S.I.T.E. Karachi	

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		 ii) Gas / Fuel Conditioning Skids Instrument Gas Scrubber Skid Sour Gas Conditioning Skid Scrubbers Filters 	Stainless Steel, Carbon Steel, Alloy Steel & as per customer requirements			 DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan A.J. Corporation 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore.
840	84798990	i) Pig Launcher/ Reciever	As per requirement	-	-	 Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan
		ii) Dehumidifiers/ Desiccant Dehumidifier	De-humidifying capacity: (50L/day to 120 L/day) CFM (Process Air) : 100 to 200			Sabro Technologies (Pvt) Ltd., Plot No. 270, Industrial Triangle Kahuta Road Islamabad
		iii) 2 and 3 Phase Separators (Test & Production)	60 MMSCFD & as per customer requirements	**		 DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan
		iv) Pharmaceutical Machines	 i) Cream Ointment & Paste Processing and packaging machines, Capacity upto 1500 Kg/Hr ii) Tablet Processing Machines (i) Wet Granulator & Kneader Capacity upto 1 ton/ batch (ii) Dryer Capacity upto 1 ton/ batch (iii) Milling and wet/ dry sizer Capacity upto 800 Kg/hr (iv) Sifter and Sever Capacity upto 500 Kg/Hr 			FD & C (Pvt) Ltd., F -116, S.I.T.E. Karachi
		 v) Gas / Fuel Conditioning Skids Instrument Gas Scrubber Skid Sour Gas Conditioning Skid Scrubbers Filters 	Stainless Steel, Carbon Steel, Alloy Steel & as per customer requirements			 DDFC (Pvt.) Ltd., 27 KM, Multan Road, Lahore Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan A.J. Corporation 86-D, Commercial Area, Phase 12, DHA EME Sector, Multan Road, Lahore.
341	84799010	Evaporative Cooling Pad	H(mm)=2000 & 1000 W(mm)=600 D(mm)=150,100	Brown Clour, Water Absorbing, Paper Product Bear High Pressure i-e air	Does not affected by Acids Bases, impregnated by phenolic thermosetting resin, protected from fungi bacteria	Superkool (Pvt) Limited, Opposit Haji Park Sialkot Bypass near Beacon House School, Gujranwala.
342	84799090	Vacuum Pans for sugar mills	120 Tons Strike Cap. For Sugar Mills			 The Star Mughal Industries (Pvt) Ltd., Sharifpuraa, G.T. Road Gujranwala Qadbros Engineering (Pvt) Ltd., 9-A Link Ravi Road, Badami Bagh, Lahore
343	84807900	Graphite Mould & Handle for Exothermic Welding	NTDC-WAPDA P-114:82			Shaheen Traders, 1-KM Abu Bakar Road, Near Saggian Flyover, Ring Road, Lahore
344	84813000	i) Check Valves	i) Cast Steel Check Valves Flanged 2" to 18" (excluding valves complying with valid API 6D ans NACE compliance)	As per API - 600	ASTM-A 216 WCB	Popular Pipe Fitting Manufacturers 24-Shalamar Town Lahore
			ii) B.S. 5153; upto 24" dia (excluding valves complying with valid API 6D ans NACE compliance)	Cast Iron	Grade 14 Mechanite Type GD	Ghulam Mohi-ud-Din & Sons, 6 Rehman Gali, Railway Road, Lahore
			iii) ANSI B 16.5; upto 24" dia (excluding valves complying with valid API 6D ans NACE compliance)	Cast Steel/ Carbon Steel	A216 GrWCB	

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		ii) Non Return Valves also known as Check Valves.	 (a) Swing Type: Sizes: 1-1/2" to 24", Standard: BS 5153 & BS 4090 & BS 12334. JIS 10K, JIS 16K, Class 125 & Class 150 (b) Wafer Type: Sizes: 1-1/2" to 24", Standards: BS 5155 & BS 593, JIS 10K, JIS 16K (c) Lift Check Valve (Spring Loaded): Sizes: 1-1/2" to 24", Standards: DIN 3230 & EN 558, JIS 10K, JIS 16K (Excluding of API, ANSI, & NACE Certification) 	Pressure rating: PN-10 & PN-16, PN-25 & Class 125 & Class 150 Temp. rating: Upto 200°C, upto 350°C, Pressure rating: PN-10 & PN-16, Temp. rating: Upto 200°C, Upto 350°C, Pressure rating: PN-10, PN-16, PN-25, Temp. rating: Upto 200°C, Upto 350°C	Cast Iron GG25, Ductile Iron EN-JS- 1050, Nodulor Iron GGG40.3	SAFCO (Scon Valves), 1st Floor, Asif Chambers, 14-A, Davis Road, Lahore
845	84814000	i) Air Relief Valves	Kinetic: upto 24" dia (Excluding valves with NACE compliance, Alloy Steel and with valid API 6A & 6D certification except those under PCT 7306.1000)	Cast Iron	Grade 14 Mechanite Type GD	Ghulam Mohi-ud-Din & Sons, 6 Rehman Gali, Railway Road, Lahore
		 ii) Safety shut off valve Model # LA/BP250 iii) Safety shut off valve Model # LA/TR-507 	LFC-968 / LFC-969	-		Alsons Industries (Pvt) Ltd., S-18, S.I.T.E., Karachi
846	84818090	i) Gate Valves/ Sluice Valves	 i) B.S.S. 5163, 5150, 3464, 1218, AWWA C-500; upto 24" dia [Excluding Critical Downhole valves with NACE compliance, Alloy Steel and with valid API 6A & 6D certification except those under PCT 7306.1000] 	Cast Iron	Grade 14 Mechanite Type GD	Ghulam Mohi-ud-Din & Sons, 6 Rehman Gali, Railway Road, Lahore
			ii) ANSI B 16.5; upto 24 " dia [Excluding valves with NACE compliance, Alloy Steel and with valid API 6A & 6D certification except those under PCT 7306.1000]	Cast Steel/ Carbon Steel	A216 GrWCB	
			iii) Cast Steel Gate Valves Flanged OS & Y Type Solid Wedge.2" to 18" (excluding valves with NACE compliance)	As per API - 600	ASTM-A 216 WCB	Popular Pipe Fitting Manufacturers, 24-Shalamar Town Lahore
			iv) PN1.6, DN 50, 65, 80, 100, 125, 150, 250, PN10, DN 50, 100, 150, 250, 300, PN2.5, DN 20, 25, 50, 65, 80, 100, 200, 250, PN4.0, DN 50, 80, 100, 125, 150			
		ii) C.I. Gate Valves	 i) Cast Iron Gate Valves Flanged 2" to 20" ii) Cast Iron Globe Valves Flanged 2" to 14" iii) Cast Iron Check Valves Flanged 2" to 16" 		Grey Cast Iron	
		iii) C.I. Rubber Diaphragm Valves	Cast Iron Rubber Diaphragm Valves 2" to 10"		Grey Cast Iron	
		iv) Globe Valves	Cast Steel Globe Valves Flanged 2" to 14" (excluding valves complying with NACE)		ASTM-A 216 WCB	
		v) Stop Valves	PN 10, DN 25, PN 1.6, DN 20, DN 10 PN 10,			
		vi) Gate Valve, Rising Stem (OS&Y) & Non Rising Stem also known as SLUCE Valve.	Sizes: 2" to 24"- Standards: BS 5150 & EN 1171, Class 125, JIS 10K, JIS 16K, Class 150 & DIN 3352-1 (PN10) (Excluding of API, ANSI, & NACE Certification)	Pressure rating: PN-10 & PN-16, PN-25 & Class 125 & Class 150 Temp. rating: Upto 200°C, Upto 350°C	Cast Iron GG25, Ductile Iron EN-JS- 1050, Nodulor Iron GGG40.3	SAFCO (Scon Valves), 1st Floor, Asif Chambers, 14-A, Davis Road, Lahore
		vii) Globe Valve, also known as Steam Valve.	Sizes: 1/2" to 24"- Standards: DIN 3230 & EN 558 & JIS 10K, JIS 16K, Class 150 & Class 125 (Excluding of API, ANSI, & NACE Certification)	Pressure rating: PN-16, PN25 & Class 125 & Class 150, Temp. rating: Upto 200°C, Upto 350°C	Cast Iron GG25, Ductile Iron EN-JS- 1050, Nodulor Iron GGG40.3	
		viii) Strainer Valve also known as (Filter).	Sizes: 2" to 24" (Excluding of API, ANSI, & NACE Certification)	Pressure rating: PN-16, PN-25, Temp. rating: Upto 200°C, Upto 350°C	Cast Iron GG25, Ductile Iron EN-JS- 1050, Nodulor Iron GGG40.3	
		ix) Double Regulating Valve also known as Balancing Valve & Combination Flow Regulating Valve & Circuit Setter Valve	Sizes: 2-1/2" to 12"- Standards: BS 5152 & EN 13789 (Excluding of API, ANSI, & NACE Certification)	Pressure rating: PN-16, PN-25, Temp. rating: Upto 200°C, Upto 350°C	Cast Iron GG25, Ductile Iron EN-JS- 1050, Nodulor Iron GGG40.3	
		x) Butterfly Valve (Wafer Type)	Sizes: 2" to 24"- Standards: BS 5155 & EN 558 & DIN 3202 & EN 593 & Class 125 & Class 150, & JIS 10K, JIS 16K (Excluding of API, ANSI, & NACE Certification)	Pressure rating: PN-10 & PN-16, Temp. rating: Upto 200°C, Upto 350°C	Cast Iron GG25, Ductile Iron EN-JS- 1050, Nodulor Iron GGG40.3	
		xi) Service Valve Lock Wing Type	3/4"x1/2" with insulated Union	Elongation 30%, Breaking load 21132.8 kg	ASTM A-126, C-3.45%, Si-1.88%, Mn-0.50	Sindh Standard Engineering Works, F-713-A, S.I.T.E, Metrovill, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
847	84821000	 i) UC Bearing (UC204 upto UC216) ii) Ball Bearing (6200ZZ/2RS upto 6218ZZ/2RS, 6300ZZ/2RS upto 6318ZZ/ 2RS, 6403ZZ/2RS upto 6418 				Maryam Bearing Industries, 22 KM Sheikhupura Road, Mouza Khanpur, Nabipura Freozawala
848	84822000	Tapered Roller Bearing	30202 upto 30222, 30302 upto 30322 32203 upto 32222, 32303 upto 32322 11590/11520 upto 738249/ 7380248, 48548, 67048, 25590, 11949 etc	-		Maryam Bearing Industries, 22 KM Sheikhupura Road, Mouza Khanpur, Nabipura Freozawala
849	84823000	Spherical Roller Bearing	22205 upto 22222 22308 upto 22322			Maryam Bearing Industries, 22 KM Sheikhupura Road, Mouza Khanpur, Nabipura Freozawala
850	84832000	 i) Cylindirical Self Lubricating bushes ii) Flange Self Lubricating bushes iii) Spherical Self Lubricating bushes iv) Spherical Self Lubricating bushes 	Used in Home Appliances (Fans, Washing Machines etc.), Door Closers, Weaving Machines and other misc. equipments. As per company / customers requirements	$\begin{split} &\text{ID} = 6 - 50 \text{ mm}, \text{OD} = 9 - 60 \text{ mm}, \\ &\text{Length} = 6 - 50 \text{ mm}, \text{Hardness in 0-90} \\ &\text{HRB} \\ &\text{ID} = 6 - 40 \text{ mm}, \text{OD} = 12 - 50 \text{ mm}, \\ &\text{Length} = 6 - 50 \text{ mm}, \text{Flange Dia} = 14 - 60 \text{ mm}. \text{Flange Height} = 2 - 5 \text{ mm}, \\ &\text{ID} = 6 - 40 \text{ mm}, \text{OD} = 12 - 50 \text{ mm}, \\ &\text{Length} = 6 - 50 \text{ mm}, \text{Flange Dia} = 40 \text{ mm max}, \\ &\text{Hardness in 0-90 HRB} \end{split}$	 (a) Iron = Balance, Copper = 12 - 18% (b) Iron = Balance, Copper = 0 - 2%, Carbon = 0 - 0.6% (c) Copper = Bal., Tin = 8.5-9.5% (d) Copper = Bal., Iron <= 25%, Tin = 6.5-7.5%, Carbon <= 0.8% 	Adamjee Engineering (Pvt.) Ltd., Plot No. 1 & 16, Sector 20, Korangi Industrial Area, Karachi
851	84833020	Bearings, Plain Shafts, excluding carbon or graphite.	Self Lubricating, Sintered bearings. ID : 40mm, OD : 50mm, Lengths : 65mm	Cylindrical, Flanged and Spherical.	97% Iron & 3% Copper, 80% Iron & 20% Copper, 80% Copper and 20% Iron and 100% Bronze.	Adamjee Engineering (Pvt.) Ltd., Plot No. 1 & 16, Sector 20, Korangi Industrial Area, Karachi
852	84833090	 i) Cylindirical Self Lubricating bushes ii) Flange Self Lubricating bushes iii) Spherical Self Lubricating bushes iv) Spherical Self Lubricating bushes 	Used in Home Appliances (Fans, Washing Machines etc.), Door Closers, Weaving Machines and other misc. equipments. As per company / customers requirements	ID = 6 - 50 mm, OD = 9 - 60 mm, Length = 6 - 50 mm, Hardness in 0-90 HRB ID = 6 - 40 mm, OD = 12 - 50 mm, Length = 6 - 50 mm, Flange Dia = 14 - 60 mm, Flange Height = 2 - 5 mm, ID = 6 - 40 mm, OD = 12 - 50 mm, Length = 6 - 50 mm, Flange Dia = 40 mm max, Flange Height = 35 mm max, Hardness in 0-90 HRB	 (a) Iron = Balance, Copper = 12 - 18% (b) Iron = Balance, Copper = 0 - 2%, Carbon = 0 - 0.6% (c) Copper = Bal., Tin = 8.5-9.5% (d) Copper = Bal., Iron <= 25%, Tin = 6.5-7.5%, Carbon <= 0.8% 	Adamjee Engineering (Pvt.) Ltd., Plot No. 1 & 16, Sector 20, Korangi Industrial Area, Karachi
853	84834090	Gears, power transmission	Ring, spiral bevel, spur, shafts & couplers	Hardened and carburized	Various grades of mild steel	 Millat Equipment Ltd., 10 KM, Raiwind Road Lahore Pakistan Machine Tool Factory (Pvt) Limited, PMTF Road, Off National Highway, Landhi, Karachi-75030
854	85011000	AC Synchronous Moving Motor	Upto 7 Watt	Metal body		Khawaja Adhesive Tapes (Pvt) Ltd., 4-H, Gulberg-III, Lahore
855	85013100	DC Connector with O/P power of not exceed 12 kw	4.5-12 kw	DC O/P Generator		Alpine Industrialcon (Pvt) Ltd., 305/2, G.T. Road, Baghbanpura, Lahore
856	85014010	Single Phase Squirrel cage electric induction motors	200V-240V, 50HZ, Range : 0.5 HP (0.37KW) to 2HP (1.5KW)			MECO (Pvt) Ltd., Peco Road, Kot Lakhpat, Lahore
857	85014090	Single Phase Squirrel cage electric induction motors	200V-240V, 50HZ, Range : 0.5 HP (0.37KW) to 2HP (1.5KW)			MECO (Pvt) Ltd., Peco Road, Kot Lakhpat, Lahore
858	85015190	 i) 3-Phase Vertical hollow shaft electric motors. 	380V-480V, 50/60 Hz Range : 10HP (7.5Kw) to 220Hp (164Kw)			MECO (Pvt) Ltd., Peco Road, Kot Lakhpat, Lahore
		ii) Electric Motors (Low Voltage Induction Motors)	Horizontal, Vertical, Solid Shaft & Hollow Shaft Motors. 3 phase squirrel cage Induction motor excluding flame proof motors, Range 0.55KW to 355KW Efficiency Class IE1 & IE2	-	-	KSB Pumps Company Limited, 16/2, Sir Agha Khan Road, Lahore
859	85015210	Submersible Electric Motors of Stainless Steel	Range (4 KW to 75 KW), 3-Phase, 380-415V 50/60Hz and 6 - Inch, 8 - Inch, NEMA Standard	Water/ Oil Cooled, Rewindable Stator	Stainless Steel AISI-304	Komax Pvt Ltd., Plot No. 722, Sunder Industrial Estate, Raiwind Road, Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
860	85015310	Electric Motors (Low Voltage Induction Motors)	Horizontal, Vertical, Solid Shaft & Hollow Shaft Motors. 3 phase squirrel cage Induction motor excluding flame proof motors, Range 0.55KW to 355KW Efficiency Class IE1 & IE2	-	-	KSB Pumps Company Limited, 16/2, Sir Agha Khan Road, Lahore
861	85015320	Submersible Electric Motors of stainless steel	Range From 30 kW (40 HP) to 130 kW (175HP),220/380/460 Volts, 50Hz/60 Hz, 2-Pole/4-Pole, 8-inch NEMA Standard.	Water/ Oil Cooled, Rewindable Stator	Stainless Steel AISI 304	Komax Pvt Ltd., Plot No. 722, Sunder Industrial Estate, Raiwind Road, Lahore
862	85016100	Diesel Power Generting Set	750 KVA	Sound Proof		Smart Power Systems (Pvt) Ltd., Near Super Highway,Ashanabad Industrial Area Karachi.
863	85021120	Diesel Power Generating Sets	Of an output of above 5KVA but not exceeding 20 KVA	-		 Gresham's Eastern (Pvt) Limited, F-302, S.I.T.E, Karachi General Electromax Company, 11-Km Jaranwala Road, Near Nazir CNG, Lahore The Imperial Electric Co. (Pvt) Ltd., 28- Egerton Road, Lahore Power Vision Systems (Pvt) Ltd., 16KM, Multan Road, Pakka Mile Stop Shahpur Kanjran, Lahore Millat Tractors Ltd., Sheikhupura Road, P.O.Box 12023, Shahdra Lahore Synergy Corporation, A-16, Sector 6-F, Mehran Town, Korangi Industrial Area, Karachi Iman Group, Plot No. 227, St No. 7, Sector I- 9/2 Industrial Area, Near Dry Port Islamabad Advance Electronics International, L/21-D, Block-21, F.B. Industrial Area, Rashid Minhas Road, Karachi – 75700
864	85021130	Diesel Power Generating Sets	Of an output of above 20KVA but not exceeding 50 KVA			 Gresham's Eastern (Pvt) Limited, F-302, S.I.T.E, Karachi General Electromax Company, 11-Km Jaranwala Road, Near Nazir CNG, Lahore The Imperial Electric Co. (Pvt) Ltd., 28- Egerton Road, Lahore Power Vision Systems (Pvt) Ltd., 16KM, Multan Road, Pakka Mile Stop Shahpur Kanjran, Lahore Millat Tractors Ltd., Sheikhupura Road, P.O.Box 12023, Shahdra Lahore Synergy Corporation, A-16, Sector 6-F, Mehran Town, Korangi Industrial Area, Karachi Iman Group, Plot No. 227, St No. 7, Sector I- 9/2 Industrial Area, Near Dry Port Islamabad Advance Electronics International, L/21-D, Block-21, F.B. Industrial Area, Rashid Minhas Road, Karachi – 75700

S. No. PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
865 85021190	Diesel Power Generating Sets	Of an output of above 50KVA but not exceeding 75 KVA 20 KW - 75 KW Diesel Daewoo, Perkins, Peugeot	**	**	 Gresham's Eastern (Pvt) Limited, F-302, S.I.T.E, Karachi General Electromax Company, 11-Km Jaranwala Road, Near Nazir CNG, Lahore The Imperial Electric Co. (Pvt) Ltd., 28- Egerton Road, Lahore Power Vision Systems (Pvt) Ltd., 16KM, Multan Road, Pakka Mile Stop Shahpur Kanjran, Lahore Millat Tractors Ltd., Sheikhupura Road, P.O.Box 12023, Shahdra Lahore Synergy Corporation, A-16, Sector 6-F, Mehran Town, Korangi Industrial Area, Karachi Iman Group, Plot No. 227, St No. 7, Sector I- 9/2 Industrial Area, Near Dry Port Islamabad Advance Electronics International, L/21-D, Block-21, F-B. Industrial Area, Rashid Minhas Road, Karachi – 75700
866 85021200	Diesel Power Generating Sets	Of an output of above 75KVA but not exceeding 375 KVA			 Gresham's Eastern (Pvt) Limited, F-302, S.I.T.E, Karachi General Electromax Company, 11-Km Jaranwala Road, Near Nazir CNG, Lahore The Imperial Electric Co. (Pvt) Ltd., 28- Egerton Road, Lahore Power Vision Systems (Pvt) Ltd., 16KM, Multan Road, Pakka Mile Stop Shahpur Kanjran, Lahore Millat Tractors Ltd., Sheikhupura Road, P.O.Box 12023, Shahdra Lahore Synergy Corporation, A-16, Sector 6-F, Mehran Town, Korangi Industrial Area, Karachi Iman Group, Plot No. 227, St No. 7, Sector I- 9/2 Industrial Area, Near Dry Port Islamabad Advance Electronics International, L/21-D, Block-21, F.B. Industrial Area, Rashid Minhas Road, Karachi – 75700

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company	Annex-I (Fina
867	85021310	Diesel Power Generating Sets	Of an output of above 375KVA but not exceeding 1100 KVA			 Gresham's Eastern (Pvt) Limited, F-302, S.I.T.E, Karachi General Electromax Company, 11-Km Jaranwala Road, Near Nazir CNG, Lahore The Imperial Electric Co. (Pvt) Ltd., 28- Egerton Road, Lahore Power Vision Systems (Pvt) Ltd., 16KM, Multan Road, Pakka Mile Stop Shahpur Kanjran, Lahore Power Vision Systems (Pvt) Ltd., 16KM, Multan Road, Pakka Mile Stop Shahpur Kanjran, Lahore Millat Tractors Ltd., Sheikhupura Road, P.O.Box 12023, Shahdra Lahore Synergy Corporation, A-16, Sector 6-F, Mehran Town, Korangi Industrial Area, Karachi Iman Group, Plot No. 227, St No. 7, Sector I- 9/2 Industrial Area, Near Dry Port Islamabad Advance Electronics International, L/21-D, Block-21, F.B. Industrial Area, Rashid Minhas Road, Karachi – 75700 Smart Power Systems (Pvt) Ltd., Near Super Highway,Ashanabad Industrial Area Karachi. 	
868	85021390	Diesel Power Generating Sets	Of an output of above 1100KVA but not exceeding 1250 KVA	**		 Gresham's Eastern (Pvt) Limited, F-302, S.I.T.E, Karachi General Electromax Company, 11-Km Jaranwala Road, Near Nazir CNG, Lahore The Imperial Electric Co. (Pvt) Ltd., 28- Egerton Road, Lahore Synergy Corporation, A-16, Sector 6-F, Mehran Town, Korangi Industrial Area, Karachi Iman Group, Plot No. 227, St No. 7, Sector I- 9/2 Industrial Area, Near Dry Port Islamabad Advance Electronics International, L/21-D, Block-21, F.B. Industrial Area, Rashid Minhas Road, Karachi – 75700 	
869		Generating Sets with spark- ignition internal combustion piston engines	Above 5KVA to 1250 KVA			 Gresham's Eastern (Pvt) Limited, F-302, S.I.T.E, Karachi Advance Electronics International, L/21-D, Block-21, F.B. Industrial Area, Rashid Minhas Road, Karachi – 75700 	
870	85022090	Genertors Fabrication ATS Panal	375 KVA but not exceeding 1100 KVA			Smart Power Systems (Pvt) Ltd., Near Super Highway, Ashanabad Industrial Area Karachi.	
871		 i) Carbon Seal (Mechanical) ii) Carbon Ring (Electrical) iii) Carbon Vane Plate (Mechanical) 	Carbon Graphite	Mechanical	Various	Flecbon Corporation, OT 204, 2nd Floor, Techno City Office Tower, Hasrat Mohani Road, Off. I.I. Chundgrigar Road, Opp. Uni Plaza, P.O. Box 6123, Karachi	
872	85042100		 i) Liquid dielectric distribution transformers with power handling capacity 5 kVA to 650 kVA and voltages 230V to 132000V. Rating use at nominal system voltage upto 145000V and current rating upto 6000A. 			Validus Engineering (Pvt) Ltd., B-72, Estate Avenue, SITE, Karachi-75700	

