

By Research and Publications Department, ICMA

akistan has been consistently facing a negative trade balance due mainly to higher imports than exports. The trade deficit crossed \$39 billion during Jul-Apr FY2022 with imports almost double the exports. An analysis of the import groups shows that Petroleum products constitute around 20.2% of the total imports, followed by Machinery with 18%, agricultural and chemicals with 16.5%, and food items with 14.8% share in imports. Table-1 shows the value of imports in USD million under these Groups during FY 2020 and FY 2022, respectively.

billion crude petrol] showing a jump of 121% and 75% respectively. During July-Apr of FY2022, the LNG imports stood at \$3.7 billion- showing an increase of 83% from the same period last year.

# Reasons for high import of Refined Oil

The foremost reason is the low capacity of domestic refineries in Pakistan to process crude oil. The total refining capacity is around 20 million tons; however, this capacity could not be fully

> utilized due mainly to the non-upgradation of refineries and technical and financial constraints. At present, five big oil refineries are running mostly on imported crude oil. PARCO leads with the highest production of MS and HSD patrols followed by ARL, BPPL, PRL, and NRL, respectively. During FY2019-20, the total production of all these five oil refineries was 1,973,444 Metric tons (MS) and 3,741,783 Metric tons (HSD). [Source: OCAC]

Table 1. Gloup-wise Allarysis of Imports							
Import Group	Major Items of Imports	Share in total Imports (USD Million)	Imports in FY2021 (USD Million	Imports in FY2020 )			
Petroleum	Petroleum products, Petroleum Crude, LPG	20.2%	11,358	10,412			
Machinery	Telecom, Power, Electrical, Textile, Construction, and Agriculture	18%	10,147	8,782			
Chemicals	Fertilizers manufacture, insecticides, plastic materials, and medicinal products	16.49%	9,300	7,354			
Food	Wheat, Sugar, Palm Oil, Dry fruits	14.8%	8,348	5,424			
Metals	Iron and Steel, Iron and Steel scrap	8.69%	4,897	4,058			
Textile	Raw cotton, Synthetic Fiber, Synthetic & Artificial Silk Yarn, and Worn Clothing	5.7%	3,866	2,529			
Transport	Motor cars, Buses, Trucks, ships, etc.	5.3%	2,987	1,546			

Table 1: Group-wise Analysis of Imports

- (1) Pak-Arab Refinery Company Limited (PARCO)
- (2) Attock Refinery Limited (ARL)
- (3) Byco Petroleum Pakistan Limited (BPPL)
- (4) Pakistan Refinery Limited (PRL)
- (5) National Refinery Limited (NRL)

In this article, we would confine to only providing an analytical review of the top-most import i.e. Petroleum.

#### Petroleum

The imports of petroleum products (refined) and crude petroleum constituted around 73% share of the total imports under the Petroleum Group during FY2021-22 [45.4% refined petrol and 27.4% crude petrol].

During FY2020-21, Oil imports [both refined and crude] stood at \$8.27 billion as against \$7.46 billion in FY2019-20 an increase of 9.1 percent. Import of refined petrol increased from \$4.73 billion in FY20 to \$5.16 billion in FY21 whereas import of crude petrol also surged from \$2.72 billion to \$3.11 billion during the same period. Imports of LPG which stood at \$294 million in FY2020 shoot up to \$473 million in FY21 and during Jul-Mar FY22 it has climbed to \$514 million.

During the first 10 months [Jul-Apr] of FY2022, oil imports have soared to \$12.7 billion [\$8.5 billion refined petrol and \$4.2

# Sources of Petroleum Products in Pakistan

There are two main sources of supply of petroleum products in Pakistan viz.

- 1) Crude Oil (local and imported)
- Refined Oil (Imported)

The Oil fields in Pakistan feed the refineries with local crude oil constituting around 30% of total crude oil refined and the rest of the crude oil i.e. 70% is imported. The imported refined petrol makes up 60% of HSD and MS combined.

## **Local Crude Oil Extraction**

As per the Economic Survey 2020-21, the local extraction [production] of Crude Oil declined to 20,768 USB during the first 9 months [Jul-Mar] of FY2020-21 as compared to 22,263 USB in Jul-Mar FY2019-20. The crude oil production has gone down sharply from 32,557 USB in FY2017-18 to 28,091 USB in FY2019-20.

# FOCUS SECTION



Crude oil's local extraction and imports reached 68.9 million barrels in Jul-Mar FY2021 from 58.6 million barrels in the corresponding period last year, while the share of imports in Jul- March 2021 remained 48.2 million barrels as compared to 38.8 million barrels in last year's same period.

