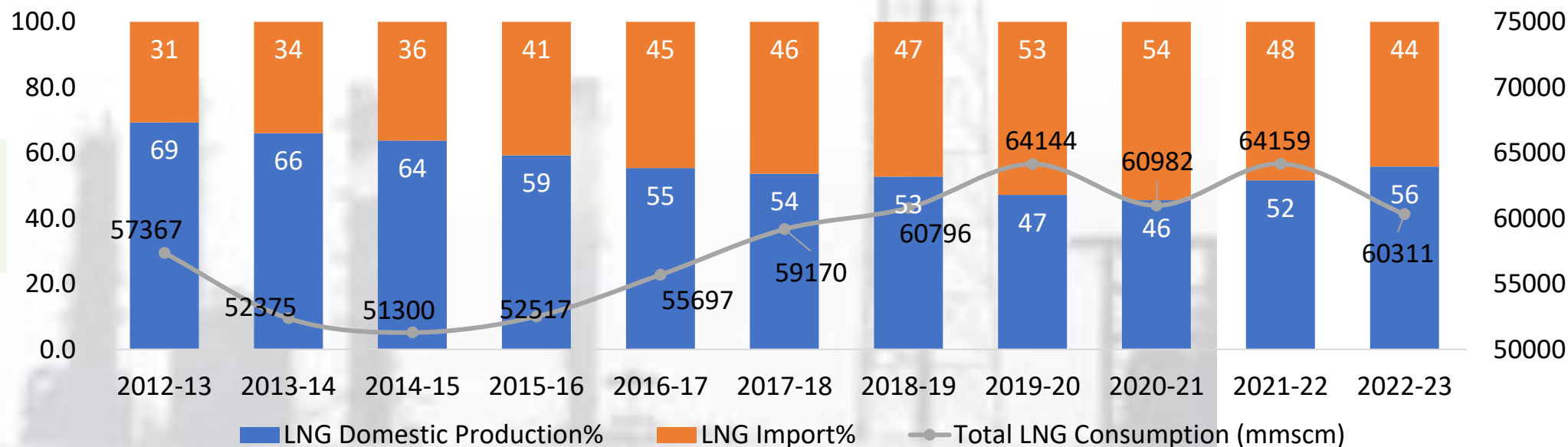


The Story So Far

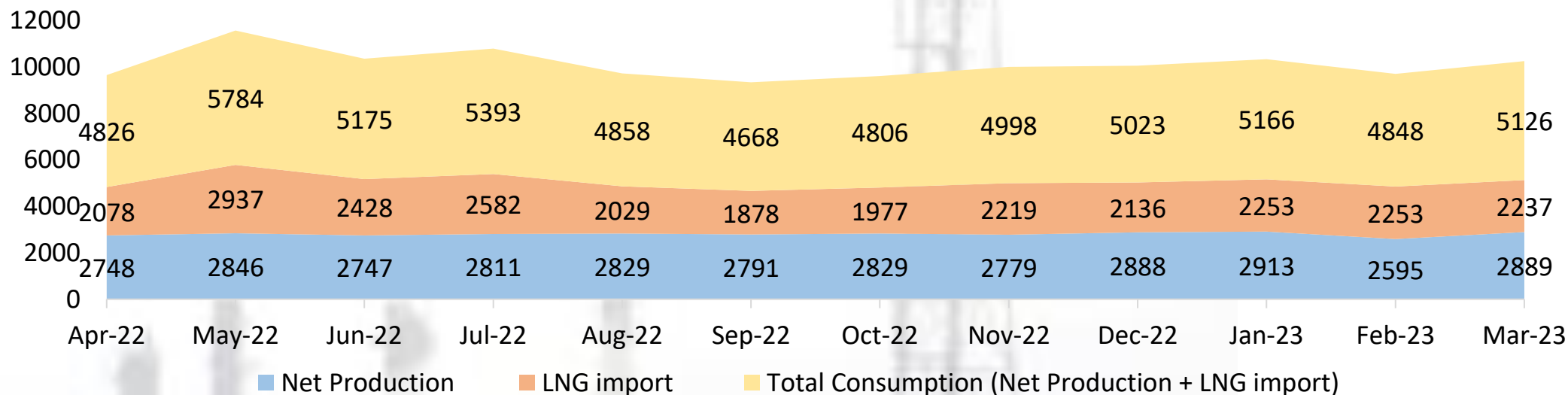
- The oil and gas sector is among the 8 core industries in India.
- It plays a major role in the decision-making of all the other important sections of the economy.
- India ranks 14th in the world for natural gas consumption, accounting for about 1.5% of the total global consumption and India is the world's fourth largest buyer of LNG, after Japan, South Korea and China
- Overseas purchases are expected to rise by 10% per annum through the 2020s. .
- **During 2012-2022 India's Natural Gas:**
 - Consumption from 2012-2022 increased by 1% CAGR from 57,367 mmscm to 64,159 mmscm.
 - Production decreased at a CAGR of 2% from 39,753 mmscm to 33,131 mmscm
 - Net imports grew at 6.5% CAGR to 31,028 mmscm from 17,614 mmscm during the same period.