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
			 ii) Distribution Transformers (Pole Mounted) Capacity: 10 KVA to 630 KVA 11 KV/ 415 Volt Step Down 33 KV/ 415 Volt Step Down 11 KV / 420 Volt Step Down iii) Pad Mounted Transformer (Kiosk) Capacity: 63 KVA (Single Phase), 100 KVA, 200 KVA, 400 KVA & 630 KVA (3-Phase) with H.V. & L.V. Panels (Step Down) 			 Transfopower Industries (Private) Limited, 2 Km, Katar Bund Road, Off. Multan Road, Thokar Niaz Beg, Lahore Elmetec (Pvt) Ltd., 19 KM Ferozepur Road, Lahore
873	85042200	i) Transformers	Liquid dielectric distribution transformers with power handling capacity exceeding 650 KVA but not exceeding 10,000 KVA and voltages 230V to 132000V. Rating use at nominal system voltage upto 145000 volts and current upto 6000 Amps			 Validus Engineering (Pvt) Ltd., B-72, Estate Avenue, SITE, Karachi-75700 Elmetec (Pvt) Ltd., 19 KM Ferozepur Road, Lahore
		ii) Power Transformers / Furnance Transformers/ Special Transformers	Power Transformers - Capacity: 750 KVA to 5000KVA - 11 KVA/ 415 Volt Step Down - 33 KV / 415 Volt Step Down - 11 KVA/ 420 Volt Step Down Furnance Transformers - Upto 5000KVA - Specific requirement of the Customers Specific requirement of the Customers - Upto 5000KVA - Specific requirement of the Customers			Transfopower Industries (Private) Limited, 2 Km, Katar Bund Road, Off. Multan Road, Thokar Niaz Beg, Lahore
874	85042300	Transformers	Liquid dielectric distribution transformers with power handling capacity over 10,000 KVA voltages 230V to 132000V. Rating use at nominal system voltage upto 145000V and current rating upto 6000A.			Validus Engineering (Pvt) Ltd., B-72, Estate Avenue, SITE, Karachi-75700
875	85043100	i) Instrument Transformers	Power Handling capacity not exceeding 1 KVA (Dry Type) As per IEC / WAPDA / KESC Specifications	Oil Immersed		 Johnson & Phillips (Pakistan) Ltd., C-10, South Avenue, S.I.T.E., P.O Box No. 3603, Karachi - 75700 Elmetec (Pvt) Ltd., 19 KM Ferozepur Road, Lahore
		ii) Power Line Conditioner (Solid State AVR) 1000 VA To 40,000 VA	Power Guard Phase/Three Phase			Systek (Pvt.) Ltd, H.No# 115/1, Street No. 17, Off Khayaban-e- Muhafiz , Phase 6, DHA, Karachi
876	85043200	i) Distribution Transformers	Distribution Transformers (Pole Mounted) - Capacity: 5 KVA to 15 KVA - 11 KVA/ 415 Volt Step Down - 33 KV/ 415 Volt Step Down - 11 KVA / 420 Volt Step Down	Pole Mounted As per IEC/ WAPDA/ KESC Specifications		 Transfopower Industries (Private) Limited, 2 Km, Katar Bund Road, Off. Multan Road, Thokar Niaz Beg, Lahore Johnson & Phillips (Pakistan) Ltd., C-10, South Avenue, S.I.T.E., P.O Box No. 3603, Karachi - 75700 Elmetec (Pvt) Ltd., 19 KM Ferozepur Road, Lahore
		ii) Power Line Conditioner (Solid State AVR) 1000 VA To 40,000 VA	Power Guard Phase/Three Phase			Systek (Pvt.) Ltd, H.No# 115/1, Street No. 17, Off Khayaban-e- Muhafiz , Phase 6, DHA, Karachi
877	85043300	i) Transformers	Power Handling capacity exceeding 16 KVA but not exceeding 500 KVA As per IEC / WAPDA / KESC Specifications	Oil Immersed		 Johnson & Phillips (Pakistan) Ltd., C-10, South Avenue, S.I.T.E., P.O Box No. 3603, Karachi - 75700 Elmetec (Pvt) Ltd., 19 KM Ferozepur Road, Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		ii) Oil-Immersed Transformers	300KVA to 1700KVA			 Transfopower Industries (Private) Limited, 2 Km, Katar Bund Road, Off. Multan Road, Thokar Niaz Beg, Lahore Johnson & Phillips (Pakistan) Ltd., C-10, South Avenue, S.I.T.E., P.O Box No. 3603, Karachi - 75700 Elmetec (Pvt) Ltd., 19 KM Ferozepur Road, Lahore Validus Engineering (Pvt) Ltd. B-72, Estate Avenue, SITE, Karachi-75700
		iii) Power Line Conditioner (Solid State AVR) 1000 VA To 40,000 VA	Power Guard Phase/Three Phase			Systek (Pvt.) Ltd, H.No# 115/1, Street No. 17, Off Khayaban-e- Muhafiz , Phase 6, DHA, Karachi
878	85043400	i) Transformers	Ratings upto 160MVA,Voltage rating upto 220KV,Oil filled type,standard IEC76,			Heavy Electrical Complex, Industrial Estate Distt. Haripur
		ii) Power Transformers / Furnance Transformers/ Special Transformers	Power Transformers - Capacity: 750 KVA to 5000KVA - 11 KVA/ 415 Volt Step Down - 33 KV / 415 Volt Step Down - 11 KVA/ 420 Volt Step Down <u>Furnance Transformers</u> - Upto 5000KVA - Specific requirement of the Customers <u>Special Transformers</u> - Upto 5000KVA - Specific requirement of the Customers	As per IEC/ WAPDA/ KESC Specifications		 Transfopower Industries (Private) Limited, 2 Km, Katar Bund Road, Off. Multan Road, Thokar Niaz Beg, Lahore Johnson & Phillips (Pakistan) Ltd., C-10, South Avenue, S.I.T.E., P.O Box No. 3603, Karachi - 75700 Elmetec (Pvt) Ltd., 19 KM Ferozepur Road, Lahore
879	85044010	i) Uninterrupted power supply (UPS)	500VA to 6600VA	Standard & Long Backup		SalTec Powerlink, 1-A/2, Sector 15, Korangi Industrial Area, Karachi
		ii) Solar Inverter /Solar HybirdSystem 600 VA To 5000 VA	Sun Sabre			Systek (Pvt.) Ltd, H.No# 115/1, Street No. 17, Off Khayaban-e- Muhafiz , Phase 6, DHA,
		iii) UPS /Inverter	Excelsior Classic / Excelsior Premier / Excellence /EQP/Empower/Empower NEO/HOMY/HOMY NEO			Karachi
380	85044090	i) Uninterrupted power supply (UPS)	500VA to 6600VA	Standard & Long Backup		SalTec Powerlink, 1-A/2, Sector 15, Korangi Industrial Area, Karachi
		ii) Rectifiers, electric	200Vac to 48VDC, 10 to 40 Amps with or without battery backup (0.5 to 8 hours) SMPS technology			
		iii) DC To DC SMPS	2.0A, 44-60 Vdc 0.8A	Enclosure: Extruded Aluminium, Powder coated Mounting Style: Din Rail. Dimensions: 85x62x93 mm Weight : 500g, designed for Integrated Power System (IPS) being installed at Telecom Sites operating at either Positive or Negative Voltage. It is suitable for wide range of DC Voltages (38 to 55.2 Volts)		
		iv) AC to DC SMPS	Operating Range/AC input: 100 - 265 Vac, 60-300 Vac, can sustain upto 450 Vac. Operating Frequency: 50/60Hz. Normal DC Output: 12Vdc / 24Vdc. Output Current (Max): 5A at 12Vdc, 2-32A at 24Vdc. Line / Load Regulation: 1%. Operating Temperature / RH Range : 0 to 50°C, 50% to 95% RH Non Condensina.	Enclosure: Extruded Aluminium, Powder coated Mounting Style: Din Rail. Dimensions: 100x62x93mm Weight : 540g an efficient switched mode power supply which converts a wide range of AC voltages into required dc voltages		
		v) Rectifiers, electric	Rectifiers categorized by DC voltage rating and the load current in a standard voltage rating of 24V, 48V/ 220V- AC to 48V/24V- DC power supply Coulomb-1000	Metal body		Comcept Private Limited, Plot No. 291, Street No. 03, Sector I-9/3, Islamabad

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		vi) Power Supply Units	Input 19-36 VDC, Output 24VDC at 6-Amps and 24 Amps for 15 mSec & 50 VDC at 1.5 Amps, Voltage Regulation- 20% Max			East West Infiniti (Pvt) Ltd., Plot 146 Industrial Triangle, Kahuta Road, Islamabad
		vii) Solar Inverter /Solar Hybird System 600 VA To 5000 VA	Sun Sabre			Systek (Pvt.) Ltd, H.No# 115/1, Street No. 17, Off Khayaban-e- Muhafiz , Phase 6, DHA,
		viii) UPS /Inverter	Excelsior Classic / Excelsior Premier / Excellence /EQP/Empower/Empower NEO/HOMY/HOMY NEO			Karachi
		ix) Constant Current Power Supply for LED Lights (1-300W)	For All types of LED Lights, Bulbs and Lamps.			Elite Screener, Plot No. C-21 & C-22 Block No.9 AEECHS, Gulistan-e-Johar Karachi
		x) Infinity 5 KW, 9 KW & 15 KW Solar Inverter	Hybrid (On Grid + Off Grid) Inverter with/without Energy Storage.	-	-	Tesla Industries Pvt. Ltd., Plot No. 81-F, St. 6, I- 10/3, Islamabad
881	85049090	Speed Checking System for Vehicular Traffic	Speed Sensors capable of reading at up to 1.5 KM High resolution digital still camera / video recorder Number plate / Drivers face recognition Named / Unnamed operation modes Wireless communication enabled for remote			East West Infiniti (Pvt) Ltd., Plot 146 Industrial Triangle, Kahuta Road, Islamabad
882	85061000	Dry Battery Cell	R-20 (UM-1) & R-6 (UM-3) manganese Dioxide, non- rechargeable Size: R-20, R-6 & R-3			 Kohinoor Battery Mfrs. (Pvt) Ltd., Tibet Centre,M.A. Jinnah Road, Karachi-74400 Indus Battery Industries (Pvt) Ltd., F-244, Manghopir Road S.I.T.E Karachi
883	85072000	i) Sealed Lead Acid Batteries (Maintenance Free Batteries)	 i) 12 Valve Regulated Lead Acid (VRLA) Batteries 24 AH to 200AH, 2V cell 200AH to 3000AH (for use in telephone exchanges) ii) VRLA with AGM Technology in 2V 150AH to 3500AH, VRLA with AGM Technology in 12V 2.AH to 200AH to 200AH, VRLA with GEL Technology in 2V 150AH to 3500AH, VRLA with GEL Technology in 12V 2.5AH to 200AH 			Pakistan Accumulators (Pvt) Ltd., Head Office House No. 2, Street 63, F-8/4, Islamabad
		ii) 12 V 3.5 A / 12 V 7 A (VRLA MCB)	3/4 Ah / 7 Ah	VRLA Motorcycle and other Batteries	AGM Type	
		iii) Other Lead Acid Batteries/ Industrial Cells	12 Batteries, 24AH to 200AH, 2V Cell 200AH to 3000AH Sealed & VRLA Batteries			
		iv) Other Lead Acid Batteries/Industrial	OPzS Tubular Plate Deep Cycle batteries in 2V 100AH to 3500AH, OPzS Tubular Plate Deep Cycle batteries in 12V 35AH to 260AH, OPzV 2V VRLA range from 150 to 3500AH for extended backups., Traction range 2V100AH to 1000AH, Golf Cart 6V 225AH to &8V 160AH, 24V 110AH Tank batteries in maintence free & GEL Version.		**	
		v) Lead Acid Battery	2-6 Volts (For standby Storage, switch gears, Solar Panels etc.)			Exide Pakistan Ltd., A/45, Hill Street, P.O. Box No. 3680 SITE Karachi-75400
884	85111000	Spark Plug sleeve	For Janbacher Gas Engine JMS-620 - GS-N.L			Alsons Industries (Pvt) Ltd., S-18, S.I.T.E., Karachi
885	85131030	Light-emitting diode (LED) Energy saving Rechargeable lamps:	All types of Rechargeable emergency light (All sizes); (As per IEC standards)			 National Institute of Electronics, Ministry of Science & Technology, H. No. 17, H-9, P.O. Box 1406, Islamabad Creative Electronics & Automation, Plot No. 142, Industrial Triangle, Kahuta Road, Islamabad Micro Pak (Pvt) Ltd., Plot No. 218, St. No. 7, I-9/2, Islamabad Concept Private Limited, Plot # 291, Street # 03, I-9/3, Islamabad Khyber Electric Lamps, 483 Tariq Road Peshawar Cant Wasif Impex, 1st & 2nd Floor, Plot No. Dp- 10, Sector 12-D, North Karachi Industrial Area, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
886	85131040	LED Solar Torches				Creative Electronics & Automation, Plot No. 142, Industrial Triangle, Kahuta Road, Islamabad
887	85131090	Light-emitting diode (LED) Energy saving lamps:	All types of Chargeable LED lamps, (All sizes) (As per IEC standards)			 National Institute of Electronics, Ministry of Science & Technology, H. No. 17, H-9, P.O. Box 1406, Islamabad Creative Electronics & Automation, Plot No. 142, Industrial Triangle, Kahuta Road, Islamabad Micro Pak (Pvt) Ltd., Plot No. 218, St. No. 7, I-9/2, Islamabad Concept Private Limited, Plot # 291, Street # 03, I-9/3, Islamabad Khyber Electric Lamps, 483 Tariq Road Peshawar Cant Wasif Impex, 1st & 2nd Floor, Plot No. Dp- 10, Sector 12-D, North Karachi Industrial Area, Karachi
888	85142000	Furnaces, Induction or dielectric, electric,	From 50kg upto 50MT			Electro Heat (Pvt) Ltd, 10-km Ottawa More, G.T. Road, Gujranwala
889	85161090	Electric Water Treatment	From 10 L to 100 Liter storage type, 2000 Watt element with safety device			Super Asia Muhammad Din Sons Ltd., G.T. Road Gujranwala
890	85165090	Microwave Ovens	Up to 75 liters			 Dawlance (Pvt) Ltd., Dawlance Center 7/4, Civil Lines 9 Dr. Ziauddin Ahmed Road Karachi. Super Asia Muhammad Din Sons Ltd., G.T. Road Gujranwala
891	85168090	Electric Elements for heating	220/240 V A.C. , Wattage 2000-3000 Flange 2.5" BSW	Material Copper, incoloy, SS, Titanium, Dia 8mm, Length 11", 14", 18", 23", 27", 30", 36"		Tesla Industries Pvt. Ltd., Plot No. 81-F, St. 6, I- 10/3, Islamabad
892	85171390	Smarthphone with accessories	Smartphone screen size 4", 4.5", 5.1" & 6" with standard specification OCTA processor & quad processors	-	-	OneApple International Corporation Plot # 12 Sector 24: Main Korangi Road, Sector 24, Karachi
893	85171419	Smarthphone with accessories	Smartphone screen size 4", 4.5", 5.1" & 6" with standard specification OCTA processor & quad processors			OneApple International Corporation Plot # 12 Sector 24: Main Korangi Road, Sector 24, Karachi
894	85171420	With GSM Modules	FWT-1000G: Fixed Wireless GSM Terminal for add on for PABX FWT			 Comcept Private Limited, Plot No. 291, Street No. 03, Sector I-9/3, Islamabad Microtech Industries (Pvt) Ltd., Plot No. 2, Street No. 2, Attari Industrial Estate, 18 Km, Ferozpur Road, Lahore
		ii) Fixed Wireless Terminals (FWT)	 Based on CDMA technology, supports CDMA bandwidth and provide data, voice and SM services through the CDMA network. Main functions as below: 1). Voice communication function. 2). UIM-card: Supporting UIM-card function. 3). Data communication function: Packet, Asynchronous data and PC fax services. 4). Security: PIN-Locking functions. 			Zhongxing Telecom (ZTE) Pakistan (Pvt.) Ltd., Plot # 424, Street # 16, I-9/3, Opp I-9 Police Station, Islamabad
895	85171490	 Wireless payphones 	GSM wireless payphone Terminal (Model: PWT 1400G) PWT 1400G (Indoor), supports a broad range of voice and data services i.e. Standard payphone operation, fax transmission, Internet access, with built in GSM transceiver in tri band 900MHz, 1800MHz & 1900MHz.			Comcept Private Limited, Plot No. 291, Street No. 03, Sector I-9/3, Islamabad

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		ii) Telephones, card-operated	Wireline Chipcard Based Indoor and Outdoor Payphone (Models:PT1100, PT1400, PTO2000) Complete remote configuration, Management and control through NMS. Security against fraud. Multi-level alarm reporting facility. Incoming call baring facility. Multiple call charging options. 4Kbyte tariff table storage capacity, Visual on-line display. Built-in modem. with line voltage of 48V or 60V DC. Reads all chip cards conforming to ISO 7816.	Plastic Casing in three catching colors with a so		
		iii) Payphone	WLL CDMA Wireless Payphone Terminal (Model: PWT1400C) PWT1400C with standard antenna connection to establish RF link with the corresponding CDMA based station of a cellular or WLL network and wireless payphone operation takes place.	-		
		iv) Telephone sets, Line transmission, without cordless	Land Line & GSM Payphone			MicroTech Industries (Pvt.) Ltd., Attari Industrial Estate, Plot # 2, Street # 2, 18 KM. Ferozepur Road, Lahore
896	85171890	Payphone	WLL CDMA Wireless Payphone Terminal (Model: PWT1400C) PWT1400C with standard antenna connection to establish RF link with the corresponding CDMA based station of a cellular or WLL network and wireless payphone operation takes place.			Comcept Private Limited, Plot No. 291, Street No. 03, Sector I-9/3, Islamabad
897	85176290	i) PABX	 Megaswitch-500 Upto 500 Lines Megaswitch-100 Upto 150 Lines Megaswitch Series 50 Upto 48 Lines Megaswitch Serires 30 Upto 32 Lines Telemate-XII (2+10 Lines) 	-		Megatech Communications (Pvt.) Ltd., 47, Banglore Town Off: Tipu Sultan Road. Karachi
		ii) Telephone exchanges	Standard / Modern electronic digital switching system (EWSD)			Telephone Industries of Pakistan, Khanpur Road, Haripur
		iii) Line Protection Units	LPU: Line Protection Units Misuse protection and direct communication with network Management System.			Comcept Private Limited, Plot No. 291, Street No. 03, Sector I-9/3, Islamabad
		iv) Telephone exchanges	Configuration Types: Local Exchange Tandem Exchange Transit Exchange International Gateway Functions: Voice switching / network (PSTN) Data switching / network Intelligent Network Connectivity: 200,000 subscribers per exchange. 60,000 ports per exchange.			Alcatel Pakistan (Pvt) Ltd., Sector H-8/4, Islamabad
		v) Optical Transmission Equipments (Optical Transmission Products SDH,NG-SDH)	 NG-SDH integrates functions of SDH (including ADM, TM, REG), DXC IP/ATM and DWDM in one. Support the following functions: 1). MSTP (Multi-Service Transport Platform) 2). Provide high-speed, large capacity information transmission. 3). Offer multi service access of STM-64/OC-192, STM 16/OC-48, STM-4/OC-12, STM-I/OC-3, E4, E3/T3, E1/T1, 10M/100M, GE, ATM, ESCON etc. 4). Suitable for the transmission of IP and ATM services. 5). Perform multi protocol encapsulation, virtual concatenation, bandwidth share, service convergence, VLAN partition-LCAS, STP, etc. 6). function of ATM cell exchange, statistic multiplex and VP-ring. 			Zhongxing Telecom (ZTE) Pakistan (Pvt.) Ltd., Plot # 424, Street # 16, I-9/3, Opp I-9 Police Station, Islamabad
		vi) Telephone exchanges	Fixed Line Telephone Switching System (ZXJ10) consists of modules and cards. Total quantity of modules & cards is 32 amongst 25			
		vii) Electronic Field Telephones Inter Trench Communication (ITC- 2000)	EFT-101: Operating Voltage : 4.5VDC, Free Range: 300 to 3400 Hz, Impedance: 600 Ohms <u>ITC-2000:</u> Operating Voltage: 4.5VDC, Environmental Temperature: -15 to +55C, Impedance: -20 to +60C	Military standards		National Radio Telecommunication Corporation, Marketing & Sales Deptt National Radio Telecommunication Corporation T&T Colony Haripur

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		viii) Digital Electronic Field Telephone Exchanges	PFX-6416 and PFX-3208: Power Requirement :220VAC/24VDC, Ring Voltage: 90 VAC. 25 Hz, OperatingTemperature:-30 to +55CPFX-1204: Power Requirement: 180 to 260VAC/24VDC, RingVoltage: 90 VAC. 25 Hz, Operating Temperature -30 to +55CPFX-5200C: Power Requirement: 90 to 260VAC/48VDC, RingVoltage: 2000 Ohms, Operating Temperature: -10 to +50CAutomag 412: Power Requirement: 220VAC/12VDC, RingVoltage: 90 V±20VAC, Operating Temperature -10 to +45C			
898	85176270	Mobi Router (GSM Call Router)	Mobi Router (GSM Call Router)			MicroTech Industries (Pvt.) Ltd., Attari Industrial Estate, Plot # 2, Street # 2, 18 KM. Ferozepur Road, Lahore
899	85176970	Optical Network Unit/ Optical Network Terminal (ONU/ONT)	For internet 1GE + 3FE + CATV + RF + POTS + Wifi Networking equipments like routers, LAN bridges, modem, hubs excluding switches and repeaters.	GPON FTTH Multi-service WIF ONU Two Fibers Three Wavelength		Telecast Technology Pakistan (Pvt) Ltd., Plot No. 375-B, Street No. 16, Potohar Road, Sector I- 9/3, Islamabad
900	85182100	Loudspeakers, Single, mounted in their enclosures	Speaker for Car Radio & Cassette player			Automate Industry, C-23, Estate Avenue, S.I.T.E , Karachi
901	85198910	CD players, audio, without sound recording device	Radio CD/MP3 Players			Automate Industry, C-23, Estate Avenue, S.I.T.E, Karachi
902	85232100	Cards incorporating a magnetic stripe	Magnetic Card			Kwick High Tech & Solutions (Pvt) Ltd., Plot No. 100-A, Street No. 14, Sector I-9/2, Industrial Area, Islamabad.
903	85232910	Cassettes, magnetic, audio, blank, width not over 4mm	Blank/Recorded			B. S. Magnetic (Pvt) Ltd., LA-1/8, Block 22, Federal B. Industrial Area, Karachi
904	85232930	Cassettes, magnetic, audio, blank, width not over 4mm	Blank/Recorded			B. S. Magnetic (Pvt) Ltd., LA-1/8, Block 22, Federal B. Industrial Area, Karachi
905	85234110	CD-R, blank, for computer	CD-R (Blank)			Oyster Technologies (Pvt) Ltd, Plot No.08, Sector 24, Korangi Industrial Area, Karachi
906	85234120	DVD, for computer	DVD-R			Oyster Technologies (Pvt) Ltd Plot No.08, Sector 24, Korangi Industrial Area, Karachi
907	85235210	SIM cards	GSM SIM Cards			Kwick High Tech & Solutions (Pvt) Ltd., Plot No. 100-A, Street No. 14, Sector I-9/2, Industrial Area, Islamabad.
908	85235220	Memory Cards	Nadra/Banking Cards			Kwick High Tech & Solutions (Pvt) Ltd., Plot No. 100-A, Street No. 14, Sector I-9/2, Industrial Area, Islamabad.
909	85255090	i) Ground to Air UHF / VHF Communication Radio	Synthesized VHF/UHF Transceivers 32 Programmable channels, Channel scanning, Dual Channel () Watch 108 ~ 137 MHz & 225-400 MHz frequency ranges, Built in Test equipment			East West Infiniti (Pvt) Ltd., Plot 146 Industrial Triangle, Kahuta Road, Islamabad
		ii) Upgraded VHF/FM Radio Set VHF/ FM Frequency Hopping Manpack & Vehicular Radio Sets	PRC-77/PK - Operating Voltage 4.5 VDC - Storage Temperature -20 To +60C - Environmetal Temperature -15 TO +55C 9600 Series -00 perating Temp Range -40 to +60C - Storage Temperature -55 To +70C - Environmnetal Temperature 3120			National Radio Telecommunication Corporation, Marketing & Sales Deptt National Radio Telecommunication Corporation T&T Colony Haripur
910	85256020	Payphone	PWTO 2000G: GSM Wireless out door Payphone Terminal chip card outdoor wireless payphone, built In GSM transceiver in tri band 900 MHz.			Comcept Private Limited, Plot No. 291, Street No. 03, Sector I-9/3, Islamabad
911	85256060	i) Vehicle Tracking System	Vehicle Tracking System			MicroTech Industries (Pvt.) Ltd., Attari Industrial Estate, Plot # 2, Street # 2, 18 KM. Ferozepur Road, Lahore