#### **Local Oil Refineries Production**

According to the data released by the Oil Companies Advisory Council (OCAC), the production/output of the local refineries in Pakistan has declined by 27% to 7.476 M. Tons in Jul-March FY2022 from 10.346 M. Tons in FY2021 (July-June), mostly because of a reduction in the production of Furnace Oil (FO). The FO output has gone down markedly from 10.346 million M. Tons in FY2021 to 7.647 million M. Tons in Jul-Apr FY2022.

During FY2017, the local consumption of petroleum products was 25.69 million M. Tons which has constantly been declining and it reached 19.82 million M. Tons in FY2021. The major decline is in the production of Furnace Oil which stood at 7.39 million M. Tons in FY2018 and fell sharply to 3.24 million M. Tons in FY2021.

## **Consumption of MS and HSD Petrol**

Motor Spirit (MS) is the common man's fuel and is used mainly by cars, motorcycles, commuter vehicles, and light traffic vehicles. The annual consumption of MS in Pakistan is around 7.5 million metric tons (MMT) to 8 million MMT. The five refineries in Pakistan cater to only 30% of MS demand whereas 70% is imported.

Table 2: Oil Production by Refineries in Pakistan [Unit: M. Tons]									
Product	FY2017-18	FY2018-19	FY2019-20	FY2020-21	FY2021-22 [Jul-Mar]				
Jet Fuel	873,300	788,442	562,663	470,983	452,013				
Kerosene	111,637	110,367	84,984	92,732	80,279				
Motor Spirit (MS+HOBC)	2,198,996	2,269,713	1,973,444	2,486,476	1,858,530				
High-Speed Diesel (HSD)	5,257,811	4,740,701	3,790,431	4,697,017	3,459,158				
Light Diesel Oil	33,341	38,892	23,522	16,165	12,917				
Furnace Oil	3,262,804	2,873,745	2,223,303	2,549,069	1,779,230				
<b>Grand Total</b>	11,737,889	10,821,919	8,661,684	10,346,232	7,647,382				

High-Speed Diesel (HSD) is used in the transport sector, industrial, agricultural, heavy electricity generators, and construction industries. Around 65% of the HSD demand in the country is catered by the local refineries whereas 35% comes through imports from different countries. HSD is transported from ports or refineries to the depots of OMC through the pipelines and then from depots to the retail outlets.

Table-2 indicates that Petrol (MS) production nosedived to only 1.86 million tons in Jul-Mar FY22 as against 2.49 million tons in Jul-Jun period of FY2021. Similarly, HSD output has gone down to 3.5 million tons from 4.7 million tons and Furnace Oil to 1.78 million tons from 2.55 million tons during the same period.

The constant decline in the local oil production has compelled the country to import high-priced refined petroleum products from the international market for the last many months.

### **Domestic consumption of Petroleum Products**

16.49 million tons during the first 9 months [Jul-Mar] of FY2022. Table-3 shows the domestic consumption of petroleum products during the last few years:

# The domestic consumption of petroleum products jumped to

Table 3: Domestic Consumption of Petroleum Products [Unit: M. Tons]								
Product	FY2017-18	FY2018-19	FY2019-20	FY2020-21	FY2021-22 [Jul-Mar]			
MS (Petrol)	7,386,362	7,599,364	7,454,021	8,351,274	6,734,57			
Kerosene	114,386	102,830	88,939	70,211	50,628			
HSD	9,043,865	7,359,243	6,633,236	7,794,310	6,438,453			
Jet Fuel (JP-1)	928,499	791,748	550,835	363,514	386,022			
Furnace Oil	7,393,917	3,536,119	2,368,055	3,239,142	2,877,818			
Grand Total (Million Metric Ton)	24.87	19.39	17.10	19.82	16.49			

## Recommendations for curtailing oil import

- Oil Refinery and Exploration Policies: The Government should announce the Oil refinery Policy with lucrative incentives for attracting new investments in the oil and gas industry, especially the oil refinery industry in Pakistan. Incentives should also be considered for oil and gas exploration firms to increase efforts to find new hydrocarbon reserves that would help reduce the oil import bill.
- Import of Cheaper Oil from Russia: The Government must reduce its dependence on oil imports from the Middle East, especially UAE, Qatar, and Saudi Arabia, and focus on the purchase of oil and LNG from Russia. The Russian oil is much cheaper and other countries, including neighboring India, are also importing the Russian oil. Russia produces four oils, namely ESPO, Urals, Sokol, and Sakhalin. Out of these four, Pakistan's refineries can process ESPO and Sakhalin easily.
  - Upgrading of existing Oil Refineries: The Government must provide policy incentives for the upgradation of the existing oil refineries that would increase the local production capacity.
  - Reduce Working Days: The Government is already thinking of going to a 4-working day a week. This should be implemented with immediate effect as it would reduce consumption of oil and gas and would lead to a reduction in our oil import bill.