India: LNG Production vs. Imports Dynamics [2012 – 13 to 2022 – 23]



- The last financial year saw India’s consumption fall to its lowest in half a decade. It also saw India’s domestic production being more than imports for 2 years running.
- From April 2022 – March 2023 India imported 26,647 mmscm of natural gas, its lowest imports since 2018 – 19.
- With consumption at 60,311 mmscm, also its lowest consumption since 2018 as well.
- This can be attributed to increased costs due to the Russia and Ukraine conflict and resulting sanctions on Russia causing turmoil in global supply chains – spot prices, shipping charges to increase resulting in higher prices.
- There was also a major fall in imports of natural gas during the months between August and December compared to last years.

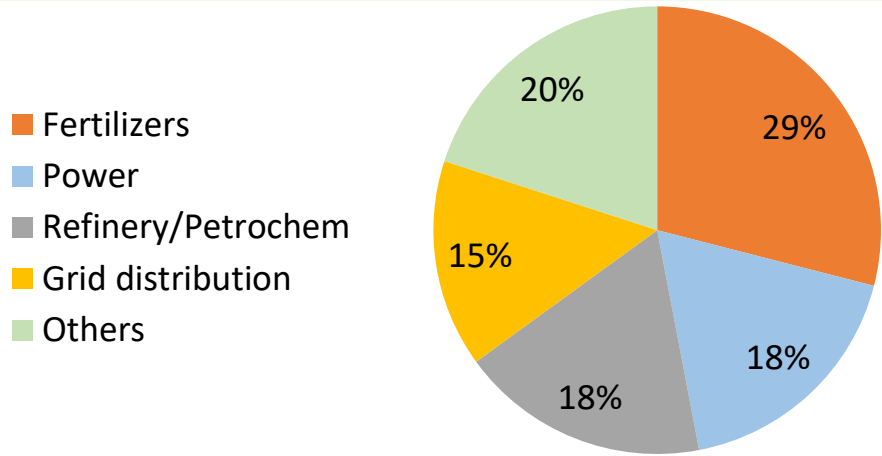
Monthly Trends FY 2022 – 23 (mmscm)