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S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		ii) GSM/GPS Tracker Online/Offline				Digitec Systems, Plot No. 178, Sector-24, Korangi Industrial Area, Karachi.
912	85285200	LED Monitor	LED monitor screen size 18.5", 19.5", 21.5", 27", 32"			OneApple International Corporation Plot # 12 Sector 24. Main Korangi Road, Sector 24, Karachi
913	85287110	Free to Air (FTA)	Reception apparatus for receiving satellite signals of a kind used with TV (Satellite dish receivers)			Telecast Technology Pakistan (Pvt) Ltd., Plot No. 375-B, Street No. 16, Potohar Road, Sector I- 9/3, Islamabad
914	85287190	Set Top Box	DVB-C/ DVB-T/IPTV (For cable TV, IPTV, Terestrial) Other Set Top Boxes	Interface to the Internet and also enables a television set to receive and deode digital television (DTV) broadcasts		Telecast Technology Pakistan (Pvt) Ltd., Plot No. 375-B, Street No. 16, Potohar Road, Sector I- 9/3, Islamabad
915	85287211	Television sets, colour	Liquid crystal display (LCD)			 Dynasel Ltd., 20/II, Block-D, Model Town, Lahore New Allied Electronics Industries (Pvt) Ltd. 7th Floor, Lakson Squaire Building, No.1, Sarwar Shaheed Road, Karachi Singer Pakistan Ltd. 608, 6th Floor, Beaumont Plaza, Beaumont Road, Near PIDC House, Karachi,
916	85287219	Television sets, colour	Colour Television Sets of screen sizes 14" to 62" including Conventional type TV sets, Flat TV sets, Projection TV sets, Plasma TV sets. Compatible NTSC/PAL	Image displays		 Dynasel Ltd., 20/II, Block-D, Model Town, Lahore New Allied Electronics Industries (Pvt) Ltd. Th Floor, Lakson Squaire Building, No.1, Sarwar Shaheed Road, Karachi Singer Pakistan Ltd. 608, 6th Floor, Beaumont Plaza, Beaumont Road, Near PIDC House, Karachi, Sysco Industrial Company, 4th Floor Al- Hayat Centre, 14/A Hall Road Lahore S.N.H Industries (Pvt.) Ltd. L-9 Block 21 F. B Industrial Area Karachi 75950
917	85287290	Receiver sets	Reception apparatus for receiving satellite signals of a kind used with TV (Satellite dish receivers)			 Dynasel Ltd., 20/II, Block-D, Model Town, Lahore New Allied Electronics Industries (Pvt) Ltd. 7th Floor, Lakson Squaire Building, No.1, Sarwar Shaheed Road, Karachi Singer Pakistan Ltd. 608, 6th Floor, Beaumont Plaza, Beaumont Road, Near PIDC House, Karachi,
918	85287300	Television receiver sets, colour, black & white or other monochrome.	Colour Television Sets of screen sizes 14" to 62" including Conventional type TV sets, Flat TV sets, Projection TV sets, Plasma TV sets.			 Dynasel Ltd., 20/II, Block-D, Model Town, Lahore New Allied Electronics Industries (Pvt) Ltd. 7th Floor, Lakson Squaire Building, No.1, Sarwar Shaheed Road, Karachi Singer Pakistan Ltd. 608, 6th Floor, Beaumont Plaza, Beaumont Road, Near PIDC House, Karachi,
919	85291090	Antennas for radios and television sets	Antenna Ass'y for Car Radio			Automate Industry, C-23, Estate Avenue, S.I.T.E , Karachi
920	85299090	Television body	Plastic Covers front and back for televisions			Synthetic Products Enterprises (Pvt) Ltd., 127-S S.I.E Kotlakhpat Township Lahore
921	85311000	GSM Based Security Alarm Systems				Digitec Systems, Plot No. 178, Sector-24, Korangi Industrial Area, Karachi.

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
922	85318000	i) DC Tower Light Controller (DC TLC)	Operating Voltage Range: -60Vdc to -40Vdc. Load Range: upto 30 watts LED Tower Light. Temperature Raange: -20 to 60°C. Load Lower Threshold: 100mA (4.8 watts). System Indication : 3x LED (Input Power, Lamp / Tower. Operating Modes: 3 X Modes (Calibrate: Auto & Manual)	Dimensions: 85x62x93 mm Weight : 500g A microcontroller based device which controls the 'blinking' of DC Tower Lights at any Telecom sites as per PTA requirements, monitors the tower light load and generates alarm in case of tower lights failure / solar switch failure. Work for both 12V to 48V		SalTec Powerlink, 1-A/2, Sector 15, Korangi Industrial Area, Karachi
		 ii) Exit and Emergency LED/SMD Lit sign boards with and without backup 				Creative Electronics & Automation, Plot No. 142, Industrial Triangle, Kahuta Road, Islamabad
923	85321000	i) Capacitors, fixed, power	Single Phase capacitors for voltage up to 2000 V, Three Phase Capacitors for voltage up to 1000 V, 50 and 60 Hz, dry type as well as oil impregnated, In rating up to 200 kVAr.			Amber Capacitors Ltd., 16 Link McLeod Road, Lahore
		ii) L.V. Power factor improvement capacitors single phase and three phase	0.50 KVAR upto 200 KVAR 220 VAC upto 660 VAC	Plastic and Aluminum Body	-	Khawaja Electronics (Pvt) Ltd., 4-H, Gulberg-III, Lahore
924	85322200	i) Capacitors, fixed, Aluminum electrolytic	Capacitors in Voltages up to 440V 50/60 Hz, rating up to 400 MFD			Amber Capacitors Ltd., 16 Link McLeod Road, Lahore
		ii) Capacitors for motor start application	20UF upto 400UF 100 VAC upto 660 VAC	Aluminum and backelite body		Khawaja Electronics (Pvt) Ltd., 4-H, Gulberg-III, Lahore
925	85322500	 i) Capacitors, fixed, dielectric, of paper of plastic 	Capacitors of voltage up to 660 V, 50/60 Hz, in aluminum and plastic casings			Amber Capacitors Ltd., 16 Link McLeod Road, Lahore
		ii) Capacitors for domestic appliances	s 0.50 uf upto 100 UF 100 V.A.C upto 660 V.A.C.	Plastic and Aluminum Body		Khawaja Electronics (Pvt) Ltd., 4-H, Gulberg-III, Lahore
		iii) Special application capacitors	0.25 UF upto 3.0 UF 2 K.V upto 12K.V.	M.S & S.S. Container		
926	85322900	Capacitors Up to 11 KV /12/3Kv High Voltage /Shunt Capacitors	Single Phase Capacitors for voltage up to 12000 volts oil impregnated, in rating 25 kVAr up to 600 kVAr	Mild Steel		Khawaja Electronics (Pvt) Ltd., 4-H, Gulberg-III, Lahore
927	85340000	i) Printed Circuit Boards	Single,Double Sided and multilayer, rigid, bare PCBs for all types of Electronic Products.			 National Institute of Electronics, Ministry of Science & Technology, H. No. 17, Sector H-9, P.O. Box 1406, Islamabad Smart PCBs, Service Road, Shaheen Town near Airport Chowk, Rawalpindi
		ii) Metal Clad Printed Circuit Boards (MCPCB) for LED Lights.	Metal Clad Printed Circuit Boards (MCPCB) and Single, Double Sided and Multilayers PCBs for all types of Electronic Products including LED Lights			Elite Screener, Plot No. C-21 & C-22 Block No.9 AEECHS, Gulistan-e-Johar Karachi
928	85351000	i) Fuse Dropout/ Cutout	For 11KV Transmission Lines			Creative Engineering (Pvt) Ltd., 160/ S, Q.I.E. Kot Lakhpat Lahore
		ii) LT HRC Fuse Base	630A for Low Voltage Distribution System			Alsons Industries (Pvt) Ltd., S-18, S.I.T.E., Karachi
929	85353010	Isolating Switches	Isolating Switches (Air Insulated) and make-and-break switches for a voltage upto 145kV			Emco Industries Limited, 4th-Floor, National Tower, 28-Edgerton Road, Lahore
930	85363000	Auto Phase Switcher (APS)	Power rating (kVA): 25kVA/30kVA Protection against high/low voltages (configurable):Under- voltage Range = 100-200Vac Over voltage range = 225-280Vac 3 Phase Voltage Range (Vac): 125 to 275 Vac (Default), can be adjustable 100-280 Vac via APS. Remote Monitoring - optional via RS485 interface	Enclosure: Extruded Aluminium,Powder coated Mounting Style: Din Rail. Dimensions: 120x62x93 mm; Weight : 620g APS monitors 3 phase AC Mains Supply and ensures that 3 phases are available to load, under scenarios of single or double grid phase failure. It's an auto-looping device to maximize grid utilization to reduce genset usage. Used mostly in telecom tower sites.		SalTec Powerlink, 1-A/2, Sector 15, Korangi Industrial Area, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
931	85364990	Annunciators	Transformer temperature gauges, Trip circuit DC supervision relays, Under Voltage relays, Motor protection relays, Panel humidity controllers, Timers, Flasher relays, Automatic transfer switch.			E-Labs, 456/7, Lane12 A Iqbal Park Cantt. Lahore.
932	85365099	Electric Switches	Plugs and Socket-Outlets, voltage not over 1 KV, for household and similar purposes electrical switches, power plugs/sockets assemblies for household/ industrial application - outlets without interlock for fixed - outlets for selv - for adaptors - outlets with in terlock for fixed installations-Appliance couplers for - Part 2- 1: Sewing machine couplers -Part 2-2: Interconnection couplers for household and similar equipment Part 2-3: Appliance coupler with a degree of protection higher than IPX0 -IEC system of plugs and socket-outlets - Part 1: 16 A 250 V a.cIEC system of plugs and socket-outlets - Part 1: 15 A 125 V a.cIEC system of plugs and socket-outlets - Part 3: SELV plugs and socket-outlets, 16 A 6V, 12 V, 24 V, 48 V, a.c. and d.c"Plugs, socket-outlets, vehicle couplers and vehicle inlets - Conductive charging of electric vehicles - Part 1: Charging of electric vehicles up to 250 A a.c. and 400 A d.c." - surge voltages in low- voltage AC Power circuits-Radio-noise emissions from low- voltage electrical and electronic equipment in the ranage of 9 KHZ to 40 GHz -		Polycarbonate, Multigrade PVC,Cu 99.9%,ABS,PC,	The Crown Engineering Works (Pvt) Ltd., 17- KM, SHeikhupura Road, Lahore
933	85366910	DPs	- 10 Pairs - 20 Pairs - 50 Pairs - 100 Pairs	Pillar Type DPs, Pole Type, Cross Connectoin Cabinets, DP Thermo Plastic (Pole type)		National Radio Telecommunication Corporation, Marketing & Sales Deptt National Radio Telecommunication Corporation T&T Colony Haripur
934	85366990	Electrical Plugs and Sockets	Plugs and Socket-Outlets, voltage not over 1 KV, for household and similar purposes electrical switches, power plugs/sockets assemblies for household/ industrial application - outlets without interlock for fixed - outlets for selv - for adaptors - outlets with in terlock for fixed installations-Appliance couplers for - Part 2- 1: Sewing machine couplers -Part 2-2: Interconnection couplers for household and similar equipment Part 2-3: Appliance coupler with a degree of protection higher than IPX0 -IEC system of plugs and socket-outlets - Part 1: 16 A 250 V a.cIEC system of plugs and socket-outlets - Part 1: 15 A 125 V a.cIEC system of plugs and socket-outlets - Part 3: SELV plugs and socket-outlets, 16 A 6V, 12 V, 24 V, 48 V, a.c. and d.c"Plugs, socket-outlets, vehicle couplers and vehicle inlets - Conductive charging of electric vehicles - Part 1: Charging of electric vehicles up to 250 A a.c. and 400 A d.c." - surge voltages in low- voltage AC Power circuits-Radio-noise emissions from low- voltage electrical and electronic equipment in the ranage of 9 KHZ to 40 GHz -		Polycarbonate, Multigrade PVC,Cu 99.9%,ABS,PC,	The Crown Engineering Works (Pvt) Ltd., 17- KM, SHeikhupura Road, Lahore
935	85369030	Magnetic Contactor				Khawaja Adhesive Tapes (Pvt) Ltd., 4-H, Gulberg-III, Lahore
936	85369090	i) Junction Boxes	Electrical Wiring Accessories, voltage not over 1KV (Excluding explosion & flame proof)			Clipsal Pakistan (Pvt) Ltd., 101-102, Sector 15, Korangi Industrial Area, Karachi
		ii) Insulating Piercing connector	IPC 16-95 / 4-35mm ² for Connecting XLPE Insulator LT ABC Sub Main to Service Cable Specification K-R&D-PD-19			Alsons Industries (Pvt) Ltd., S-18, S.I.T.E., Karachi
		iii) Line Tap	120mm ² for 230/400/110000 Volts Overhead Distribution System			

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		iv) PMT Bus Bar arrangement	Pole mounted Distribution Transformer Specification K-TPRE- BBA-285.			
937	85371090	i) Control Panels	L.T. Switchgear panels upto 1,000 Volts and lighting / power distribution boards, control panels, control signaling and relay panel for grid stations, rectifier panel upto 200 Amps. Motor Control Centers including Programmable Logic Controllers and related instrumentation and control, sugar, steel rolling, low voltage switchgears PFI Plant. [Excluding panels of proprietary compressor engine Oil & Gas application valves pumps & actuators and in explosion & flame proof exclusion. Certified by ATX, explosion proof].			 Siemens Pakistan Engineering Co. Ltd., B-72, Estate Avenue, SITE, P.O. Box No. 7158 Karachi-75700 Johnson & Phillips (Pakistan) Ltd., C-10, South Avenue, S.I.T.E., P.O Box No. 3603, Karachi - 75700 Elmetec (Pvt) Ltd., 19 KM Ferozepur Road, Lahore
		ii) Switchboards	Direct-on-line starter 10HP NSD starter 15 HP, Motor control unit 25 HP, automatic starter of delta type of 50 HP, 5-250 HP ASD Starter, 5-15 HP DOL Starter. [Excluding certified by ATX, Explosion Proof]			Siemens Pakistan Engineering Co. Ltd., B-72, Estate Avenue, SITE, P.O. Box No. 7158 Karachi-75700
		 iii) Meter Security Boxes (WAPDA Specification, DD-S-58:2001) iv) LT Service Box (WAPDA Specification P-72:85) 				Creative Engineering (Pvt) Ltd., 160/ S, Q.I.E. Kot Lakhpat Lahore
		v) Control Panel with other accessories ATS Panels				Smart Power Systems (Pvt) Ltd., Near Super Highway,Ashanabad Industrial Area Karachi.
938		Control Panels i) H.T. Circuit breakers (Switchgear) panels upto 4000A, 40KA & 17500 Volts ii) 3 Phase, upto 60KVA, protection panel for severe over voltage (slow & fast), phase-neutral reversal, etc	[Excluding panels of proprietary compressor engine Oil & Gas application valves pumps & actuators and in explosion & flame proof exclusion. Certified by ATX, Explosion Proof]	Microprocessor based, with remote alarm interface		 Siemens Pakistan Engineering Co. Ltd., B-72, Estate Avenue, SITE, P.O. Box No. 7158 Karachi-75700 Johnson & Phillips (Pakistan) Ltd., C-10, South Avenue, S.I.T.E., P.O Box No. 3603, Karachi - 75700 Elmetec (Pvt) Ltd., 19 KM Ferozepur Road, Lahore SalTec Powerlink, 1-A/2, Sector 15, Korangi Industrial Area, Karachi
		Switchboards, Switchgears & Panels	Up to 17.5 kv; 4000 AMP, 40 KA			 Schneider Electric Pakistan (Pvt) Ltd., (formerly AREVA T& D Pakistan (Pvt) Ltd), D- 163, S.I.T.E Karachi Johnson & Phillips (Pakistan) Ltd., C-10, South Avenue, S.I.T.E., P.O Box No. 3603, Karachi - 75700
939	85392200	Electric Bulbs	Bulbs from 25W to 200W, Life upto 1000 Hrs, voltage over 100 V			Khyber Electric Lamps Mfg Co. Ltd., 483/E-1, Tariq Road, Peshawar Cantt., Peshawar
940	85393110	Energy saving lights:	Varing Voltages			Creative Electronics & Automation, Plot No. 142, Industrial Triangle, Kahuta Road, Islamabad
941	85393210	Energy saving lights:	Varing Voltages			Creative Electronics & Automation, Plot No. 142, Industrial Triangle, Kahuta Road, Islamabad

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
942	85393220	Light-emitting diode (LED) Energy saving lights:	All types of Energy Saving Tube Lights (All sizes); (As per IEC standards)			 National Institute of Electronics, Ministry of Science & Technology, H. No. 17, H-9, P.O. Box 1406, Islamabad Creative Electronics & Automation, Plot No. 142, Industrial Triangle, Kahuta Road, Islamabad Micro Pak (Pvt) Ltd., Plot No. 218, St. No. 7, I-9/2, Islamabad Concept Private Limited, Plot # 291, Street # 03, I-9/3, Islamabad Khyber Electric Lamps, 483 Tariq Road Peshawar Cant DS Technologies, ST-2/7, Sector 16, Korangi Industrial Area, Karachi Areebah Technologies Ltd., Plot # 102, St # 7, I-10/3, Industrial Area, Islamabad
943		SMD/LED/LVD Lights with or without Ballast, PV Module, Fitting & Fixtures				 National Institute of Electronics, Ministry of Science & Technology, H. No. 17, H-9, P.O. Box 1406, Islamabad Creative Electronics & Automation, Plot No. 142, Industrial Triangle, Kahuta Road, Islamabad Micro Pak (Pvt) Ltd., Plot No. 218, St. No. 7, 1-9/2, Islamabad Comcept Private Limited, Plot # 291, Street # 03, I-9/3, Islamabad Khyber Electric Lamps, 483 Tariq Road Peshawar Cant DS Technologies, ST-2/7, Sector 16, Korangi Industrial Area, Karachi Areebah Technologies Ltd., Plot # 102, St # 7, I-10/3, Industrial Area, Islamabad
944	85395210	LED Bulb	All types of LED Bulbs/lamps (All sizes); {AC/DC} (As per IEC standards)			 National Institute of Electronics, Ministry of Science & Technology, H. No. 17, H-9, P.O. Box 1406, Islamabad Creative Electronics & Automation, Plot No. 142, Industrial Triangle, Kahuta Road, Islamabad Micro Pak (Pvt) Ltd., Plot No. 218, St. No. 7, I-9/2, Islamabad Concept Private Limited, Plot # 291, Street # 03, I-9/3, Islamabad DS Technologies, ST-2/7, Sector 16, Korangi Industrial Area, Karachi Areebah Technologies Ltd., Plot # 102, St # 7, I-10/3, Industrial Area, Islamabad Wasif Impex, 1st & 2nd Floor, Plot No. Dp- 10, Sector 12-D, North Karachi Industrial Area, Karachi Khyber Electric Lamps Mfg Co. Ltd., 483/E- 1, Tariq Road, Peshawar Cantt., Peshawar Telecast Technology Pakistan (Pvt) Ltd., Plot No. 375-B, Street No. 16, Potohar Road, Sector I- 9/3, Islamabad

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
945	85395220	Light-emitting diode (LED) Energy saving Tubes:	All types of LED Tube Light (All sizes); {AC/DC} (As per IEC standards)			 National Institute of Electronics, Ministry of Science & Technology, H. No. 17, H-9, P.O. Box 1406, Islamabad Creative Electronics & Automation, Plot No. 142, Industrial Triangle, Kahuta Road, Islamabad Micro Pak (Pvt) Ltd., Plot No. 218, St. No. 7, I-9/2, Islamabad Concept Private Limited, Plot # 291, Street # 03, I-9/3, Islamabad Khyber Electric Lamps Mfg Co. Ltd., 483/E- 1, Tariq Road, Peshawar Cantt., Peshawar D Technologies, ST-2/7, Sector 16, Korangi Industrial Area, Karachi Areebah Technologies Ltd., Plot # 102, St # 7, I-10/3, Industrial Area, Islamabad Wasif Impex, 1st & 2nd Floor, Plot No. Dp- 10, Sector 12-D, North Karachi Industrial Area, Karachi
946	85408900	Pre-chamber gas valve	For Janbacher Gas Engine JMS-620 - GS-N.L			Alsons Industries (Pvt) Ltd., S-18, S.I.T.E., Karachi
947	85414300	Photovoltaic Modules (Solar Panels)	Maximum Power: 5 Watts to 445 Watts Nominal Voltage: 6V/ 12V / 24V/48V 635X505X3.2mm ~ 1950X986X3.2mm	 Operating Temp40°C to +90 °C Storage Temp40°C to +90 °C Pressure bearing < 5400 Pa Wind bearing < 2400 Pa Hail Impact test 25mm diameter hail Ball at 23.00 m/s, directed at 11 impact location Temp. Coff of Isc +0.05% / C Temp. Coff. of Voc - 0.34% / C Temp. Coff. of Pm-0.5%/C Power Output Tolerance + 3% 		 Tesla Industries Pvt. Ltd., Plot No. 81-F, St. G, I-10/3, Islamabad Sunlife Solar Co. (Pvt) Ltd., Al-Badar Industrial Zone, Madni Ali Stop, 19 KM Sheikhupura Road, Lahore
948	85423300	Pair Gain System	Optical 4, 8 & 12 clear 64 Kbps channels over one single copper pair.			National Radio Telecommunication Corporation, Marketing & Sales Deptt National Radio Telecommunication Corporation T&T Colony Haripur
949	85441110	PVC Cable	10mm to 300mm sq. (Excluding ultra violet treated cables)	Copper-Aluminium PVC, Polythyne		 Cable & Conductor Ltd., 1st Floor, 41 Civic Centre, Barkat Market New Garden Town, Lahore Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore Premier Cables (Pvt) Ltd., 43-E, Block 6, P.E.C.H.S., Behind FedEx, Off Razi Road, Shahrah-e-Faisal, Karachi
		Electric Wire (Insulated)	3/.029", 7/.029", 3/.036", 7/.036", 7/.044", 7/.052", 7/.064"			Khawaja Electronics (Pvt) Ltd., 4-H, Gulberg-III, Lahore
950	85441190	i) PVC Cable	10mm to 300mm sq. (Excluding ultra violet treated cables)	Copper-Aluminium PVC, Polyethylene		 Cable & Conductor Ltd., 1st Floor, 41 Civic Centre, Barkat Market New Garden Town, Lahore Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		ii) Enamelled Copper Wire	Type of Varnish: Plyurethane, Polyester Imide; Diameter Test: Bare Dia as per international standard, Coated dia: Grade-2, Elangation Test of thin guages: 25% to 27%, Elangation Test of thick guages: 28% to 36%, Break Down Voltage Test: 6 Kv to 12 Kv (Excluding ultra violet treated cables)			 Wahid Industries Ltd., G. T. Road, Gujrat Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore
951	85441900	General House Wiring (PVC)	3/.029", 7/.029", 3/.036", 7/.036", 7/.044", 7/.052", 7/.064" BS-2004, BS-6004	T/S, Elong, DC Resistance IR, HVT	Purity: 99.99%	 H.M. Esmail & Co. (H.M. Cables), SB-5, Madina City Mall, 6th Floor, Abdullah Haroon Road, Karachi Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore Fast Cables Ltd. 192-Y Block, Commercial Area, Phase-III, DHA, Lahore Khawaja Electronics (Pvt) Ltd., 4-H, Gulberg- III, Lahore
952	85442000	 Telephone Cables PVC Insulated Welding Cable 	Range of Sizes: 1 Pair to 50 Pair Pakistan Cable's spec and as per others specification e.g Europeans,American, Japanese,etc (Excluding ultra violet treated cables) Range of Sizes: 16MM ² to 300MM ²	Armoured / Un-Armoured Rubber Sheathed	High Conductivity Copper Electrical Grade PVC	 Pakistan Cables Limited, B-21, SITE, P.O. Box No.5050, Karachi - 75700 Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore Fast Cables Ltd., 192-Y Block, Commercial
		iii) LSF Cable / HFFR for all GWC/LV/MV/ Flexible cable	BSS-638 (Excluding ultra violet treated cables) Range of Sizes: as per Customers requirement IEC-60502, BSS-7211, BSS-6724 Also as per others specification. e.g Europeans,American, Japanese,etc (Excluding ultra violet treated cables)	Low Smoke & Fume Halogen Free Fire Retarded	_	 Area, Phase-III, DHA, Lahore 4) Premier Cables (Pvt) Ltd., 43-E, Block 6, P.E.C.H.S., Behind FedEx, Off Razi Road, Shahrah-e-Faisal, Karachi
		iv) Insulated Cable	Drop Wire and Spiral - 4 Range of Sizes: as per Customers requirement (Excluding ultra violet treated cables)			
		v) Shooting Wire	Voltage Grade: upto 300/500 Volts (Excluding ultra violet treated cables)		High Conductivity Copper Electrical Grade PVC	 Pakistan Cables Limited, B-21, SITE, P.O. Box No.5050, Karachi - 75700 Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
		vi) Cables, co-axial	Cable Bond etc (Excluding ultra violet treated cables)			 Automate Industry, C-23, Estate Avenue, S.I.T.E., Karachi Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
953	85444910	Telephone Cables	All telephone cables i.e. telecommunication cables, indoor telephone cables, audio/radio frequency cables, junction cables, primary cables, secondary cables, jelly filled cables, drop wire, switch board & jumper cables. (Excluding ultra violet treated cables)		-	 Atlas Cables (Pvt) Limited, Karachi, 9th Floor Textile Plaza, Mumtaz Hasan Road, P.O. 5195, Karachi-74000 A.G.E. Cables, 97-A Industrial Estate Jamrud Road, Peshawar, Premier Cables (Pvt) Ltd., 43-E, Block 6, P.E.C.H.S., Behind FedEx, Off Razi Road, Shahrah-e-Faisal, Karachi Pakistan Telephone Cables, Room No. 107, Elahi Center, Preedy Street Saddar Karachi-74400 Pakistan Cables Limited, B-21, SITE, P.O. Box No.5050, Karachi - 75700 Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
954	85444920	i) General House Wiring (PVC)	3/.029", 7/.029", 3/.036", 7/.036", 7/.044", 7/.052", 7/.064" BS-2004, BS-6004	T/S, Elong, DC Resistance IR, HVT	Purity: 99.99%	1) H.M. Esmail & Co. (H.M. Cables), SB-5, Madina City Mall, 6th Floor , Abdullah Haroon

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		ii) Multicore core, flexible, flat type copper, insulated (all features together)	From 1 mm ² to 400 mm ² Voltage grade upto 1000 Volts BS 6004; BS 6346/BS 6500 (Excluding ultra violet treated cables)			Road, Karachi 2) Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore 3) Fast Cables Ltd. 192-Y Block, Commercial
		Electric Wire (Insulated)	3/.029", 7/.029", 3/.036", 7/.036", 7/.044", 7/.052", 7/.064"			Khawaja Electronics (Pvt) Ltd., 4-H, Gulberg-III, Lahore
955	85444990	i) General House Wiring (PVC)	3/.029", 7/.029", 3/.036", 7/.036", 7/.044", 7/.052", 7/.064" BS-2004, BS-6004	T/S, Elong, DC Resistance IR, HVT	Purity: 99.99%	 H.M. Esmail & Co. (H.M. Cables), SB-5, Madina City Mall, 6th Floor, Abdullah Haroon Road, Karachi Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
		ii) Air field lighting cable and Submersible Cables	Range of Sizes: as per Customers requirement Voltage Grade: a) Upto 5KV b) upto 600/1000 Volts As per customer required Specs and as per others specification. e.g Europeans,American, Japanese,etc (Excluding ultra violet treated cables)	PVC Sheathed	 High Conductivity Copper Electrical Grade PVC 	 Pakistan Cables Limited, B-21, SITE, P.O. Box No.5050, Karachi - 75700 Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore Premier Cables (Pvt) Ltd., 43-E, Block 6, P.E.C.H.S., Behind FedEx, Off Razi Road, Shahrah-e-Faisal, Karachi
		iii) Control Cables	With copper conductor 600/1000 volts WAPDA P100:2005 (Excluding ultra violet treated cables)			 Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore Fast Cables Ltd., 192-Y Block, Commercial
		iv) Insulated wire, cables	Single Core & Multicore (Including Co-axial cable) PVC/XLPE Range of Sizes: 0.5MM ² to 1000MM ² Voltage Grade: Up to 15KV BSS-6004, IEC-227, IEC-60227, IEC-502, IEC 60502, BSS- 6346. Also as per others specifications e.g Europeans, American, Japanese,etc (Excluding ultra violet treated cables)	Armoured / Un-Armoured PVC Sheathed	High Conductivity Copper Electrical Grade PVC XLPE	Area, Phase-III, DHA, Lahore 3) Pakistan Cables Limited, B-21, SITE, P.O. Box No.5050, Karachi - 75700
		v) L.V cable	Copper or Aluminium conductor. XLPE or PVC insulated cable. Single Core & Multicore Range of Sizes: 1.5MM ² to 1000MM ² Voltage Grade: upto 1900/3300 volts BSS-6346, IEC-502, IEC -60502. Also as per others specification.e.g Europeans, American, Japanese,etc (Excluding ultra violet treated cables)	Armoured / Un-Armoured PVC Sheathed	 High Conductivity Copper Aluminium Electrical Grade Electrical Grade PVC XLPE 	
		vi) M.V.Cables	Copper or Aluminium conductor, XLPE Insulated cable. SingleCore & Multicore Range of Sizes: 16MM ² to 630MM ² Voltage Grade: upto 15000 volts IEC-502 IEC - 60502. Also as per others specification.e.g Europeans, American, Japanese,etc (Excluding ultra violet treated cables)	Armoured / Un-Armoured PVC Sheathed	 High Conductivity Copper Aluminium Electrical Grade Electrical Grade PVC XLPE 	
		vii) Flexible Cables	Range of Sizes: 0.5MM ² to 630MM ² Voltage Grade: 300/500 Volts IEC-60227, BSS-6004, BSS-6500, IEC-227 Also as per others specification.e.g Europeans, American, Japanese etc (Excluding ultra violet treated cables)	Armoured / Un-Armoured PVC Sheathed	 High Conductivity Copper Electrical Grade PVC 	

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		viii) Control Cables PVC /XLPE Insulated	Range of Sizes: 5 Core to 61 Core Voltage Grade: upto 600/1000 Volts BSS-6346, IEC-502, IEC-60502. Also as per others specification.e.g Europeans, American, Japanese, etc (Excluding ultra violet treated cables)	Armoured / Un-Armoured PVC Sheathed	 High Conductivity Copper Electrical Grade PVC XLPE 	
		ix) Electric Cables	Upto 1000 Volts Sizes: 0.005mm to 630mm (Excluding ultra violet treated cables as well as, Cables with following Grades/ Specifications; AESS XF, ARX, AVXS, AVSSHF, CHFOS, FL-PE, HFSSF, SHE-J, SHSHYCJ, AEX F, AVSS XF, CAVS, CHFUS, HF, HF- ASAQ, HSHEQ, AVSSHF (Shield wire), YAEXF, TW20#02000, SHE-JF, HEBX, PEST, AEX, AVSSXCSS2FX1, AVXF, AVXSYF, AVX, HSHEJ, ARXF, AVSXY, AVSSXCS, AVSX, AVSXF, OHFAS, CIVUS, IVSSH, IVSSHF, ALVUS, ALVSS, PESXF/ PEXBS.			 Universal Cables Industries Ltd., 61-C, Jami Commercial Street # 7, Phase 7, D.H.A., Karachi. Newage Cables (Ptv) Ltd., Newage Mansion Mcleod Road, Lahore Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
		x) PVC wiring cable	From 1 mm2 to 1000 mm2 Voltage grade upto 1000 Volts BS 6004 (Excluding ultra violet treated cables as well as, Cables with following Grades/ Specifications; AESS XF, ARX, AVXS, AVSSHF, CHFOS, FL-PE, HFSSF, SHE-J, SHSHYCJ, AEX F, AVSS XF, CAVS, CHFUS, HF, HF- ASAQ, HSHEQ, AVSSHF (Shield wire), YAEXF, TW20#02000, SHE-JF, HEBX, PEST, AEX, AVSSXCSS2FX1, AVXF, AVXSYF, AVX, HSHEJ, ARXF, AVSXY, AVSSXCS, AVSX, AVSXF, AVSSX, SHE-HP, SHE-JB, VSSXTF, OHFAS, CIVUS, IVSSH, IVSSHF, ALVUS, ALVSS, PESXF/ PEXBS.			 Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
		xi) PVC Insulated Armoured Power Cable	From 16 mm ² to 1000 mm ² 600/1000 Volts BS 6346 (Excluding ultra violet treated cables)	-	••	
		xii) Low smoke zero helogen Cable	From 1 mm2 to 1000 mm2 Voltage grade upto 1000 Volts BS 7846 (Excluding ultra violet treated cables as well as, Cables with following Grades/ Specifications; AESS XF, ARX, AVXS, AVSSHF, CHFOS, FL-PE, HFSSF, SHE-J, SHSHYCJ, AEX F, AVSS XF, CAVS, CHFUS, HF, HF- ASAQ, HSHEQ, AVSSHF (Shield wire), YAEXF, TW20#02000, SHE-JF, HEBX, PEST, AEX, AVSSXCSS2FX1, AVXF, AVXSYF, AVX, HSHEJ, ARXF, AVSXY, AVSSXCS, AVSX, AVSXF, AVSSX, SHE-HP, SHE-JB, VSSXTF, OHFAS, CIVUS, IVSSH, IVSSHF, ALVUS, ALVSS, PESXF/ PEXBS.			 Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore Pakistan Cables Limited, B-21, SITE, P.O. Box No.5050, Karachi - 75700

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		xiii) Flame retardant cables	From 1 mm2 to 1000 mm2 Voltage grade upto 1000 Volts BS 6387 (Excluding ultra violet treated as well as, Cables with following Grades/ Specifications; AESS XF, ARX, AVXS, AVSSHF, CHFOS, FL-PE, HFSSF, SHE-J, SHSHYCJ, AEX F, AVSS XF, CAVS, CHFUS, HF, HF- ASAQ, HSHEQ, AVSSHF (Shield wire), YAEXF, TW20#02000, SHE-JF, HEBX, PEST, AEX, AVSSXCSS2FX1, AVXF, AVXSYF, AVX, HSHEJ, ARXF, AVSXY, AVSSXCS, AVSX, AVSXF, AVSSX, SHE-HP, SHE-JB, VSSXTF, OHFAS, CIVUS, IVSSH, IVSSHF, ALVUS, ALVSS, PESXF/ PEXBS.			
		xiv) Air Field Lighting cable	FAAL-824 IEC 502 (Excluding ultra violet treated cables)	-		 Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
		xv) Electric Wire (Insulated)	3/.029", 7/.029", 3/.036", 7/.036", 7/.044", 7/.052", 7/.064"			Khawaja Electronics (Pvt) Ltd., 4-H, Gulberg-III, Lahore
		xvi) ABC Cable LV	Low Voltage Aerial Bundled Cables (ABC) All sizes upto 630 mm sq			Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
		xvii) L.V Shielded Instrumentation Cable	Low Voltage shielded/screened (copper braiding/copper tape/tinned copper braiding/aluminium foil) instrumentation cables			
		xviii) L.V Fire Resistance Cable	Low Voltage Fire resistant cables 1 mm sq up to 630 mm sq			
		xix) L.V Solar Cable	Low Voltage Solar Cables (photo voltaic Cables) 1 mm sq up to 630 mm sq			
		xx) Cables with connector	Electric cables with connectors punched on either or both sides			Millennium Cable Industreies, 13 Km Multan Road, Lahore
		xxi) Power Cords	Electric cables with injection molded power show at one end and connectors at the other end.			
956	85446010	i) Underground XLPE Insulated Medium Voltage & High Voltage Cable	For Voltage exceeding 1,000 V but not exceeding 32,000 V			 Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore Pakistan Cables Limited, B-21, SITE, P.O. Box No.5050, Karachi - 75700
		ii) M.V Cable / ABC Cable MV	Medium Voltage Aerial Bundled Cables (ABC) All sizes up to 630 mm sq Medium voltage cables (MV) (3.6/6kV) (6.35/11kV) (8.7/15kV) (12/20kV) (18/30kV) (19/33kV)			Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore
957	85447000	i) General House Wiring (PVC)	3/.029", 7/.029", 3/.036", 7/.036", 7/.044", 7/.052", 7/.064" BS-2004, BS-6004	T/S, Elong, DC Resistance IR, HVT	Purity: 99.99%	 H.M. Esmail & Co. (H.M. Cables), SB-5, Madina City Mall, 6th Floor, Abdullah Haroon Road, Karachi Newage Cables (Pvt) Ltd., Newage Mansion Mcleod Road, Lahore Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company	Annex-I (Final Lis
		ii) Optical fibre cables	 Direct Buried/Armoured from 1 to 288 fiber count standard loose tube design (both dry block and jelly filled construction) Duct Type/un-Armoured from 1 to 288 fiber count standard loose tube design (both dry block and jelly filled construction) All Dielctic Self Supporting Aerial cable (ADSS) Un-armoured from 1 to 288 fibre count standard loose tube design (both dry block and jelly filled construction) Single Mode and Multimode, Buried Cable, Duct Cable, Arial Cable, Central loose tube cable, Gc-652 complied and Gc-655 Complied. Patch Cord and pigtail (all connector type) Single mode and Multimode Patch Cord, Pigtail. (Excluding ultra violet treated cables) 	Cable dia 12 to 18 mm.	The cable is manufactured with several co-polymer coated and several other materials like PBT,Thixotropic	 Celmore Cable Industries (Pvt) Ltd., Plot No. 13, Phase 4, Hattar Industrial Estate, District Haripur, NWFP Fast Cables Ltd., 192-Y Block, Commercial Area, Phase-III, DHA, Lahore Premier Cables (Pvt) Ltd., 43-E, Block 6, P.E.C.H.S., Behind FedEx, Off Razi Road, Shahrah-e-Faisal, Karachi LT Engineering & Trade Services (Pvt) Ltd., Lub Thatto, Hassanabdal-43730 	
958	85452000	Carbon Brush	Carbon Graphite	Electrical	Various	Flecbon Corporation, OT 204, 2nd Floor, Techno City Office Tower, Hasrat Mohani Road, Off. I.I. Chundgrigar Road, Opp. Uni Plaza, P.O. Box 6123, Karachi	
959	85462000	Insulators	Power Insulators	Tensile Strength of Insulators, 70Kn to 120KN		Emco Industries Limited, 4th-Floor, National Tower, 28-Edgerton Road, Lahore	
960	85469000	 i) Insulators, electric, excluding glass and ceramic 	95 BIL at 210 PMA Size dia.75x130mm =17373 N as per Din 1451, CEI-ICE273 Size dia. 84x175mm =11938 N as per Din 1451, CEI-ICE273			Schneider Electric Pakistan (Pvt) Ltd., (formerly AREVA T& D Pakistan (Pvt) Ltd), D-163, S.I.T.E Karachi	
		 ii) Insulator; (LT ABC) for D-Clamp 5-½" (LT ABC) for D-Clamp 3-½" 	LT ABC Insulator bundle holder	PA 66 with 30% GF		Alsons Industries (Pvt) Ltd., S-18, S.I.T.E., Karachi	
		iii) 11 KV Silicon Rubber InsulatorType DO Cut-out	11 KV Dropout Cut -out (Silicon Rubber Type)	Copper 99.9%, Brass, Steel, Glass Fibber, Silicon Tube, MS Sheet, MS Hardware			
961	86071900	Wheels, locomotives or rolling-stock	Traction Pinion and Gears 17T, 18,T, 19T, 24T, 60T, 92 Teeth			Pakistan Machine Tool Factory (Pvt) Limited PMTF Road, Off National Highway, Landhi, Karachi-75030	
962	87053000	Fire Fighting Vehicles	Fire fighting vehicles, built on locally-available Chasis	Truck Mounted Trailer Mounted		 Haseen Habib Corporation [Pvt] Limited, 123/3 Quaid e Azam Industrial Estate, Lahore Colibrative Heavy Industries (Pvt) Limited., Chowk Saeed, Sagian Bypass Road, Shahdhara, Kot Abdul Malik, Lahore Meraj (Pvt) Limited, Plot No. 11, Sector 15, Korangi Industrial Area, P.O. Box 3135 Karachi – 74900 Metal Engineering Works (Pvt) Ltd., S-4, S.I.T.E., Karachi Automobile Corp. of Pakistan (Pvt) Ltd., 14, Dockyard Road, West Wharf, Karachi Pakistan Vehicle Engineering (Pvt) Ltd., D- 134, S.I.T.E, Manghopir Road, Karachi Javaid Industrial Company (JIC), Jinnah Interchange G.T. Road, Gujranwala Shaheen Tank Trailers Manufacturing Company (Pvt) Ltd., Plot #306,Wali Town Near Port Qasim Mor, National Highway Karachi. 	

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
963	87059000	 i) Truck Mounted Drlling Rigs and accessories ii) Vehicle Mounted Logging, Geophysical Instruments 	Drilling Depth Capacity upto 2000 meter Logging Depth Capacity upto 2000 meter			Better Engineered Solutions (Pvt) Ltd. 102, Pacific Centre, F-8 Markaz Islamabad
		iii) Special Purpose Vehicles	Suction and jetting vehicles, Crash Tender, Rescue vehicle, Beach sweeper, Tank transporter, Mobile workshop, Mobile kitchen, Mobile toilets, Recovery Vehicles/cranes, Wreckers, Tow Trucks, Skip Loaders, Street Sweeper, Cranes, Aerial Ladder, Insualted Aerial, Platform /utility truck, Snorkel, Flatbed Trailer, Low Bed Trailer, Scissor Lift /cross lift, Refuse Compactor, Collector truck, Rotavator (Tractor attachment), Hi Catering Truck	Truck Mounted Trailer Mounted, etc		 Metal Engineering Works (Pvt) Ltd., S-4, S.I.T.E., Karachi Colibrative Heavy Industries (Pvt) Limited., Chowk Saeed, Sagian Bypass Road, Shahdhara, Kot Abdul Malik, Lahore Meraj (Pvt) Limited, Plot No. 11, Sector 15, Korangi Industrial Area, P.O. Box 3135 Karachi – 74900 Automobile Corp. of Pakistan (Pvt) Ltd., 14, Dockyard Road, West Wharf, Karachi Pakistan Vehicle Engineering (Pvt) Ltd., D- 1134, S.I.T.E, Manghopir Road, Karachi Gujrat Steel (Pvt) Ltd., 183 A.M,Shahrah-e- Iraq, Saddar, Karachi Javaid Industrial Company (JIC), Jinnah Interchange G.T. Road, Gujranwala Shaheen Tank Trailers Manufacturing Company (Pvt) Ltd., Plot #306, Wali Town Near Port Qasim Mor, National Highway Karachi.
		iv) Fuel / Water Bowzers	1 Cubic meter To 50 Cubic meter			TDFC (Pvt) Ltd., East Pharange Drainage, Millat Town, Millat Road, Faisalabad
964	87079090	Stationary Compactor	Special Purpose			 Javaid Industrial Company (JIC), Jinnah Interchange G.T. Road, Gujranwala Shaheen Tank Trailers Manufacturing Company (Pvt) Ltd., Plot #306, Wali Town Near Port Qasim Mor, National Highway Karachi.
965	87162090	i) Mobile Frac Tank / Skid Mounted Frac Tank	Capacity: 100 BBL upto 600 BBL Or as per our client requirement	Design Code: ASME Material: Carbon Steel Internal Lining: Fibercoating /Epoxy	Support stimulation fluids upto 16%	Al-Jassar Engineering Co., 3 KM from Brahama Interchange M1, Jhang Bahtar Road, Near By Multi Orchids Residencia, Islamabad.
		ii) Mobile Frac Tank / Skid Mounted Frac Tank	Capacity: 10 Ton upto 50 Ton Or as per our client requirement.	Design Code: ASME Material: S.S 316, SS 316L, SS 304, SS 304L, ASTM A516 Gr. 70. Internal Lining: Rubber Lining	Support acid upto 34%	
		iii) Dedicated made trailers for special equipment	Capacity: 30 Ton uoto 80 Ton Or as per our client requirement.	Material: Carbon Steel		
		iv) Cement Bulker / Bulk Cement Transporter	Used for Bulk cement transport. Capacity: 25 Ton upto 80 Ton Or as per our client requirement.	Design Code: ASME Material: Carbon Steel. Test Pressure: 45 psig Working Pressure: 30 psig		
966	87163190	Cement Bulker / Bulk Cement Transporter	Used for Bulk cement transport. Capacity: 25 Ton upto 80 Ton Or as per our client requirement.	Design Code: ASME Material: Carbon Steel. Test Pressure: 45 psig Working Pressure: 30 psig		Al-Jassar Engineering Co., 3 KM from Brahama Interchange M1, Jhang Bahtar Road, Near By Multi Orchids Residencia, Islamabad.
967	87163990	 Mobile Frac Tank / Skid Mounted Frac Tank 	Capacity: 100 BBL upto 600 BBL Or as per our client requirement	Design Code: ASME Material: Carbon Steel Internal Lining: Fibercoating /Epoxy	Support stimulation fluids upto 16%	Al-Jassar Engineering Co., 3 KM from Brahama Interchange M1, Jhang Bahtar Road, Near By Multi Orchids Residencia, Islamabad.