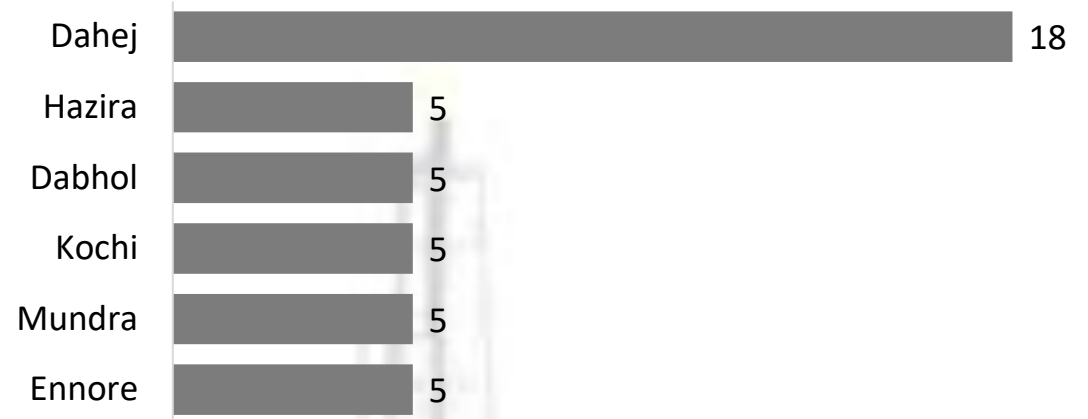
CNG Stations and PNG Connections

- India has 5,118 CNG stations as of February 2023; whereas, it has 10,562,564 active domestic PNG connections, 37,031 commercial connections and 14,854 industrial connections.
- Gujarat has the highest number of CNG stations and PNG connections in the country followed by Maharashtra, Uttar Pradesh and the National Capital Region of Delhi.

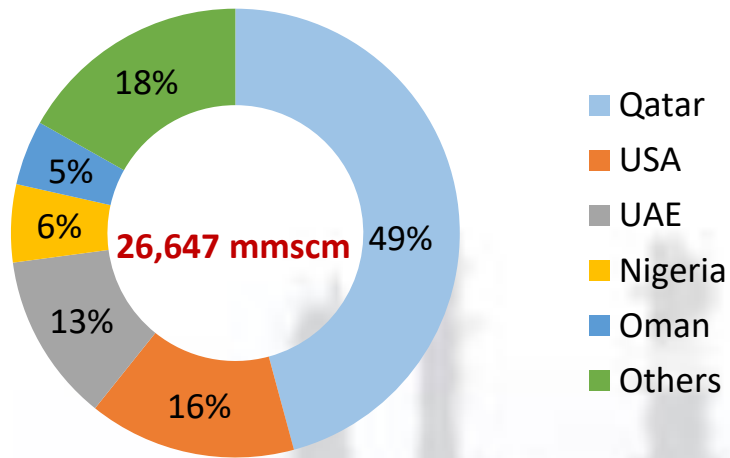
Top 5 Consumers of LNG in India by Sectors



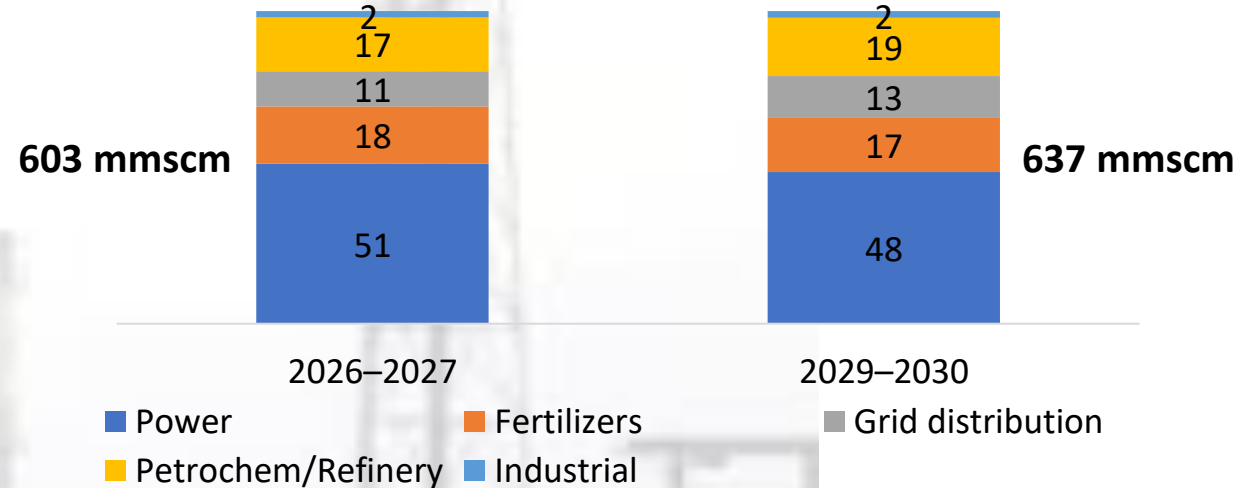
LNG Terminals in India (mtpa)



Top 5 Countries India has Imported from



Expected Consumption by Sectors (in %)