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		ii) Mobile Frac Tank / Skid Mounted Frac Tank	Capacity: 10 Ton upto 50 Ton Or as per our client requirement.	Design Code: ASME Material: S.S 316, SS 316L, SS 304, SS 304L, ASTM A516 Gr. 70. Internal Lining: Rubber Lining	Support acid upto 34%	
		iii) Dedicated made trailers for special equipment	Capacity: 30 Ton uoto 80 Ton Or as per our client requirement.	Material: Carbon Steel		
		iv) Cement Bulker / Bulk Cement Transporter	Used for Bulk cement transport. Capacity: 25 Ton upto 80 Ton Or as per our client requirement.	Design Code: ASME Material: Carbon Steel. Test Pressure: 45 psig Working Pressure: 30 psig		
968	87164010	Dedicated made trailers for special equipment	Capacity: 30 Ton uoto 80 Ton Or as per our client requirement.	Material: Carbon Steel		Al-Jassar Engineering Co., 3 KM from Brahama Interchange M1, Jhang Bahtar Road, Near By Multi Orchids Residencia, Islamabad.
969	87164090	Cement Bulker / Bulk Cement Transporter	Used for Bulk cement transport. Capacity: 25 Ton upto 80 Ton Or as per our client requirement.	Design Code: ASME Material: Carbon Steel. Test Pressure: 45 psig Working Pressure: 30 psig		Al-Jassar Engineering Co., 3 KM from Brahama Interchange M1, Jhang Bahtar Road, Near By Multi Orchids Residencia, Islamabad.
970	87168010	Cement Bulker / Bulk Cement Transporter	Used for Bulk cement transport. Capacity: 25 Ton upto 80 Ton Or as per our client requirement.	Design Code: ASME Material: Carbon Steel. Test Pressure: 45 psig Working Pressure: 30 psig		Al-Jassar Engineering Co., 3 KM from Brahama Interchange M1, Jhang Bahtar Road, Near By Multi Orchids Residencia, Islamabad.
971	87168090	Cement Bulker / Bulk Cement Transporter	Used for Bulk cement transport. Capacity: 25 Ton upto 80 Ton Or as per our client requirement.	Design Code: ASME Material: Carbon Steel. Test Pressure: 45 psig Working Pressure: 30 psig		Al-Jassar Engineering Co., 3 KM from Brahama Interchange M1, Jhang Bahtar Road, Near By Multi Orchids Residencia, Islamabad.
972	88079000	Drop tanks and air dispensers	Drop tanks and air dispensers for aircraft			Heavy Mechanical Complex (Pvt) Ltd., Taxila
973	89011000	All types /sizes floating vessels / ships, Submarines, etc.Mine Hunters / Sweepers, Destroyers, Frigates, Corvettes, Missile Crafts, Gun Boats, Patrol vessels, LCMs, MCMVs, all inshore and offshore crafts, Landing craft/Platform Dock, Tankers, Carriers, Boats, Containers, Trawlers, Pushers, Tugs, Dredgers, Ships, Tenders, Barges, Tugs, Cranes, Pontoons, etc.	As per client's requirement	Steel / Aluminum / Composite material		Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi
974	89012000	All types /sizes floating vessels / ships, Submarines, etc.Mine Hunters / Sweepers, Destroyers, Frigates, Corvettes, Missile Crafts, Gun Boats, Patrol vessels, LCMs, MCMVs, all inshore and offshore crafts, Landing craft/Platform Dock, Tankers, Carriers, Boats, Containers, Trawlers, Pushers, Tugs, Dredgers, Ships, Tenders, Barges, Tugs, Cranes, Pontoons, etc.	As per client's requirement	Steel / Aluminum / Composite material		Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
975	89013000	All types /sizes floating vessels / ships, Submarines, etc.Mine Hunters / Sweepers, Destroyers, Frigates, Corvettes, Missile Crafts, Gun Boats, Patrol vessels, LCMs, MCMVs, all inshore and offshore crafts, Landing craft/Platform Dock, Tankers, Carriers, Boats, Containers, Trawlers, Pushers, Tugs, Dredgers, Ships, Tenders, Barges, Tugs, Cranes, Pontoons, etc.	As per client's requirement	Steel / Aluminum / Composite material		Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi
976	89019000	All types /sizes floating vessels / ships, Submarines, etc.Mine Hunters / Sweepers, Destroyers, Frigates, Corvettes, Missile Crafts, Gun Boats, Patrol vessels, LCMs, MCMVs, all inshore and offshore crafts, Landing craft/Platform Dock, Tankers, Carriers, Boats, Containers, Trawlers, Pushers, Tugs, Dredgers, Ships, Tenders, Barges, Tugs, Cranes, Pontoons, etc.	As per client's requirement	Steel / Aluminum / Composite material		Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi
977	89020000	All types /sizes floating vessels / ships, Submarines, etc.Mine Hunters / Sweepers, Destroyers, Frigates, Corvettes, Missile Crafts, Gun Boats, Patrol vessels, LCMs, MCMVs, all inshore and offshore crafts, Landing craft/Platform Dock, Tankers, Carriers, Boats, Containers, Trawlers, Pushers, Tugs, Dredgers, Ships, Tenders, Barges, Tugs, Cranes, Pontoons, etc.	As per client's requirement	Steel / Aluminum / Composite material		Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi
978	89032100	All types /sizes floating vessels / ships, Submarines, etc.Mine Hunters / Sweepers, Destroyers, Frigates, Corvettes, Missile Crafts, Gun Boats, Patrol vessels, LCMs, MCMVs, all inshore and offshore crafts, Landing craft/Platform Dock, Tankers, Carriers, Boats, Containers, Trawlers, Pushers, Tugs, Dredgers, Ships, Tenders, Barges, Tugs, Cranes, Pontoons, etc.	As per client's requirement	Steel / Aluminum / Composite material		Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
979	89032200	All types /sizes floating vessels / ships, Submarines, etc.Mine Hunters / Sweepers, Destroyers, Frigates, Corvettes, Missile Crafts, Gun Boats, Patrol vessels, LCMs, MCMVs, all inshore and offshore crafts, Landing craft/Platform Dock, Tankers, Carriers, Boats, Containers, Trawlers, Pushers, Tugs, Dredgers, Ships, Tenders, Barges, Tugs, Cranes, Pontoons, etc.	As per client's requirement	Steel / Aluminum / Composite material		Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi
980	89032300	All types /sizes floating vessels / ships, Submarines, etc.Mine Hunters / Sweepers, Destroyers, Frigates, Corvettes, Missile Crafts, Gun Boats, Patrol vessels, LCMs, MCMVs, all inshore and offshore crafts, Landing craft/Platform Dock, Tankers, Carriers, Boats, Containers, Trawlers, Pushers, Tugs, Dredgers, Ships, Tenders, Barges, Tugs, Cranes, Pontoons, etc.	As per client's requirement	Steel / Aluminum / Composite material		Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi
981	89033100	Fiber Glass Boats	Ranging from 10 ft to 70 ft long (International Maritime Specs)	As per Standard	As per Standard	 Business & Engineering Trends, 100-A Wazir Ali Road, Upper Mall, Opposite Lahore Gymkhana Lahore Fibre Craft Industries, Canal Bank Hanif Park Harbanspura Lahore - 54850
982	89033200	All types /sizes floating vessels / ships, Submarines, etc.Mine Hunters / Sweepers, Destroyers, Frigates, Corvettes, Missile Crafts, Gun Boats, Patrol vessels, LCMs, MCMVs, all inshore and offshore crafts, Landing craft/Platform Dock, Tankers, Carriers, Boats, Containers, Trawlers, Pushers, Tugs, Dredgers, Ships, Tenders, Barges, Tugs, Cranes, Pontoons, etc.	As per client's requirement	Steel / Aluminum / Composite material		Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
983		All types /sizes floating vessels / ships, Submarines, etc.Mine Hunters / Sweepers, Destroyers, Frigates, Corvettes, Missile Crafts, Gun Boats, Patrol vessels, LCMs, MCMVs, all inshore and offshore crafts, Landing craft/Platform Dock, Tankers, Carriers, Boats, Containers, Trawlers, Pushers, Tugs, Dredgers, Ships, Tenders, Barges, Tugs, Cranes, Pontoons, etc.	As per client's requirement	Steel / Aluminum / Composite material		Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi
984	89039900	Fiber Glass Boats	Ranging from 10 ft to 70 ft long (International Maritime Specs)	As per Standard	As per Standard	 Business & Engineering Trends, 100-A Wazir Ali Road, Upper Mall, Opposite Lahore Gymkhana Lahore Fibre Craft Industries, Canal Bank Hanif Park Harbanspura Lahore - 54850
985		All types /sizes floating vessels / ships, Submarines, etc.Mine Hunters / Sweepers, Destroyers, Frigates, Corvettes, Missile Crafts, Gun Boats, Patrol vessels, LCMs, MCMVs, all inshore and offshore crafts, Landing craft/Platform Dock, Tankers, Carriers, Boats, Containers, Trawlers, Pushers, Tugs, Dredgers, Ships, Tenders, Barges, Tugs, Cranes, Pontoons, etc.	As per client's requirement	Steel / Aluminum / Composite material		Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi
986	89051000	All types /sizes floating vessels / ships, Submarines, etc.Mine Hunters / Sweepers, Destroyers, Frigates, Corvettes, Missile Crafts, Gun Boats, Patrol vessels, LCMs, MCMVs, all inshore and offshore crafts, Landing craft/Platform Dock, Tankers, Carriers, Boats, Containers, Trawlers, Pushers, Tugs, Dredgers, Ships, Tenders, Barges, Tugs, Cranes, Pontoons, etc.	As per client's requirement	Steel / Aluminum / Composite material		Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
987	89052000	All types /sizes floating vessels / ships, Submarines, etc.Mine Hunters / Sweepers, Destroyers, Frigates, Corvettes, Missile Crafts, Gun Boats, Patrol vessels, LCMs, MCMVs, all inshore and offshore crafts, Landing craft/Platform Dock, Tankers, Carriers, Boats, Containers, Trawlers, Pushers, Tugs, Dredgers, Ships, Tenders, Barges, Tugs, Cranes, Pontoons, etc.	As per client's requirement	Steel / Aluminum / Composite material		Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi
988	89059000	All types /sizes floating vessels / ships, Submarines, etc.Mine Hunters / Sweepers, Destroyers, Frigates, Corvettes, Missile Crafts, Gun Boats, Patrol vessels, LCMs, MCMVs, all inshore and offshore crafts, Landing craft/Platform Dock, Tankers, Carriers, Boats, Containers, Trawlers, Pushers, Tugs, Dredgers, Ships, Tenders, Barges, Tugs, Cranes, Pontoons, etc.	As per client's requirement	Steel / Aluminum / Composite material		Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi
		Light-vessels	Range up to 4mm ~ 20 mm plate thickness			 Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000 Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan
989	89061000	All types /sizes floating vessels / ships, Submarines, etc.Mine Hunters / Sweepers, Destroyers, Frigates, Corvettes, Missile Crafts, Gun Boats, Patrol vessels, LCMs, MCMVs, all inshore and offshore crafts, Landing craft/Platform Dock, Tankers, Carriers, Boats, Containers, Trawlers, Pushers, Tugs, Dredgers, Ships, Tenders, Barges, Tugs, Cranes, Pontoons, etc.	As per client's requirement	Steel / Aluminum / Composite material		Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
990	89069000	All types /sizes floating vessels / ships, Submarines, etc.Mine Hunters / Sweepers, Destroyers, Frigates, Corvettes, Missile Crafts, Gun Boats, Patrol vessels, LCMs, MCMVs, all inshore and offshore crafts, Landing craft/Platform Dock, Tankers, Carriers, Boats, Containers, Trawlers, Pushers, Tugs, Dredgers, Ships, Tenders, Barges, Tugs, Cranes, Pontoons, etc.	As per client's requirement	Steel / Aluminum / Composite material		Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi
991	89079000	i) Tanks, storage, floating	All type of floating storage tanks for oil feilds	Skid mounted storage tanks for fuels, eatable oils and water, round storage tankds with fixed proof for oil/ fuel, Round storage with floating roof for oil/ fuel.		 Metal Engineering Works (Pvt) Ltd., S-4, S.I.T.E., Karachi Ravi Green Engineering (Pvt.) Ltd. 20th km (Pajian) Raiwind Road Lahore, Punjab, 54000 Pakistan
		ii) Storage Tanks/Pressure Vessels	Reservoirs, Tanks, Road Tankers, Deaerator Tanks, Feed Water Tanks, Clarified Tanks, Underground Tanks, Skid Mounted Fuel Tank Capacity: as per our client requirement.	Design Code: API 650 / ASME Material: Carbon Steel Internal Lining: Fibercoating/Epoxy	Support stimulation fluids/acid upto 16%	 Al-Jassar Engineering Co., 3 KM from Brahama Interchange M1, Jhang Bahtar Road, Near By Multi Orchids Residencia, Islamabad. Karachi Shipyard & Engineering Works Ltd., West Wharf Dockyard P.O. Box 4419, Karachi
992	90172000	i) Geometry Box ii) Compass iii) Scales iv) Rulers (6 inches,8 inches & 12 inches)	- All Type Mathematical Geometry Box & Metal Compass for Students.	-Polypropylene -SAN RESIN -ABS -Zinc Alloy		 Brother Industries, 190/1, Sector 23, Korangi Industrial Area, Karachi 2)Toray Plast, Al Jannat Road, Saggian Ravi By Pass, Nain Sukh, Lahore Oro Industries, 86-87, Sector 23, Korangi Industrial, Karachi
993	90183110	 Regular Syringes with needles ii) Insulin Syringes with needles 	1-CC, 3-CC, 5-CC, 10-CC, 20-CC, 50-CC, 60-CC 1-ml, 1-CC	E.O. Sterilized, 3-part, luer or slip lock, gasket, plunger, barrel. Precise calibrate graduation barrel mark scale printing. Needle with color hub. E.O Sterlized single use 1-ml/CC insulin	Medical grade raw materials	Silver Surgical Complex (Pvt.) Ltd., Silver House, 11/E, Block-6, P.E.C.H.S., Karachi
		ii) insuin syringes with needles	1-mi, 1-cc	Unibody syringe with self destructive plunger, precise calibrate graduation barrel mark scale printing.		
994	90183120	Regular Syringes without needles	1-CC, 3-CC, 5-CC, 10-CC, 20-CC, 50-CC, 60-CC	E.O. Sterilized, 3-part, luer or slip lock, gasket, plunger, barrel. Precise calibrate graduation barrel mark scale printing. Needle with color hub.	Medical grade raw materials	Silver Surgical Complex (Pvt.) Ltd., Silver House, 11/E, Block-6, P.E.C.H.S., Karachi
995	90183940	 i) Intravenous Catheters / IV Cannula and parts ii) One ways strengt (2 more strengt) 	14-G, 16-G, 18-G, 20-G, 22-G, 24-G, 26-G	E.O. Gas sterilized Radio Opaque Catheter tube. Stainless Steel needle with sharp grinded tip for easy insertion and painless cannulization. Providing of a vent fitting preventing blood escape and medicine. (3-types, injection port and straigth).	Medical grade raw materials	Silver Surgical Complex (Pvt.) Ltd., Silver House, 11/E, Block-6, P.E.C.H.S., Karachi
		ii) One way stopper/ 3-way stopper	Connector for I.V. Cannula/ catheter	E.O. Sterilized, Blister pack, connector.	Medical grade raw materials	
996	90184900	i) Scalers, dental	High grade			Acumen Surgical (Pvt) Ltd., Jinnah Town, Capital Road, Sialkot

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		ii) Dental Operatory system complete	Dental Unit Dental Chair Dental Light Dental stools Dental Suction Comprising of unit, dental chair, compressor, suction,	Metals:- Iron sheet, angle Iron, Brass, SS; Casting of aluminum, Bolts, Nuts & Screws, Welding Rods etc Electrical/Electronics: Electric, cables & connection, IC, transistor, resistor, PC board, Limit Switch, rubber material, glass, Cables, Membrane sheet, Panel switches, Foot Switches, Variable Switches, Foot Switches, Variable Switches, Presser Pipes Connector Cylinder, ORings, Gears <u>Pneumatics</u> : Foot controller, Pneumatics, valves, Tubes, Switches, pull back & master valve. <u>Plastic/UPVC/Rubber</u> : Foam upholstery UPVC tubing, silicone sheet packing material <u>Misc</u> : Porcelen /Ceramic bowl, Glass reflector, LED's etc., Stoving paint, plastic Epoxy, Quoting paint, Wooden seats, head rest, packaging.	Fiber glass chrome Nickle Cadmium plating process Hydraulic oil Acid phosphate UPVC rubber	Westech Pvt Ltd., 69-C, Ghaus-ul-Azam Road, Lahore
997	90268000	i) Online Pressure Monitoring Solution				Digitec Systems, Plot No. 178, Sector-24, Korangi Industrial Area, Karachi.
		 ii) Self Operated Regulator (043) iii) Temperproof Regulator (Small / Large Size) 	3/4" NPTF Capacity 500 to 600 3/4" NPTF Capacity 4000 to 5000 1/2"x1/2" Low / High Capacity 8" W.C	Denisty 2.65 g/cm3 Freezing 575-565 Elongation 30%	LM-6, Al-86%, Si-12%, Other 2%	Sindh Standard Engineering Works, F-713-A, S.I.T.E, Metrovill, Karachi
998	90281000	i) Gas Metering Skid	Senior/ Junior Orifice	-	-	Descon Engineering Limited, DESCON Manufacturing Business Area, 2 KM Defence road, Off: KM Multan Road, Chung Lahore – 53000
		ii) Gas Meters, Parts thereof	Aluminum Body, Case & Covers of Gas Meter Gas Meter G 1.6 Gas Meter G 4, Gas Memter V3			Pakistan Machine Tool Factory (Pvt) Limited PMTF Road, Off National Highway, Landhi, Karachi-75030
		iii) Gas Meters	Gas Meter (G-1.6) with Non-Return Valve - Cyclic Volume 0.8 liter - Maximum Operating Pressure 0.5 bar - Qmax 2.5m³/hr - Qmin 0.016m³/hr - Temp. Range -20 °C to +50 °C Gas Meter (G-4) with Non-Return Valve - Cyclic Volume 1.2 liter - Maximum Operating Pressure 0.5 bar - Qmax 6m³/hr - Qmin 0.04m³/hr - Temp. Range -20 °C to +50 °C			Sui Southern Co. Ltd., (Meter Manufacturing Plant), ST-B/B-14, Sir Shah Muhammad Suleman Road, Gulshan-e-Iqbal, Karachi
999	90283000	i) Meters, electricity	Solid State & Pre Paid Energy Meter		-	MicroTech Industries (Pvt.) Ltd., Attari Industrial Estate, Plot # 2, Street # 2, 18 KM. Ferozepur Road, Lahore

Product Description	Specifications	Physical Properties	Chemical Properties	Company
ii) Meters, electricity	 Single Phase AC Energy Meters, 10/40 Amps, 240V, 50 Hz Accuracy Class-2 housed in polycarbonate meter box with magnetic bearing. Single Phase Meters 10 to 60 Amps Phase Meters 10 to 100 Amps CT & PT Operated 3 Pahse Meters 5 Amps 3-Phase, 4-wire, 3-Element, Electromechanical AC Energy Meters, 15(90) Amps, 230/400V, 50 Hz, Accuracy Class 2.0 Housed in polycarbonate Meter box with L.E.D.s with Magnetic Bearings. Static 3-Phase, 4-wire, whole current energy meter with multi rate tariff (Class-1) in polycarbonate cover. 			 Escorts Pakistan Ltd, Escorts House, 26- Davis Road, Lahore KBK Electronics (Pvt) Ltd., (formerly SB Electronics Engineering & Control (Pvt) Ltd.), 86, Tariq Block, New Garden Town, Lahore
iii) Meters, electricity	- Single / Three Phase Electronic/ Electromechanical Meter, 220 volts, 400 volts and 50 c/s, MDI Meter (LT/HT), KVARH Meter (LT/HT), Three Phase CT Operated Electronic Meter, Prepaid Meter, Electronic Module for MDI, Meter components i.e., Current Coil Assy, Potential Coil Assy, Rotor Assy, Brake Magnet Assy, Meter Base Assy, Meter Fame, Meter Cover Assy, Meter Security Box, Terminal Block Assy & Brass/Copper Terminals,			 Syed Bhais (Pvt) Ltd., 200 Ferozepur Road Lahore 54600 Pakistan Elektron Limited (PEL), 14- Kilometer, Ferozepur Road Lahore
iv) Static Single Phase Energy Meters	For measurement of KWH and MDI (Maximum Demand Indicator) for domestic and commercial users with anti tampering features. (As per WAPDA's design)			Creative Engineering (Pvt) Ltd., 160/ S, Q.I.E. Kot Lakhpat Lahore
 v) Static Three Phase Whole Current Energy Meters 	Three Phase 04 wire TOD (Time of Day) and MDI (Maximum Demand Indicator) multiple tariff meter, anti tampering, date and time recording features. (As per WAPDA's design)			
vi) 3 Phase 4 wire LT (TOU) CT Operated Static Energy Meters	Static 3 phase 4 wire multi-rate meters for measurement of active & reactive energy/ load, with memory features to record events and transfer data. (As per WAPDA's design).			
vii) 3 Phase 4 wire HT (TOU) CT & PT Operated Static Energy Meters	For measurement of active, reactive energy, Indicating Maximum Demand/ load profile with specific characteristics to store and transfer data. (As per WAPDA's design).	-		
viii) Static 1-Phase Energy Meter	Static 1-Phase, 2-Wire, 240V, 10(40) Amp, 50Hz, Energy Meter with Accuracy Class 0.1			MicroTech Industries (Pvt.) Ltd., Attari Industrial Estate, Plot # 2, Street # 2, 18 KM.
ix) Static 3-Phase Energy Meter	Static 3-Phase, 4-Wire, 3-Element, 3x230/400 V, 10(100)Amp, 50Hz Whole Current Energy Meter having Accuracy Class 1.0 Active Energy & Accuracy Class 2.0 Reactive			Ferozepur Road, Lahore
x) LT type CT Operated Energy Meter	LT type TOU CT operated, 3-Phase, 4-Wire, 3-Element, 3x230/400V, 5/10Amp, 50Hz Energy Meter having Accuracy Class 1.0 kWh & Accuracy Class 2.0 kvarh		-	
xi) RF enabled Static 1-Phase Energy Meter	RF enabled Static 1-Phase, 2-Wire, 240V, 10(40) Amp, 50Hz, Accuracy Class 0.1 Energy Meter with Built-in RF Module			
xii) RF enabled Static 3-Phase Energy Meter	RF enabled Static 3-Phase, 4-Wire, 3-Element, 3x230/400 V, 10(100)Amp, 50Hz, Accuracy Class 1.0 kWh & Accuracy Class 2.0 kvarh Whole Current Energy Meter with Built-in RF Module			
xiii) AMR enabled Static 1-Phase Energy Meter	AMR enabled Static 1- Phase, 2-Wire, 240V, 50 Hz, 10/40 Amp, Accuracy Class 1.0, Energy Meter DLMS/COSEM complaint, with built-in GSM/GPRS communication module			

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		xiv) AMR enabled Static 3-Phase Energy Meter	AMR enabled 3-Phase Whole Current, 230/400V, 3- Phase, 4- Wire, 50 Hz, 10/100 Amp, Accuracy Class 1.0 kWh & Accuracy Class 2.0 kvarh, Static Energy Meter, DLMS/COSEM complaint with built-in GSM/GPRS communication module			
		xv) AMR enabled LT type CT operated Energy Meter	AMR enabled LT type CT operated, 3-Phase, 4-Wire, 3- Elements, 3× 230/400 V, 5(10) Amp, 50 Hz, Accuracy Class 1.0 for kWh & Accuracy Class 2.0 for kvarh Energy Meter with built-in GSM/GPRS communication module		-	
		xvi) AMR enabled HT type CT & PT operated Energy Meter	AMR enabled HT type CT & PT operated, 3-Phase, 4-Wire, 3- Elements, 3× 63.5/110V, 5(10) Amp, 50 Hz, Accuracy Class 1.0 for kWh & Accuracy Class 2.0 for kvarh Energy Meter with built-in GSM/GPRS communication module		-	
		xvii) AMR enabled HT LT type Energy Meter Accuracy Class 0.5S	AMR enabled HT LT type CT & PT operated, 3-Phase, 4-Wire, 3-Elements, 3×63.5/110V, 230/400 V, 5(10) Amp, 50 Hz, Accuracy Class 0.5S for kWh & Accuracy Class 2.0 for kvarh Energy Meter with built-in GSM/GPRS communication module			
		xviii) AMR enabled Static 1-Phase Prepaid Energy Meter	AMR enabled Static 1- Phase, 2-Wire, 240V, 50 Hz, 10/40 Amp, Accuracy Class 1.0, Energy Meter DLMS/COSEM complaint, with built-in GSM/GPRS communication module with connect / disconnect relay			
		xix) AMR enabled Static 3-Phase Prepaid Energy Meter	AMR enabled 3-Phase Whole Current, 230/400V, 3- Phase, 4- Wire, 50 Hz, 10/100 Amp, Accuracy Class 1.0 kWh & Accuracy Class 2.0 kvarh, Static Energy Meter, DLMS/COSEM complaint with built-in GSM/GPRS communication module with connect / disconnect relay			
		xx) Static 3-Phase Bi-Directional Energy Meter	Static 3-Phase, 4-Wire, 3-Element, 3x230/400 V, 10(100)Amp, 50Hz Whole Current Bi-Directional for Net / Green Metering Energy Meter having Accuracy Class 1.0 Active Energy & Accuracy Class 2.0 Reactive			
1000	90289090	Online Temperature/Energy Monitoring Solution GSM Based				Digitec Systems, Plot No. 178, Sector-24, Korangi Industrial Area, Karachi.
1001	90304000	Smart GPRS Terminal (SmartGT)	Power input: 12 to 28Vdc @ 200mA, Digital Input: 6 x Dry Control Alarms, Analog Inputs: Temperature Sensor up to 2.5 Vdc, Fuel Sensor (4-2.5 mA) . 3rd Party Communication Port : RS232, Communication with slave devices (RTUs) : RS485 port / MODBUS. Smart GT is a RS485 gateway terminal for data collection of remote equipment. It is capable of communicating site hardware and transferring processed data in user-defined customized protocol to central RMS server.	Enclosure: Extruded Aluminium, Powder coated Mounting Style: Din Rail. Dimensions: 85x62x93 mm; Weight : 410 g		SalTec Powerlink, 1-A/2, Sector 15, Korangi Industrial Area, Karachi
1002	90308900	DC Power Controller (DPC)	Operating Voltage: 12-60 Vdc, Power Consumption : < 5watts, No. of Dry Contacts / Alarms : x6,DC Current Measurement : Up to 4 Tenants with 1 default CT (± 200A). Remote Monitoring : via RS485 interface DPC is an all-in-one DC management solution for BTS Battery Health Monitoring System, DC Tenant power to energy monitoring, Site Alarms Monitoring, Genset / Battery Cycling Control for hybrid action, Temperature Sensor for Batteries.	Enclosure: Extruded Aluminium, Powder coated Mounting Style: Din Rail. Dimensions: 125x165x70 mm Weight : 610 g		SalTec Powerlink, 1-A/2, Sector 15, Korangi Industrial Area, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company	<u>Annex-I (Final List)</u>
		Power Measurement Module (PMM)	Input Voltage: 12-30Vdc Input Current: ~150mA 3 Phase AC Current (CT Dependent 100/40A) - upto 100A, 3 Phase AC Voltage (VAC) - upto 300V 3 Phase Acpparent Power: upto 24kVA 3 Phase Real Power: upto 24kW Frequency: 50 Hz ± 10% PMM is a low cost AC power meter, advance then conventional power measurement devices, which not only measures mains power, but also the quality of power.	Enclosure: ABS Plastic. Mounting Style: Panel Mount Dimensions:125x165x70 mm. Weight: 500g			
		Generator Manager (GEM)	 Wide Operating Voltage : 20 - 60V. Adaptibility : +24V or 48V Telecom DC Systems or a Combination. Battery Voltage Monitoring : Upto 3 Batteries (0-100Vdc). Remote Monitoring : Optional via RS 485 interface GEM is a smart generator manager for single/dual Genset controller with multi -functions i.e. A) Genset/ battery hybrid control fuel saving device based on battery voltage and/or shelter temperature. B) Dual Genset Duty Cycle Controller. C) Data Management with smart alert capability via Remort Monitoring. 	Enclosure: Extruded Aluminium,Powder coated Mounting Style: Din Rail. Dimensions: 120x62x93 mm; Weight : 640g			
		Auto Mains Fail (AMF)	Operating Voltage: 8-16Vdc, Operating Current (Max): 390mA at 12Vdc. Single and Three Phase Sensing Voltage (Vac): 30 to 100Hz. Generator Battery Sensing Voltage (Vdc): 9-15 Vdc. Remort Monitoring with alarm: RS485 Port. AMF is a highly efficient module designed for Generator (Genset) power management automatically. It monitors the mains voltages and controls the automatic start, stop and load transfer.	Enclosure: ABS Plastic. Mounting Style: Panel Mount Dimensions: 125x165x70 mm. Weight: 500g			
		Grid Export Controller (GEC)	Operating Voltage Range: 9-60Vdc Power Consumption: <5 watts Connectivity : WIFI Communication Port: RS232 & RS485 Protocol: MODBUS RTU / ASCII GEC is a smart solar export limiter to control / limit the solar energy export towards grid. It also works as an Smart Meter which provides export and import energy metering to/from grid.	Enclosure: ABS Plastic. Mounting Style: Din Rail / Panel Mount Dimensions: 90x115x40 mm. Weight: 150g			
1003	90321090	Gas Controller Thermostat	Temperature Range 30 degree C - 70 Degree C, Differential < 5 degree C, Current 16 Amps Max, Material Brass. Sensor Length 7", 11", 18". Temperature Selection 40 degree C to 80 degree C, Inlet and Pilot Filters, Thermoelectric flame failure safety device. Brass body, inlet 1/2" NPT, Outlet 3/4" 18 TPi, Max inlet Gas Pressure 5" of water column.			Tesla Industries Pvt. Ltd., Plot No. 81-F, St. 6, I- 10/3, Islamabad	
1004	90328990	i) Stabilizers, voltage	Smart Line Conditioners 1 phase: 2 to 10KVA (with or without Isolation Transformer) 3 phase: upto 30KVA (non-isolated transformer)	Specially designed for Pakistani power conditions, and most suitable for IT & Telecom industry.		SalTec Powerlink, 1-A/2, Sector 15, Korangi Industrial Area, Karachi	
		ii) Solar Charger Controller /Current Controller	Sun Smart 12 Volt 10 Amp to 72 Volt 50 Amp			Systek (Pvt.) Ltd, H.No#115/1, Street No. 17, Off Khayaban-e- Muhafiz , Phase 6, DHA, Karachi	
1005	91070000	i) Wash Timer (15 minutes to 18 minutes)ii) Spin Timer (3 minutes to 8 minutes)				Khawaja Adhesive Tapes (Pvt) Ltd., 4-H, Gulberg-III, Lahore	

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
1006	93011000	Mortars, military	Heavy Mortar 120 mm, Light Mortar 81 mm, Mortar 60 mm			Pakistan Machine Tool Factory (Pvt) Limited PMTF Road, Off National Highway, Landhi, Karachi-75030
1007	93012000	i) Launchers, rocket	Under Barrel Grenade Launcher GL-40 Rocket Propelled Grenade Launcher RPG-7			Pakistan Machine Tool Factory (Pvt) Limited PMTF Road, Off National Highway, Landhi, Karachi-75030
		ii) Tear Gas Gun	37/38mm Tear Gas Gun (Shell Grenade Launcher)			Daudsons Armoury (Pvt) Ltd., Industrial Estate
		iii) Grenade Launcher	40mm Shot Range Grenade Launcher (SRGL) /			Kohat Road, Peshawar
			40mm Hand Held Grenade Launcher (HHGL)			, ,
1008	93019029	Rifles, military	Recoilless Rifle 106 mm			Pakistan Machine Tool Factory (Pvt) Limited PMTF Road, Off National Highway, Landhi, Karachi-75030
1009	93032011	Gauge Pump Action Shotgun	12 Gauge Pump Action Shotgun "Shooter"			Daudsons Armoury (Pvt) Ltd., Industrial Estate Kohat Road , Peshawar
1010	93032019	i) Shotgun (12 Gauge Single Barrel Shotgun) ii) Rifle' 22 Single Pistol (Pistol Pyrotechnic (Single Pistol)				Daudsons Armoury (Pvt) Ltd., Industrial Estate Kohat Road , Peshawar
1011	93032020	Double Barrel Shotgun	12 Gauge Double Barrel Shotgun			Daudsons Armoury (Pvt) Ltd., Industrial Estate Kohat Road , Peshawar
1012	93039000	Pistol 9mm Model Trushot	-			Daudsons Armoury (Pvt) Ltd., Industrial Estate Kohat Road , Peshawar
1013	93059111	Padistal Mount for Gun MG1A3	Firing Mechanism			Pakistan Machine Tool Factory (Pvt) Limited PMTF Road, Off National Highway, Landhi, Karachi-75030
1014	93062900	Mortar Training Bomb	60mm, 81mm, 120mm Mortar Training Bomb			Daudsons Armoury (Pvt) Ltd., Industrial Estate Kohat Road , Peshawar
1015	93069000	i) Bombs (munition) ii) MK-81 Bomb Casing iii) Penetrating Guidance Bomb Casings Small dia Air Launched Bomb Casing	MK82,MK83,MK84 Low Drag General Purpose.			Daudsons Armoury (Pvt) Ltd., Industrial Estate Kohat Road , Peshawar
1016	94029020	Hospital beds with mechanical fittings	Patient Motorized / Electrical Beds for ICU and CCU etc.			 G. Med Equipment, 11A Hurbance Pura Road, Near Railway Crossing P. O. Tajpura Lahore Cantt., Strongman Medifur Systems (Pvt) Ltd., Plot No. 166 Street No. 9, I-10/3 Industrial Area, Islamabad.
1017		Metal Shelvings	Mobile Shelving and General Office Shelving etc.etc.			Gujrat Steel (Pvt) Ltd., 183 A.M,Shahrah-e-Iraq, Saddar, Karachi
1018	94037000	Plastic Furniture	Children's outdoor play areas, different varieties to chose from and made to order			Green Earth Recycling Pakistan, 208/A Street # 5, Cavalry Grounds, Cantt. Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
1019	94051190	Light-emitting diode (LED) Energy saving lights:	All types of Light fittings with fixed/fitted LED or SMD or COB (All sizes); (As per IEC standards)			 National Institute of Electronics, Ministry of Science & Technology, H. No. 17, H-9, P.O. Box 1406, Islamabad Creative Electronics & Automation, Plot No. 142, Industrial Triangle, Kahuta Road, Islamabad Micro Pak (Pvt) Ltd., Plot No. 218, St. No. 7, I-9/2, Islamabad Comcept Private Limited, Plot # 291, Street # 03, I-9/3, Islamabad Khyber Electric Lamps, 483 Tariq Road Peshawar Cant DS Technologies, ST-2/7, Sector 16, Korangi Industrial Area, Karachi Wasif Impex, 1st & 2nd Floor, Plot No. Dp- 10, Sector 12-D, North Karachi Industrial Area, Karachi
1020	94051990		All types of LED Bulbs and Lamps (all types); LED Panel Lights (All sizes); LED 4 Channel, Linear and Tube Lights (all sizes); LED Down Lights; LED Street Lights; Flood and Spot Lights; Sports Stadium Lights; Canopy Lights, LED Strip and Rope Lights; LED Track Lights, LED X-Ray Illuminators (1U, 2U, 3U, 4U) etc. [AC / DC] (As per IEC standards)			 National Institute of Electronics, Ministry of Science & Technology, H. No. 17, H-9, P.O. Box 1406, Islamabad Creative Electronics & Automation, Plot No. 142, Industrial Triangle, Kahuta Road, Islamabad Micro Pak (Pvt) Ltd., Plot No. 218, St. No. 7, I-9/2, Islamabad Concept Private Limited, Plot # 291, Street # 03, I-9/3, Islamabad
1021	94052100		All types of LED Bulbs and Lamps (all types); LED Panel Lights (All sizes); LED 4 Channel, Linear and Tube Lights (all sizes); LED Down Lights; LED Street Lights; Flood and Spot Lights; Sports Stadium Lights; Canopy Lights, LED Strip and Rope Lights; LED Track Lights, LED X-Ray Illuminators (1U, 2U, 3U, 4U) etc. [AC / DC] (As per IEC standards)			 National Institute of Electronics, Ministry of Science & Technology, H. No. 17, H-9, P.O. Box 1406, Islamabad Creative Electronics & Automation, Plot No. 142, Industrial Triangle, Kahuta Road, Islamabad Micro Pak (Pvt) Ltd., Plot No. 218, St. No. 7, I-9/2, Islamabad Concept Private Limited, Plot # 291, Street # 03, I-9/3, Islamabad
1022	94053100	e e e	All types of LED Bulbs and Lamps (all types); LED Panel Lights (All sizes); LED 4 Channel, Linear and Tube Lights (all sizes); LED Down Lights; LED Street Lights; Flood and Spot Lights; Sports Stadium Lights; Canopy Lights, LED Strip and Rope Lights; LED Track Lights, LED X-Ray Illuminators (1U, 2U, 3U, 4U) etc. [AC / DC] (As per IEC standards)			 National Institute of Electronics, Ministry of Science & Technology, H. No. 17, H-9, P.O. Box 1406, Islamabad Creative Electronics & Automation, Plot No. 142, Industrial Triangle, Kahuta Road, Islamabad Micro Pak (Pvt) Ltd., Plot No. 218, St. No. 7, I-9/2, Islamabad Comcept Private Limited, Plot # 291, Street # 03, I-9/3, Islamabad

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
1023	94054100	Light-emitting diode (LED) Energy saving lamps:	All types of Light fittings with fixed/fitted LED or SMD or COB (All sizes) (As per IEC standards)			 National Institute of Electronics, Ministry of Science & Technology, H. No. 17, H-9, P.O. Box 1406, Islamabad Creative Electronics & Automation, Plot No. 142, Industrial Triangle, Kahuta Road, Islamabad Micro Pak (Pvt) Ltd., Plot No. 218, St. No. 7, I-9/2, Islamabad Comcept Private Limited, Plot # 291, Street # 03, I-9/3, Islamabad Khyber Electric Lamps, 483 Tariq Road Peshawar Cant DS Technologies, ST-2/7, Sector 16, Korangi Industrial Area, Karachi Wasif Impex, 1st & 2nd Floor, Plot No. Dp- 10, Sector 12-D, North Karachi Industrial Area, Karachi
1024	94054200	Light Emitting Diodes (LED) Energy saving Lighting Products (SMD,COB)	All types of LED TRI Proof Light (all sizes); LED High Bay Light (all sizes); LED Projection Light (all sizes); LED High Mast Light (all sizes); LED Outdoor Light (all sizes); All in one LED/SMD solar street Lights (all sizes); back up LED lights (sizes); LED Canopy Light (sizes); LED Flood Light (All sizes); LED Street Light (All sizes); LED Street Light (All sizes); LED Sports Stadium Light (all sizes); LED X-RAY Illuminators Light (all sizes) (As per IEC standards)	-		 National Institute of Electronics, Ministry of Science & Technology, H. No. 17, H-9, P.O. Box 1406, Islamabad Creative Electronics & Automation, Plot No. 142, Industrial Triangle, Kahuta Road, Islamabad Micro Pak (Pvt) Ltd., Plot No. 218, St. No. 7, 1-9/2, Islamabad Comcept Private Limited, Plot # 291, Street # 03, I-9/3, Islamabad Khyber Electric Lamps, 483 Tariq Road Peshawar Cant DS Technologies, ST-2/7, Sector 16, Korangi Industrial Area., Karachi
1025	94055010	Tubular Day Lighting Device	All types (As per IEC standards)			Creative Electronics & Automation, Plot No. 142, Industrial Triangle, Kahuta Road, Islamabad
1026	94056100	Light-emitting diode (LED) Energy saving illuminated signs	All types of LED Exit and Emergency LED/SMD Lit - Illuminated signs, illuminated name- plates and the like (All sizes) (As per IEC standards)			 National Institute of Electronics, Ministry of Science & Technology, H. No. 17, Sector H-9, P.O. Box 1406, Islamabad Creative Electronics & Automation, Plot No. 142, Industrial Triangle, Kahuta Road, Islamabad Micro Pak (Pvt) Ltd., Plot No. 218, St. No. 7, I-9/2, Islamabad Comcept Private Limited, Plot # 291, Street # 03, I-9/3, Islamabad Khyber Electric Lamps, 483 Tariq Road Peshawar Cant Mosif Impex, 1st & 2nd Floor, Plot No. Dp- 10, Sector 12-D, North Karachi Industrial Area, Karachi

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
1027	94061010	Pre-fabricated Buildings	Built up with H.R. Sheets, G.I. Sheets, Zincalume Sheet, High Tensile Nuts & bolts and Fiber glass Mat Insulation. Beams & Columns = Yield Strength 34.5 kN/cm ³ Galvanized Steel = Yield Strength 34.0 kN/cm ³ Zincalume Steel = Yield Strength 34.5 kN/cm ³ High Strength Bolts = Tensile Strength 83.0 kN/cm ³	Beams & Columns = ASTM A 572 M Gr 345 type 1 Galvanized Steel = ASTM A 653 M SS GR 340 Class 1 Zincalume Steel = ASTM A 792 M Grade 345 B High Strength Bolts = ASTM A 325 M		 Izhar Steel, Izhar House, 35-Tipu Block, New Garden Town, Lahore Pakistan Insulations (Pvt.) Ltd., 107 Business Avenue, PECHS BLock-6, Karachi Banu Mukhtar Steel (Pvt) Ltd., 5-A, Ali Block, Main Blvd. New Garden Town, Lahore Rhino Pre-Engineering Building Private Limited, 18 KM-Feroz Pur Road Sufi Abad Industrial Estate, Lahore The Building Techniques (Pvt) Ltd., Plot # G- 29-30, Sector-G. H.I.T.E, Hub Lasbela, Balochistan Pakistan
1028	94061020	Pre-fabricated Buildings	Built up with H.R. Sheets, G.I. Sheets, Zincalume Sheet, High Tensile Nuts & bolts and Fiber glass Mat Insulation. Beams & Columns = Yield Strength 34.5 kN/cm ³ Galvanized Steel = Yield Strength 34.0 kN/cm ³ Zincalume Steel = Yield Strength 34.5 kN/cm ³ High Strength Bolts = Tensile Strength 83.0 kN/cm ³	Beams & Columns = ASTM A 572 M Gr 345 type 1 Galvanized Steel = ASTM A 653 M SS GR 340 Class 1 Zincalume Steel = ASTM A 792 M Grade 345 B High Strength Bolts = ASTM A 325 M		 Izhar Steel, Izhar House, 35-Tipu Block, New Garden Town, Lahore Pakistan Insulations (Pvt.) Ltd., 107 Business Avenue, PECHS BLock-6, Karachi Banu Mukhtar Steel (Pvt) Ltd., 5-A, Ali Block, Main Blvd. New Garden Town, Lahore Rhino Pre-Engineering Building Private Limited, 18 KM-Feroz Pur Road Sufi Abad Industrial Estate, Lahore The Building Techniques (Pvt) Ltd., Plot # G- 29-30, Sector-G. H.I.T.E, Hub Lasbela, Balochistan Pakistan
029	94061030	i) Pre-fabricated Buildings	Built up with H.R. Sheets, G.I. Sheets, Zincalume Sheet, High Tensile Nuts & bolts and Fiber glass Mat Insulation. Beams & Columns = Yield Strength 34.5 kN/cm ³ Galvanized Steel = Yield Strength 34.0 kN/cm ³ Zincalume Steel = Yield Strength 34.5 kN/cm ³ High Strength Bolts = Tensile Strength 83.0 kN/cm ³	Beams & Columns = ASTM A 572 M Gr 345 type 1 Galvanized Steel = ASTM A 653 M SS GR 340 Class 1 Zincalume Steel = ASTM A 792 M Grade 345 B High Strength Bolts = ASTM A 325 M		 Izhar Steel, Izhar House, 35-Tipu Block, New Garden Town, Lahore Pakistan Insulations (Pvt.) Ltd., 107 Business Avenue, PECHS BLock-6, Karachi Banu Mukhtar Steel (Pvt) Ltd., 5-A, Ali Block, Main Blvd. New Garden Town, Lahore Rhino Pre-Engineering Building Private Limited, 18 KM-Feroz Pur Road Sufi Abad Industrial Estate, Lahore The Building Techniques (Pvt) Ltd., Plot # G- 29-30, Sector-G. H.I.T.E, Hub Lasbela, Balochistan Pakistan
		ii) Silos		As per Customer Specification	As per Customer Specification	Spleen Manufacturing (Pvt) Ltd., 20-KM Ferozepur Road, Off 3/4 KM Asif Town # 2, Lahore
1030	94061040	i) Pre-fabricated Buildings	Built up with H.R. Sheets, G.I. Sheets, Zincalume Sheet, High Tensile Nuts & bolts and Fiber glass Mat Insulation. Beams & Columns = Yield Strength 34.5 kN/cm ³ Galvanized Steel = Yield Strength 34.0 kN/cm ³ Zincalume Steel = Yield Strength 34.5 kN/cm ³ High Strength Bolts = Tensile Strength 83.0 kN/cm ³	Beams & Columns = ASTM A 572 M Gr 345 type 1 Galvanized Steel = ASTM A 653 M SS GR 340 Class 1 Zincalume Steel = ASTM A 792 M Grade 345 B High Strength Bolts = ASTM A 325 M		 Izhar Steel, Izhar House, 35-Tipu Block, New Garden Town, Lahore Pakistan Insulations (Pvt.) Ltd., 107 Business Avenue, PECHS BLock-6, Karachi Banu Mukhtar Steel (Pvt) Ltd., 5-A, Ali Block, Main Blvd. New Garden Town, Lahore Rhino Pre-Engineering Building Private Limited, 18 KM-Feroz Pur Road Sufi Abad Industrial Estate, Lahore The Building Techniques (Pvt) Ltd., Plot # G- 29-30, Sector-G. H.I.T.E, Hub Lasbela, Balochistan Pakistan