LNG Terminals Planned

Terminals	Capacity (mtpa)	Terminals	Capacity (mtpa)
Chhara	5	Jaigarh	4
Dhamra	5	Kakinada	2.5
East Coast	5	Kolkata Port	2.5
Jafrabad	5	Krishnapattanam	2.5

Major LNG Importers/Receivers

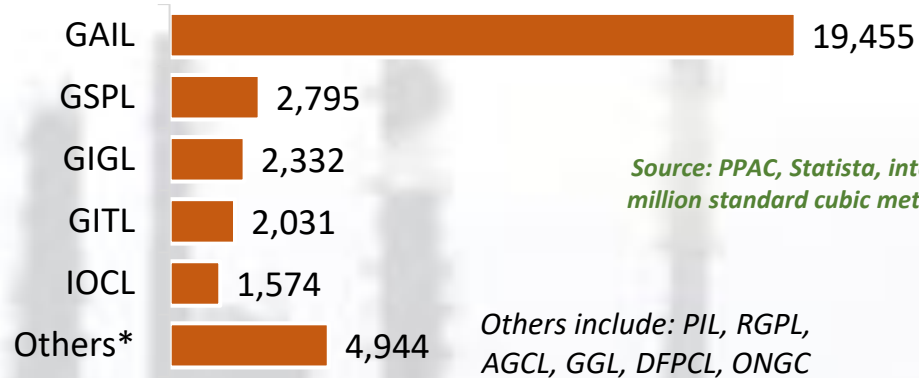
- Petronet
- AMNS
- Gail
- GSPCL
- Sail
- IOCL

Drivers

- **Conducive environment** for investment in gas market with policy level push from Ministry of Petroleum and Natural Gas, projecting LNG as the future fuel.
- Development of pan-India **national gas grid and increase in pipeline network**.
- Ambitious targets on **carbon emissions**, to boost natural gas usage in industrial sector away from coking coal.
- Plan to **raise the share of NG in the energy portfolio to 15% by 2030 from the current share of 6.2%** will increase imports and production.
- Government to set up **emergency stockpiles of LNG**, like the oil industry's strategic reserves
- LNG being considered as an **alternate fuel for 1 Lakh buses and trucks by 2024**, as also a bunker fuel for a fleet of **14,000 fishing vessels**.
- LNG to be **transportation fuel** in inland waterways with several projects being implemented by the IWAI.
- **LNG in cold warehousing chain** with potential opportunity of new warehouse capacity of 0.4 MMT corresponding to an investment of USD 130 millions
- Country's NG **consumption projected to rise to 550 mmscmd by 2030** from current 174 mmscmd with more industries like steel becoming users.

Natural Gas Pipeline Length (Km) by Operators (31st December 2022)

Operational + Partially Commissioned + Under Construction

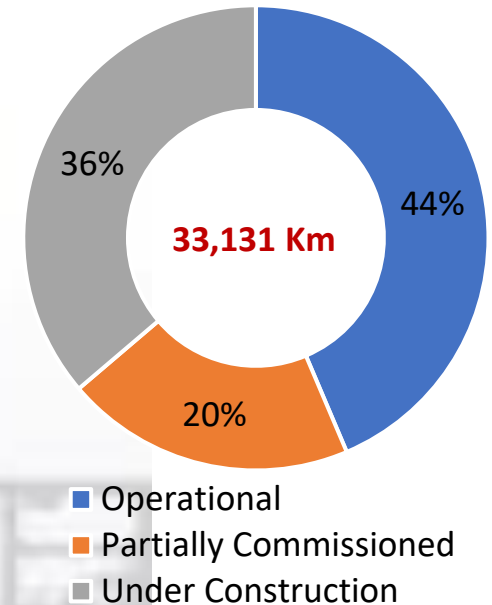


Source: PPAC, Statista, intechopen | Abbreviations: mmscm: million standard cubic meter, mtpa: million tones per annum

Challengers

- **Insufficient infrastructure** for the import of Natural Gas
- Low **pipeline penetration** and lack of cost-competitiveness of natural gas
- Natural gas **being out of purview of goods and services tax (GST)** is also an impediment for growth of the sector

Natural Gas Pipeline Network (31st December 2022)



Thank You!