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
		ii) Insulated P-U Panels for cold storage	25mm to 150 mm Fire retardant	Low Heat Transfer	Isocyanate Polyol & 141B	Koldkraft Refrigeration (Pvt) Ltd., 243-S, Quaid- e-Azam, Industrial Estate, Kot Lakhpat, Lahore.
1031	94061090	i) Pre-fabricated Buildings	Built up with H.R. Sheets, G.I. Sheets, Zincalume Sheet, High Tensile Nuts & bolts and Fiber glass Mat Insulation. Beams & Columns = Yield Strength 34.5 kN/cm ³ Galvanized Steel = Yield Strength 34.0 kN/cm ³ Zincalume Steel = Yield Strength 34.5 kN/cm ³ High Strength Bolts = Tensile Strength 83.0 kN/cm ³	Beams & Columns = ASTM A 572 M Gr 345 type 1 Galvanized Steel = ASTM A 653 M SS GR 340 Class 1 Zincalume Steel = ASTM A 792 M Grade 345 B High Strength Bolts = ASTM A 325 M		 Izhar Steel, Izhar House, 35-Tipu Block, New Garden Town, Lahore Pakistan Insulations (Pvt.) Ltd., 107 Business Avenue, PECHS BLock-6, Karachi Banu Mukhtar Steel (Pvt) Ltd., 5-A, Ali Block, Main Blvd. New Garden Town, Lahore Rhino Pre-Engineering Building Private Limited, 18 KM-Feroz Pur Road Sufi Abad Industrial Estate, Lahore The Building Techniques (Pvt) Ltd., Plot # G- 29-30, Sector-G. H.I.T.E, Hub Lasbela, Balochistan Pakistan
		ii) Insulated Panels	Polyurethane Panels (PU), Polyisocyanurate Panels (PIR), Rock Wool Panels	25mm to 300mm, upto 16mtr length		 Pakistan Insulations Pvt. Ltd., 107 Business Avenue, PECHS BLock-6, Karachi Foster Refrigerators (Pvt) Ltd., 7-Main Industrial Area, Kot Lakhpat, Lahore Izhar Steel, Izhar House, 35-Tipu Block, New Garden Town, Lahore
1032	94069040	i) Clean room panels & prefabricated buildings for cold storage	Both side PPGI/ SS sheet with different kind of insulated material in middle.	Fire Class =A2 Heat transfer Coefficient = 0.82 W/m2K Adhesive property bond strength = 0.07MPa Flexibility = 1.3 KN/M2	PE (Poly Ethylene Coating)	PAK GUSU Technology (Pvt) Ltd. 8-km Sundar Raiwind Road Lahore
		ii) Insulated P-U Panels for cold storage	25mm to 150 mm Fire retardant	Low Heat Transfer	Isocyanate Polyol & 141B	Koldkraft Refrigeration (Pvt) Ltd., 243-S, Quaid- e-Azam, Industrial Estate, Kot Lakhpat, Lahore.
1033		 i) Clean room panels & prefabricated buildings for cold storage ii) Clean Room Doors iii) Single / Double Glass Clean Window 	 Both side PPGI/ SS sheet with different kind of insulated material in middle. Powder Coated / Epoxy or SS type flushed door with looking glass and Auto Door shutter at bottom. 5 mm tempered glass suitable for Flush fixing with Panels 	Fire Class =A2 Heat transfer Coefficient = 0.82 W/m2K Adhesive property bond strength = 0.07MPa Flexibility = 1.3 KN/M2 Flushed door with no edge for dust stay.	PE (Poly Ethylene Coating) PE/ Epoxy coated or SS	PAK GUSU Technology (Pvt) Ltd. 8-km Sundar Raiwind Road Lahore
1034	94069090	Insulated P-U Panels for cold storage	25mm to 150 mm Fire retardant	Low Heat Transfer	Isocyanate Polyol & 141B	Koldkraft Refrigeration (Pvt) Ltd., 243-S, Quaid- e-Azam, Industrial Estate, Kot Lakhpat, Lahore.
1035	96071900	Zipper in Rolls Zipper Chain	 Brass fitted with polyester tape Polyester/Nylon/Plastic, fitted with polyester tape Aluminium fitted with polyester chain 	 - 65% Brass, 35% Alloy, Polyester tape - Polyester Yarn, Moofilment, Acetol Polyester tap - Aluminium Polyester Chain tape 		Monika Enterprises, 2110/93, Nawaz Chowk, Mian Bagerian Road, Green Town Lahore
1036	96072000	Zipper slider Pin box stoppers	Zipper sliders for chain close pinbox for ends stoppers for ends	Zin Brass	-	Monika Enterprises, 2110/93, Nawaz Chowk, Mian Bagerian Road, Green Town Lahore

S. No.	PCT Cod	Product Description	Specifications	Physical Properties	Chemical Properties	Company
1037	96081000	i) Ball Point Pens	All Types			 Shahsons (Pvt) Ltd., D-88, S.I.T.E., Manghopir Road, Karachi. Dollar Industries (Pvt) Ltd., D-85, SITE, Karachi – 75700 Indus Pencil Industries, B-54, Manghopir Road SITE Karachi
		ii) Fine Liner				Toray Plast, Al Jannat Road, Saggian Ravi By Pass, Nain Sukh, Lahore
1038	96082000	i) Pens, felt-tipped	Writing, colouring and marking pens, all types (felt tipped with and without metal / plastic jackets).			Dollar Industries (Pvt) Ltd., D-85, SITE, Karachi – 75700
		ii) Markers, felt-tipped	Markers all types (Permanent, Highlighters, White Boards, Refillable / Sealed)			
		iii) Markers	With porous tipped pens			Indus Pencil Industries, B-54, Manghopir Road
		iv) Fine Liner Pens	Tip with metal jacket			SITE Karachi
		v) White Board/ Permanent Markers& Highlighters				Toray Plast, Al Jannat Road, Saggian Ravi By Pass, Nain Sukh, Lahore
		vi) Fiber Tip Pen with both side Tips (Ink Remover)	Writing & Erasing pen with both side tips	- Polypropylene/ HDPE/ Syntehtic Fibre Reservoir /Fibre Tips	- Water Base Ink - Dyes	Oro Industries, 86-87, Sector 23, Korangi Industrial, Karachi
		vii) Fine Liner Pen / Sign Pen	Writing & Marking Pen with fibre tip with metal adaptor	- Polypropylene/ HDPE / ABS/PC / Syntehtic Reservoir Fibre / Fibre Tips	- Water Base Ink - Dyes	
		viii) Marker	Permanent & White Board Marker with Acrylic & Polyster Nibs	 Polypropylene / HDPE/ Syntehtic Fibre Reservoir / Acrylic Nibs / Polyester Nibs 	- Alcohol Base Ink - Water Base Ink	
1039	96083000	Pen, fountain	Fountain pens, all types			 Dollar Industries (Pvt) Ltd., D-85, SITE, Karachi – 75700 Indus Pencil Industries, B-54, Manghopir Road SITE Karachi Toray Plast, Al Jannat Road, Saggian Ravi By Pass, Nain Sukh, Lahore
1040	96091000	Pencils	All Types			 Shahsons (Pvt) Ltd., D-88, S.I.T.E., Manghopir Road, Karachi. Indus Pencil Industries, B-54, Manghopir Road SITE Karachi
1041	96099000	Wax Crayons	For childern			Indus Pencil Industries, B-54, Manghopir Road SITE Karachi
1042	96122000	Ink-pads	Stamp Pads			Dollar Industries (Pvt) Ltd., D-85, SITE, Karachi - 75700
1043	99310000	Ambulance Lifter	Ambulance Lifter Upto 22ft working height from ground suitable for aircraft upto Boeing 777	Truck Mounted Trailer Mounted	-	 Bilal Engineering Company, G.T Road Opp. Rescue 1122 Office, Pindi Bypass, Gujranwala Javaid Iqbal Industrial (JIC), Jinnah Interchange G.T. Road, Gujranwala Shaheen Tank Trailers Manufacturing Company (Pvt) Ltd., Plot #306, Wali Town Near Port Qasim Mor, National Highway Karachi.

	l Grades manu								r	r					nexu	
S.No.		Elements	С	Si	Mn	Р	S	Cr	Mo	Ni	Cu	Al	V	W	Co	Ti
1	070M20	Lower	0.16	0.10	0.50	0.03										
		Upper			0.90			0.3	0.15	0.4						
2	080M40	Lower	0.36	0.10	0.60											
		Upper	0.44	0.40	1.00	0.05	0.05	0.3	0.15	0.4						
3	1.1545	Lower			0.10											
		Upper	1.10		0.25	0.02	0.02									
4	1008	Lower			0.25											
		Upper	0.10			0.04	0.04									
5	1009	Lower			0.08											
		Upper				0.03	####									
6	1010	Lower	0.08	0.15	0.30											
		Upper				0.04	0.05									
7	1015	Lower				0.04	####									
		Upper	0.18	0.35	0.60											
8	1020	Lower			0.30											
		Upper				0.04	0.05									
9	1024	Lower			1.30	0.04	0.05									
		Upper			1.65											
10	1025	Lower	0.22	0.10		0.03	0.05									
		Upper	0.28		0.60											
11	1030	Lower				0.03	0.05									
		Upper			0.90											
12	1032	Lower	0.30	0.10	0.50	0.03	0.03									
		Upper	0.35	0.35	0.70											
13	1035	Lower	0.31	0.15	0.60											
		Upper	0.38	0.35	0.90	0.03	0.04									
14	1040	Lower	0.37	0.15	0.60											
		Upper	0.44	0.35	0.90	0.04	0.05									
15	1045	Lower	0.43	0.15	0.60											
		Upper	0.50	0.35	0.90	0.04	0.05									
16	1046	Lower	0.40	0.40	0.75	0.04	0.05									
		Upper	0.50		1.20											
17	1048	Lower	0.43		1.05											
		Upper	0.52	0.20	1.40	0.04	0.05									
18	1050	Lower	0.48	0.15	0.60	0.03	0.05									
		Upper	0.55	0.35	0.90											
19	1065	Lower	0.60	0.15	0.60	0.04	0.05									
		Upper	0.70	0.35	0.90											
20	1080 (Steel-80)	Lower	0.77	0.17	0.50											
	1	Upper	0.85	0.37	0.80	0.035	0.04	0.25	l	0.25	0.2		1			
21	1141	Lower	0.37	0.15	1.35	0.04	0.08								İ 👘	

		Upper	0.45	0.30	1.65		0.13				T		
22	11SMn37	Lower											
		Upper											
23	1513	Lower	0.10		1.10								
-		Upper			1.40	0.04	0.05						
24	1545	Lower	0.43		0.80		0.05						
		Upper	0.50		1.10								
25	1546	Lower	0.44	0.15	1.00	0.04	0.05						
		Upper	0.52	0.35	1.30								
26	220-M-07	Lower			0.90		0.20						
		Upper	0.15	0.40	1.30	0.07	0.30						
27	230-M-O7	Lower	0.15	0.05	0.90	0.09	0.25						
		Upper			1.30		0.35						
28	30-111-SGB-710-65	Lower	0.27	0.17	0.50	0.04	0.04	0.25	0.23				
		Upper	0.35	0.37	0.80								
29	325 Type-1	Lower	0.30	0.15									
		Upper			0.60		0.05						
30	35-GB-699-65	Lower			0.50	0.04	0.25		0.25				
		Upper		0.37									
31	35-S-20	Lower		0.10			0.18						
		Upper			1.10	0.06	0.25						
32	35-YB-194-63	Lower	0.32										
		Upper				0.035	0.04						
33	50-BYB-481-80	Lower			0.60	0.04	0.03						0.05
		Upper		0.37									
34	50Mn	Lower		0.17									
		Upper	0.56			0.035	0.04	0.25	0.25	0.25			
35	515(Grade-60)	Lower		0.15									
		Upper	-	0.40	0.90	0.035	0.04						
36	6-31-YB-195-63	Lower	0.07										
		Upper	0.13	0.03		0.035							
37	9SMn	Lower	0.1.1	0.05	0.90		0.24						
20		Upper	0.14	0.05	1.30	0.1	0.32						
38	A-108 (G-11170)	Lower											
20	A 100 (C 10100)	Upper											
39	A-108 (G-12120)	Lower											
40	A 292 Cmg 3- C	Upper											┢──┦
40	A-283 Grade C	Lower	0.24	0.40	0.00	0.025	0.04				 		
<u>/1</u>	A 285 Chode C	Upper	0.24	0.40	0.90	0.035	0.04						┢──┦
41	A285 Grade C	Lower	0.28		0.04	0.035	0.04					 	
42	A36	Upper Lower	0.28		0.04	0.055	0.04						┝──┦
42	A30	Upper	0.25	0.40		0.04	0.05			0.2			
		Upper	0.25	0.40	1.20	0.04	0.05			0.2		1	

43	A-516 (Grade 60)	Lower	1	0.15	0.85											
	11 010 (Grude 00)	Upper	0.23		1.20	0.035	0.04									
44	AGS-1055	Lower			0.60	0.03	0.04	0.3								
	100 1000	Upper		0.35		0.00	0.0.	0.5								
45	AGS-KK-01	Lower		0.20			0.09	0.2	0.04	0.1	0.1					
		Upper			1.65	0.04	0.13	0.3		0.2	0.2			-		
46	B2-GB-912-66	Lower		0.12		0.05	0.06									
		Upper		0.30												
47	B3-GB-912-66	Lower			0.40	0.05	0.06									
		Upper		0.30												
48	BS-2858	Lower	0.10	0.03	0.49	0.04	0.03									
		Upper														
49	BW2	Lower	0.95	0.30	0.35	0.03	0.03	0.15	0.1	0.2	0.2		0.15			
		Upper	1.10										0.35			
50	C45K	Lower	0.42		0.50											
		Upper	0.50	0.40	0.80	0.045	0.05	0.4	0.1	0.4						
51	CFS-6	Lower	0.30	0.35	0.50	0.05	0.05									
		Upper	0.40		0.90											
52	EN43B	Lower	0.45	0.10	0.70	0.05	0.05									
		Upper	0.50	0.40	0.90											
53	EN8	Lower	0.36	0.10	0.60	0.01	0.03									
		Upper	0.44	0.40	1.00											
54	Ex-Low Carbon	Lower														
		Upper														
55	G-43A (BS 4360-1986)	Lower														
		Upper	0.25	0.50	1.60	0.05	0.05									
56	HAFFAZ 1010	Lower														
		Upper														
57	Haffaz-1020	Lower		0.10												
		Upper				0.025	0.03									
58	HMC-1030	Lower		0.05								0.03				
		Upper	0.37	0.17	0.80	0.04	0.05									
59	HR355	Lower														
		Upper			1.60	0.05	0.05									
60	HSAPH55	Lower			1.30	0.04	0.04			-						
		Upper			1.50		0.00								<u> </u>	
61	NEAGA - Steel	Lower			0.60	0.00	0.20									
(2)	OGT 53 3 C 3	Upper			0.90		0.25				0.25					
62	QST-52-3-Cu 3	Lower	0.20	0.55	1.60	0.04	0.04			-	0.25					
62	DS+ 27 2 C2	Upper	0.17	0.20	1.40	0.05	0.05				0.35					
63	RSt-37-2 Cu3	Lower	0.17	0.30	1.40	0.05	0.05				0.25					
61	S15A	Upper	0.12	0.10	0.25	0.02	0.04			0.2	0.4	0.02				
64	S15A	Lower	0.12	0.10	0.25	0.03	0.04			0.2	0.2	0.03				

		Upper	0.18	1	0.50							0.08			Т	
65	S20A	Lower	0.16		0.25							0.00			+	
0.5	52011	Upper			0.50	0.03	0.04								-	
66	S43C	Lower		0.15											+	
	5.00	Upper		0.35		0.03	0.04	0.2		0.2	0.2					
67	S-45C	Lower		0.15		0.03	0.04	0.2		0.2	0.3				+	
		Upper		0.35											1	
68	S50C	Lower		0.15		0.03	0.04	0.2		0.2	0.3				+	
		Upper		0.35												
69	SAMZA GRADE 1	Lower	-	0.15		0.04	0.04								1	
		Upper	1.40	0.35	0.50											
70	SSA-21	Lower	0.45	0.10	0.70											
		Upper	0.55	0.35	1.10	0.05	0.05	0.3	0.15	0.5	0.3					
71	ST10	Lower	0.07	0.17	0.17							0.015				
		Upper	0.14	0.37	0.37	0.035	0.04	0.15		0.3	0.2	0.035				
72	St12Cu3	Lower	0.10	0.10	0.20	0.05	0.05				0.25					
		Upper			0.45						0.35					
73	ST20	Lower	0.17	0.17	0.35	0.04	0.04	0.25		0.25						
		Upper	0.24	0.37	0.65											
74	St4	Lower										0.02				
		Upper	0.10	0.05	0.50	0.03	0.03	0.15	0.1	0.2	0.2	0.1				
75	SWRY-11	Lower			0.35											
		Upper	0.09	0.03	0.65	0.02	0.02				0.2					
76	T-1 PRS	Lower	0.03	0.15	0.80	0.06	0.06									
		Upper	0.42													
77	T12A	Lower		0.15				0.2								
		Upper			0.30	0.03	0.02			0.15	0.25					
78	Tech Lok C-3	Lower		0.12												
		Upper	-			0.045	0.06									
79	V930	Lower		0.15												
		Upper			1.50	0.035	0.04	0.3							\vdash	
80	1.2060	Lower		0.20				1.2							 	
		Upper	-		0.20		0.03	1.5							\vdash	
81	1.2714	Lower			0.65	0.03	0.03	1	0.45	1.5			0.07		_	
		Upper		0.40				1.2	0.55	1.8			0.12			
82	1.2767	Lower	-			0.03	0.03								 	
L		Upper	-		0.45			1.5	0.35	4.3					<u> </u>	\square
83	1.2842	Lower				0.03	0.03	0.2					0.05		–	
<u> </u>		Upper			2.10			0.5					0.15		<u> </u>	\square
84	1.8159	Lower				0.04	0.04	0.9					0.1		–	
6-		Upper	0.55		1.10			1.2	0.5	0.0			0.25		┿	\vdash
85	12Cr2NiMoV2	Lower			0.30	0.07		1.9	0.3	0.8			0.18		┥	
		Upper	0.16	0.37	0.70	0.025	0.03	2.4	0.45	1.2			0.28			

Presentation Upper 0.18 0.00 0.15 0.6 0.7	86	13CrMo44 with Cr	Lower	0.08	0.35	0.40	0.03	0.03	0.7	0.4		0.3				
87 Decrement Lawer 0.08 0.33 0.4 0.3 0.4 0.3 0.4 0.3 88 IANICr14 Lower 0.10 0.40 0.66 3 0 0 0 89 ISCDV6 Lower 0.10 0.40 0.03 0.4 0 3.5 0 0 0.2 0 89 ISCDV6 Lower 0.14 1.00 0.8 0 0.8 0 0.1 0.3 0 0.1 90 IAMCr5 Lower 0.14 1.00 0.8 0.8 0 0.1 0.			Upper							-						
R Upper 0.18 1.00 N 0.6 N N N N 88 14NiCr14 Lower 0.10 0.40 0.6 3 N N N N 89 15CDV6 Lower 0.12 0.02 0.80 0.02 0.20 1.5 N N 0.3 N <th>87</th> <th>15Crivio44 with out</th> <th></th> <th></th> <th>0.35</th> <th></th> <th>0.03</th> <th>0.03</th> <th>1110</th> <th></th> <th></th> <th>0.3</th> <th></th> <th></th> <th></th> <th></th>	87	15Crivio44 with out			0.35		0.03	0.03	1110			0.3				
88 14NiCr14 Lawer 0.10 0.40 0.6 3 1 1 1 1 89 ISCDV6 Lower 0.12 0.20 0.80 0.02 1.25 1 1 0 0.2 1 90 ISCDV6 Lower 0.12 0.20 0.80 0.02 1.25 1 1 0 0.3 0 90 ISCDV6 Lower 0.16 0.70 0.83 0.8 <th></th> <th>C*</th> <th></th>		C*														
Image: bise bise bise bise bise bise bise bise	88	14NiCr14							0.6		3					
89 ISCDV6 Lower 0.12 0.20 0.80 0.02 1.25 I I 0 0.3 I I 90 I6MnCr5 Lower 0.19 I.00 I 0.8 I I I 0.3 I			Upper				0.035	0.04								
Image: Normal and the second	89	15CDV6	Lower					0.02					0.2			
90 16MnCr5 Lower 0.14 1.00 0.8 0.8 0.1 0.1 0.1 0.10 0.03 0.04 1.1 0			Upper	0.18		1.20			1.5				0.3			
91 19CN5 Lower 0.16 0.70 0.8 0.15 0.8 0.8 0.15 0.15 0.8 0.15 0.15 0.8	90	16MnCr5	Lower	0.14		1.00			0.8							
Participant Upper 0.21 0.35 1.10 0.03 0.4 1.2 0.1 1.2 0 0 0.15 0 0 92 20CrNi4VA Lower 0.17 0.25 0.25 0.25 0.25 0.25 0.27 1.1 0 4.25 0.2 0.31 0.15 1.0 93 20MnCr5 Lower 0.22 0.41 1.0 0.35 0.44 1.1 0 4.25 0.2 0.31 0.16 1 94 2S CrSiNiW2 Lower 0.22 0.41 0.30 0.44 1.1 0.8			Upper	0.19	0.40	1.30	0.035	0.04	1.1							
92 20CrNi4VA Lower 0.17 0.17 0.25 0 0.7 0.37 0.5 0.03 0.44 1.1 0 4.25 0.2 0.3 0.3 0 1 93 20MnCr5 Lower 0.17 0.15 1.0 1 1 1 0.2 0.3 0 1 1 0 0.2 0.3 0 1 1 0 0.2 0.3 0 0 1 0 0.2 0.3 0 1 0 0.2 0.3 0 0 1.3 0 0 0.8 0.18 0.18 0.5 0 0 0 0 0 0.3 0.0 1.3 0 0.18 0.18 0.18 0.18 0.28 0 0 0.03 0.04 1.1 0 1 0 0.28 0.28 0.90 0.30 0.3 0.3 0.3 0.3 0.3 0.3 0.3 0.3 0.3 0.3 0.3 0.3 0.3 0.3 0.3 0.3 0.3 0.3 0.	91	19CN5	Lower	0.16		0.70			0.8		0.8					
Image Upper 0.24 0.37 0.55 0.03 0.4 1.1 4.25 0.2 0.3 1 93 20MnCr5 Lower 0.17 0.15 1.10 1			Upper	0.21	0.35	1.10	0.035	0.04	1.2	0.1	1.2					
93 20MnCr5 Lower 0.17 0.15 1.10 1	92	20CrNi4VA	Lower	0.17	0.17	0.25			0.7		3.75		0.15			
1 Upper 0.22 0.40 1.40 0.035 0.04 1.3 0 <th></th> <th></th> <th>Upper</th> <th>0.24</th> <th>0.37</th> <th>0.55</th> <th>0.035</th> <th>0.04</th> <th>1.1</th> <th></th> <th>4.25</th> <th>0.2</th> <th>0.3</th> <th></th> <th></th> <th></th>			Upper	0.24	0.37	0.55	0.035	0.04	1.1		4.25	0.2	0.3			
94 25 CrSiNiWV2 Lower 0.22 0.17 0.30 0.7 0.8 0.8 0.18 0.5 1 95 28Cr3NiSiMoWVA Lower 0.28 0.70 0.035 0.04 1.1 1.2 0.28 1 0 96 30CrMnSiA Lower 0.28 0.80 0.03 0.03 0.8 0.3 0.25 0 0 0 97 30CrMnSiA Lower 0.26 0.90 0.80 0.03 0.8 0.3 0.25 0 0 0 97 30CrMnSiN2 Lower 0.26 0.90 1.00 0.99 1.4 0 0 0 0.1 0 </th <th>93</th> <th>20MnCr5</th> <th>Lower</th> <th>0.17</th> <th>0.15</th> <th>1.10</th> <th></th> <th></th> <th>1</th> <th></th> <th></th> <th></th> <th></th> <th></th> <th></th> <th></th>	93	20MnCr5	Lower	0.17	0.15	1.10			1							
Image Upper 0.27 0.37 0.70 0.035 0.44 1.1 1.2 1.0 0.28 1 1 95 28Cr3NiSiMoWVA Lower 0.28 1 <			Upper	0.22	0.40	1.40	0.035	0.04	1.3							
95 28Cr3NiSiMoWVA Lower 0.28 <th>94</th> <th>25 CrSiNiWV2</th> <th>Lower</th> <th></th> <th></th> <th></th> <th></th> <th></th> <th>0.7</th> <th></th> <th>0.8</th> <th></th> <th>0.18</th> <th>0.5</th> <th></th> <th></th>	94	25 CrSiNiWV2	Lower						0.7		0.8		0.18	0.5		
Image: Problem index inde			Upper	0.27	0.37	0.70	0.035	0.04	1.1		1.2		0.28	1		
96 30CrMnSiA Lower 0.28 0.90 0.80 0.03 0.03 0.25 97 30CrMnSiNi2 Lower 0.26 0.90 1.00 0.9 1.4	95	28Cr3NiSiMoWVA	Lower	0.28												
Image: problem stateUpper0.341.201.10Image: problem state1.1Image: problem stateImage: problem state </th <th></th> <th></th> <th>Upper</th> <th></th>			Upper													
9730CrMnSiNi2Lower0.260.901.00I0.9I.4II<	96	30CrMnSiA	Lower	0.28	0.90	0.80	0.03	0.03	0.8		0.3	0.25				
Image: bord bord bord bord bord bord bord bord			Upper	_					-							
98 30CrMoV9 Lower 0.26 0.40 u 2.3 0.15 u 0.1 u 1 99 30-CrMoV3 Upper 0.34 0.40 0.70 0.035 0.03 2.7 0.25 u 0.2 u 0.2 u 0.2 99 30-CrMoV3 Upper 0.35 0.77 0.60 0.03 0.66 u 2.75 u	97	30CrMnSiNi2	Lower													
Upper 0.34 0.40 0.70 0.035 0.03 2.7 0.25 M M D M 99 SU-CINIPS-A I B-401- co Lower 0.27 0.17 0.30 0.04 0.03 0.66 Z.75 M			Upper		-				-		1.8					
99 50-CTIVI-3-A T B-481- 90 Lower 0.27 0.17 0.30 0.04 0.03 0.6 2.75 Image: Constraint of the constraint of	98	30CrMoV9														
99 60 1000000000000000000000000000000000000		20-CUNI-2-A 1 D-401-								0.25			0.2		L	
100 30CrNiMo8 Lower 0.26 0.30 1.8 0.3 1.8 0.4 0.6 0.035 0.03 2.2 0.5 2.2 0 0 0 0 0 0 0.03 0.2 0.5 2.2 0 0 0.15 0 </th <th>99</th> <th></th> <th></th> <th></th> <th></th> <th></th> <th>0.04</th> <th>0.03</th> <th></th> <th></th> <th></th> <th></th> <th></th> <th></th> <th> </th> <th> </th>	99						0.04	0.03								
Upper 0.34 0.40 0.60 0.035 0.03 2.2 0.5 2.2 0 0 0.15 0 0 101 JOS-SIVINIVOVATD- Ag1 g0 Lower 0.27 0.40 1.60 0.04 0.03 0.4 0 0.15 0 0 0 0 0.4 0 0.15 0	100				0.37											
101 30-SIVINIVOVATB- (\$1 \$0) Lower 0.27 0.40 1.60 0.03 0.4 0 0.15 0 0 101 Upper 0.33 0.60 1.85 0 0.6 0 0.25 0 0 102 3120 Lower 0.17 0.20 0.40 0.55 1.1 0 0 0.25 0 0 103 32CrMoV1210 Lower 0.29 0.50 0.70 0.03 0.03 2.8 1.4 0 0.25 0 0 103 32CrMoV1210 Lower 0.29 0.50 0.70 0.03 0.3 2.8 1.4 0 0.25 0 0 104 35CM4 Lower 0.33 0.80 0.93 2.8 1.0 1.0 0.35 0.3 0.99 1.2 0 0.35 0 0 0.99 1.0 0.35 0 0 0.99 0.40 0.10 0.30 0.3 0.3 0.3 0.3 0.3 0.3 0.3 0.3 0.3	100	30CrNiMo8			0.40		0.005	0.00								
Vortex Upper 0.33 0.60 1.85 0.6 0.6 0.25 0.25 102 3120 Lower 0.17 0.20 0.40 0.55 1.1 0 0 0 0 103 320 Upper 0.22 0.35 0.80 0.04 0.04 0.75 1.4 0	101	30-SHVIMVIO V A Y D-							2.2		2.2		0.15			
102 3120 Lower 0.17 0.20 0.40 0.55 1.1 0 0 0 0 103 32CrMoV1210 Lower 0.29 0.50 0.70 0.03 0.03 2.8 1.4 0 0.25 0 0 103 32CrMoV1210 Lower 0.29 0.50 0.70 0.03 0.03 2.8 1.4 0 0.25 0 0 104 35CM4 Lower 0.36 0 0.80 0.93 2.8 1.0 0.35 0 0 104 35CM4 Lower 0.33 0.80 0 0.9 1.4 0 0.35 0 0 105 35Cr Lower 0.32 0.17 0.50 0.83 1.2 1 0.3 0.3 0 0 1 0 1 0 1 0 1 0 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 <td< th=""><th>101</th><th>101 00</th><th></th><th></th><th></th><th></th><th>0.04</th><th>0.03</th><th></th><th></th><th></th><th></th><th></th><th></th><th></th><th> </th></td<>	101	101 00					0.04	0.03								
Upper 0.22 0.35 0.80 0.04 0.04 0.75 1.4 Image: Constraint of the stress of	102	2120							0.55	0.6	1 1		0.25			┢───┨
103 32CrMoV1210 Lower 0.29 0.50 0.70 0.03 0.03 2.8 Image: Constraint of the co	102	3120					0.04	0.04								
Upper 0.36 0.80 3.2 0.80 0.35 0.35 104 35CM4 Lower 0.33 0.80 0.9 0.9 0.80 0.9 105 35Cr Lower 0.32 0.17 0.50 0.88 0.80 0.9 0.80 0.9 0.80 0.9 0.80 0.9	103	22C=MaV1210									1.4		0.25			<u> </u>
104 35CM4 Lower 0.33 0.80 0.9 0.9 0.0 0.0 0.9 0.0 0.0 0.9 0.0 0.0 0.9 0.0 0.0 0.9 0.0 0.0 0.9 0.0 0.0 0.0 0.9 0.0 0.0 0.0 0.9 0.0	103	52CTW0 V 1210				0.70	0.03	0.05								
Upper 0.39 0.40 1.10 0.035 0.03 1.2 Image: Constraint of the state of the sta	104	35CM4				0.80							0.55			<u> </u>
105 35Cr Lower 0.32 0.17 0.50 0.8 0.8 0 0 0 0 106 35CrMnSiA Lower 0.32 1.10 0.80 0.11 0.3 0.33 0.3 0 106 35CrMnSiA Lower 0.32 1.10 0.80 1.1 0.3 0.25 0 0.32	104	550117					0.035	0.03								
Upper 0.39 0.37 0.80 0.035 0.04 1.1 0.3 0.3 106 35CrMnSiA Lower 0.32 1.10 0.80 1.1	105	35Cr					0.055	5.05								
106 35CrMnSiA Lower 0.32 1.10 0.80 1.1	105						0.035	0.04			0.3	0.3				
Upper 0.39 1.40 1.10 0.025 0.03 1.4 0.3 0.25	106	35CrMnSiA					0.000	0.07			0.0	0.0				
							0.025	0.03			0.3	0.25				
107 38CrSi Lower 0.35 1.00 0.30 1.3	107	38CrSi	Lower						1.3							

		Upper	0.43	1.30	0.60	0.035	0.04	1.6		0.3	0.3			1	
108	40CrNi	Lower		0.17				0.45		1				<u> </u>	
		Upper			0.80	0.035	0.04	0.75		1.4	0.3			1	
109	4130	Lower		0.15				0.8	0.15					1	
		Upper				0.035	0.04	1.1	0.25					1	
110	4135	Lower		0.15				0.8	0.15					1	
		Upper				0.035	0.04	1.15	0.25						
111	4140	Lower	0.38	0.15	0.75			0.8	0.15						
		Upper	0.43	0.35	1.00	0.035	0.04	1.1	0.25						
112	41Cr4	Lower	0.38		0.60			0.9							
		Upper	0.45	0.40	0.90	0.035	0.3	1.2							
113	42MnV7	Lower	0.38	0.15	1.60								0.07		
		Upper	0.45	0.35	1.90	0.035	0.04						0.12		
114	4340	Lower	0.38	0.15	0.60			0.7	0.2	1.65	0.35				
		Upper	0.43	0.35	0.80	0.03	0.04	0.9	0.3	2					
115	50CrMo4	Lower		0.15				0.9	0.15						
		Upper				0.035	0.04	1.2	0.25						
116	5120	Lower		0.15				0.7							
		Upper				0.035	0.04	0.9							
117	5135	Lower		0.15				0.8						 \vdash	
		Upper				0.035	0.04	1.05						\vdash	
118	5140	Lower		0.15				0.7						 	
		Upper				0.035	0.04	0.9						┝──	
119	5145	Lower		0.15				0.7						<u> </u>	
		Upper	0.48	0.30	0.90	0.035	0.04	0.9						 —	
120	5145H	Lower												_	
		Upper													
121	58SiMn	Lower		1.00										 	
		Upper				0.035	0.04	0.3	<u> </u>	0.3	0.2				
122	5CrMo16	Lower	0.07	0.05		0.03	0.03	3.5	0.4						
102	(72)	Upper		0.25	0.25			4.5	0.6						
123	6F3	Lower	0.55	0.05	0.00	0.025	0.02	1	0.75	1.0			1	 	
124	817M40	Upper			0.60	0.025	0.03	1	0.75	1.8 1.3			1		
124	817140	Lower			0.45		0.02	1.4	0.2					 	
125	826M40	Upper Lower				0.04								╂───	
123	02010140	Upper		0.10		0.04	0.02	0.5	0.45	2.3		-			
126	832M13	Lower			0.70	0.04	0.04	0.8	0.05	2.8				+	
120	0541115	Upper		0.10		0.04	0.04	1	0.1					+	
127	8620	Lower			0.00			0.4	0.25	0.4	0.35			 ┝──	
121	0020	Upper			0.90		0.04	0.4	0.15		0.55			 	
128	8620H	Lower			0.90		0.04	0.35	0.25		0.35			 	\vdash
	8620H														

129	8622H	Lower	0.19	0.15	0.60			0.35	0.15	0.35	0.35				Γ	
		Upper		0.35			0.03	0.65	0.25	0.75						
130	8640	Lower		0.15				0.4	0.15	0.4						
		Upper		0.35		0.035	0.04	0.6	0.25	0.7						
131	9310	Lower		0.15				1	0.08	3						
		Upper		0.35		0.025	0.03	1.4	0.15	3.5						
132	A572	Lower	4	0.20			0.05						0.1			
		Upper		0.35									0.2			
133	A572 Grade 50	Lower			0.80								0.01			
		Upper	0.23	0.40	1.35	0.04	0.05						0.15			
134	AGS-180W6	Lower	1.60	0.30	0.35	0.03	0.03	0.25						5.7		
		Upper	2.00											6.2		
135	API Grade X-70	Lower													1	
		Upper	0.26	0.30	1.65	0.03										0.06
136	Armour Plate	Lower	0.26	0.20	1.00	0.03	0.03	1	0.1						1	
		Upper	0.32	0.50	1.40			1.4	0.4							
137	ARMOX 500T	Lower														
		Upper	0.30		1.20			1	0.7	1.3						
138	AWC-GRADE-1	Lower	0.42	0.15	0.60	0.03	0.03	0.35								
		Upper	0.48	0.35	0.90			0.5								
139	CLARM HBR	Lower	0.28	0.10	0.10			1.3	0.3	3.2			0.16			
		Upper	0.33	0.30	0.40	0.007	0.01	1.7	0.5	3.8	0.15	0.02	0.25			
140	D406A	Lower	0.27	1.40	0.70			1	0.4				0.08			
		Upper	0.33	1.70	1.00	0.013	0.01	1.3	0.55		0.25		0.15			
141	E116	Lower														
		Upper														
142	E920	Lower														
		Upper														
143	EN16	Lower		0.10					0.22							
		Upper	4			0.035	0.04		0.32					L		
144	EN16C	Lower		0.10					0.22					L		
		Upper				0.035	0.04		0.32					 		
145	EN16C (Mod)	Lower		0.10					0.15							
		Upper				0.035	0.04		0.25						<u> </u>	
146	EN18	Lower		0.10				0.9								
		Upper				0.035	0.04								<u> </u>	
147	EN18B	Lower		0.10				0.85								
		Upper		0.35			0.05	1.15							┣──	\square
148	EN18C	Lower	-	0.10				0.9							_	
		Upper				0.035	0.04	1.2							┣──	\mid
149	EN24	Lower		0.10			0.04	1	0.2	1.3					 	┞──┤
4 - 0		Upper		0.40			0.0-	1.4	0.35	1.7					┣──	\vdash
150	EN28	Lower	0.25	0.10	0.70	0.02	0.02	0.75	0.2	3				L		

		Upper	0.40	0.35				1.5	0.65	4.5					Τ	
151	EN31	Lower			0.30	0.04	0.04	1.2		0.3	0.3					
		Upper	1.20	0.35	0.60			1.6								
152	F550	Lower		0.20				0.9					0.1			
		Upper	0.54	0.35	1.10	0.035	0.04	1.2			0.35		0.15			
153	G4335V	Lower		0.10				0.7	0.46	2			0.1			
		Upper	0.40	0.35	0.70	0.01	0.01	1.2	0.6	3.3	0.2	0.015	0.25			
154	HLES-80	Lower								4.07		0.02				
		Upper	0.15	0.25	0.50	0.015	0.01	0.5	0.4	4.8	0.25	0.03	0.09			
155	HMC-Grade-1	Lower	0.28	1.40	0.70	0.01	0.01	1	0.4	0.25			0.08			
		Upper	0.33	1.76	1.00			1.3	0.55				0.15			
156	HRA-PL-01	Lower	0.25	0.15	0.30			1.3	0.3							
		Upper	0.31	0.35	0.80			1.7	0.5							
157	Huffaz-1.5639	Lower		0.18	0.31					3.18						
		Upper	0.19	0.37	0.64	0.025	0.03			3.82						
158	Index-5044	Lower	0.42	0.15	0.60			0.35								
		Upper	0.48	0.35	0.90	0.035	0.04	0.5								
159	PSM-2	Lower	0.25	0.20	0.40			1.5	0.25							
		Upper				0.035	0.04	2	0.35							
160	PSM-3	Lower		0.20				0.7	0.3	2.8						
		Upper			0.60	0.02	0.02	1.1	0.5	3.5						
161	R100	Lower		0.25				1.4								
		Upper				0.025	0.02	1.65			0.3					
162	SA508 Class-3	Lower		0.15		0.02	0.02	0.2	0.45	0.6		0.04	0.02			
		Upper	0.22	0.37	1.50				0.6	1						
163	SCM415	Lower		0.15				0.9	0.15			0.02				
		Upper			0.85		0.03	1.2	0.3	0.25	0.3	0.03				
164	SCM-420	Lower	-	0.15		0.03	0.03	0.9	0.15	0.25	0.3					
		Upper		0.35				1.2	0.3							
165	SCM435	Lower		0.15				0.9	0.15							
		Upper			0.85	0.03	0.03	1.2	0.3	0.25	0.3					
166	ST- 40XHM	Lower		0.17				0.6	0.15	0.7						
		Upper				0.025	0.03	0.9	0.25	1.1						
167	ST- 45X	Lower		0.17				0.8						-		
		Upper	0.49	0.37	0.80	0.025	0.03	1.1								
168	ST-52	Lower														
		Upper	0.22		1.60	0.05	0.05								—	\square
169	ST-52-3	Lower		0.15									0.04		–	
4=0		Upper	0.20	0.40	1.50	0.03	0.04						0.08		—	\vdash
170	St52-3Cu3	Lower													–	
451		Upper	0.15	0.15	0.75	0.01	0.01	0.0			0.5		0.15		—	\vdash
171	SUP10	Lower				0.04	0.04	0.8			0.3		0.15		+	
		Upper	0.55	0.35	0.95			1.1					0.25			

172	SUP6	Lower	0.56	1.50	0.70										
		Upper			1.00		0.04				0.3				
173	SUP7	Lower			0.70	0.055	0.01				0.3				
110		Upper			1.00	0.035	0.04				0.0				
174	SUP9	Lower		0.15		0.000	0.0 .	0.65			0.3				
		Upper			0.95	0.035	0.04	0.95			0.0				
175	SUP9 (Toyota)	Lower	4		0.65	0.04	0.04	0.65							
		Upper		0.35				0.95							
176	SWRH-82B	Lower													
		Upper													
177	V121	Lower	0.31	0.20	0.50			0.8	0.3	2.8					
		Upper	0.37	0.35	0.80	0.01	0.02	1.1	0.4	3.1					
178	V500	Lower	0.38	0.20	0.60			0.9							
		Upper	0.44	0.35	0.80	0.025	0.03	1.2			0.35				
179	W500	Lower	0.50	0.10	0.65			1	0.45	1.5		0.07			
		Upper	0.60	0.40	0.95	0.03	0.03	1.2	0.55	1.8		0.12			
180	0Cr21Ni5Ti	Lower	0.08	0.80	0.80	0.03	0.03	20		4.8					0.3
		Upper						22		5.8					0.6
181	1.2344	Lower	0.37	0.90	0.30			4.8	1.2			0.9			
		Upper			0.50	0.03		5.5	1.5			1.1			
182	1.2367	Lower	0.35	0.30	0.30	0.04	0.04	4.7	2.7			0.4			
		Upper	0.40	0.50	0.60			5.2	3.3			0.7			
183	1.2436	Lower	2.00	0.10	0.15	0.03	0.03	11					0.6		
		Upper	2.25	0.40	0.45			12					0.8		
184	1.3202	Lower	1.30					3.8	0.7			3.5	11.5	4.5	
		Upper	1.45	0.45	0.40	0.03	0.03	4.5	1			4	12.5	5	
185	1.3255	Lower	0.75					3.8	0.5			1.4	17.5	4.5	
		Upper	0.83	0.45	0.40	0.03	0.03	4.5	0.8			1.7	18.5	5	
186	304	Lower					0.03	18		8					
		Upper	0.08	1.00	2.00	0.045	0.03	20		10.5					
187	304L	Lower						18		8					
		Upper	0.03	1.00	2.00	0.045	0.03	20		12	0.35				
188	316	Lower						16	2	10					
		Upper	0.08	1.00	2.00	0.045	0.03	18	3	14					
189	316L	Lower						16	2	10					
		Upper	0.03	1.00	2.00	0.045	0.03	18	3	14					
190	321	Lower						17		9					
		Upper	0.08	1.00	2.00	0.045	0.03	19		12					L
191	410	Lower						11.5							
		Upper	0.15	1.00	1.00	0.04	0.03	13.5							┣──
192	416	Lower													
		Upper													┣──
193	420	Lower		1.00	1.00	0.04	0.03	12							

1		Ummon	0.15					14						
194	431	Upper Lower		1.00	1.00	0.04	0.03	14		1.25				
194	451		0.20	1.00	1.00	0.04	0.03	13		2.5				
107	440.00	Upper	0.05	1.00	1.00	0.04	0.02		0.75	2.5				
195	440C	Lower		1.00	1.00	0.04	0.03	16	0.75					
10.6	10.10	Upper	1.20					18						
196	4Cr13	Lower	0.36					12						
		Upper	0.45	0.60	0.80	0.035	0.03	14		0.6	-			
197	630	Lower						15		3	3			
		Upper	0.07	1.00	1.00	0.04	0.03	17.5		5	5			
198	A105	Lower												
		Upper												
199	A200	Lower			1.20			16.5	2	11				
		Upper	0.03	0.60	1.50	0.04	0.03	17.5	2.3	12	0.35			
200	A604	Lower												
		Upper												
201	A750	Lower												
		Upper												
202	BS 150M19	Lower		0.15										
		Upper	0.23	0.30		0.05	0.05							
203	BS 970 Pt-1	Lower			0.90		0.20							
		Upper	0.15	0.40	1.30	0.07	0.30							
204	D2	Lower												
		Upper												
205	H13	Lower		0.80		0.03	0.03	4.75	1.25			0.8		
		Upper	0.40	1.20				5.5	1.75			1.2		
206	H532	Lower			1.10			24.5		19				
		Upper		1.35		0.03	0.03	26		20.5				
207	K100	Lower	1.90	0.10	0.15			11						
		Upper	2.20	0.40	0.45	0.025	0.03	12			0.25			
208	K105	Lower	1.55	0.25	0.20			11	0.5			0.1	0.4	
		Upper	1.75	0.40	0.40	0.03	0.03	12	0.7			0.5	0.6	
209	K107	Lower												
		Upper												
210	K110	Lower	1.50	0.10	0.15			11	0.6			0.9		
		Upper	1.60	0.40	0.45	0.03	0.03	12	0.8			1.1		
211	N100	Lower												
		Upper												
212	N310	Lower												
		Upper												
213	N685	Lower												
		Upper												
214	SKT/AG-420	Lower	0.16					9						
		Upper	0.20	1.00	1.00	0.04	0.03	10		0.6				

215	SUS-410	Lower	0.15	1.00	1.00	0.04	0.03	11.5		0.6					
		Upper						13.5							
216	SUS-420-J1	Lower	0.16	1.00	1.00	0.04	0.03	12		0.6					
		Upper	0.25					14							
217	SUS-420-J2	Lower	0.26	1.00	1.00	0.04	0.03	12		0.6					
		Upper	0.40					14							
218	SUS430	Lower	0.12	0.75	1.00	0.04	0.03	16		0.6					
		Upper						18							
219	T4	Lower	0.70	0.20	0.20			3.75	0.7			0.8	17.25	4.25	
		Upper	0.80	0.40	0.40	0.03	0.03	4.5	1			1.2	18.75	5.75	
221	X17	Lower						16							
		Upper	0.12	0.80	0.70	0.035	0.03	18			0.3				
222	Gray Cast Iron	Lower	3.50	0.80	0.50	0.05	0.08								
		Upper	3.80	1.90	1.10	0.15									

Note: Total 222 steel grades

Chemical composition of some grades of Case Hardening steels

	-	-								Annex-II
Steel grade \ Elements	С	Si	Mn	Р	S	Cr	Мо	Ni	Cu	Al
20MnCr5	0.17 - 0.22	0.15 - 0.4	1.1 - 1.4	0.035 (Max)	0.035 (Max)	1 - 1.3				
AISI/ SAE-8620	0.18 - 0 .23	0.15 - 0.35	0.7 - 0.9	0.03 (Max)	0.04 (Max)	0.4 - 0.6	0.15 - 0.25	0.4 - 0.7	0.35 (Max)	
AISI/ SAE-8622H	0.19 - 0.25	0.15 - 0.35	0.6 - 0.95	0.04 (Max)	0.03 (Max)	0.35 - 0.65	0.15 - 0.25	0.35 - 0.75	0.35	
JIS SCM-415	0.13 - 0.18	0.15 - 0.35	0.6 - 0.85	0.03 (Max)	0.03 (Max)	0.9 - 1.2	0.15 - 0.3	0.25 (Max)	0.3 (Max)	0.02 - 0.03
	1									
JIS SCM-420	0.18 - 0.23	0.15 - 0.35	0.6 - 0.85	0.03 (Max)	0.03 (Max)	0.9 - 1.2	0.15 - 0.3	0.25 (Max)	0.3 (Max)	
JIS SCM-435	0.33 - 0.38	0.15 - 0.35	0.6 - 0.85	0.03 (Max)	0.03 (Max)	0.9 - 1.2	0.15 - 0.3	0.75 (Max)	0.3 (Max)	

Chemical composition assortment to ascertain case hardening steels

Elements	С	Si	Mn	Р	S	Cr	Мо	Ni	Cu	Al
Chemical composition assortment to ascertain case hardening steels	0.17 - 0.38	0.15 - 0.40	0.6 - 1.10	0.03 - 0.035	0.03 - 0.035	0.35 - 1.3	0.3 (Max)	0.25 (Max)	0.3 (Max)	0.03 (Max)