



IndianOil

Asia Corporate Day

Indian Oil Corporation Limited

September 05, 2017

Indian Oil Corporation: The Future of India Energy



Strong Support from the Government of India

- Maharatna Company; Gol Control: 57.34%
- Government nominated Directors on IOC Board
- Contribution to exchequer of US\$28 bn in FY17

Largest Refiner in the Country

- 11 refineries with 81.20 MMTPA Capacity
- 35% of Domestic Refining Capacity

Pan-India Pipeline Infrastructure

- 12,700+ km pipelines for crude oil and products with a total capacity of 93.7 MMTPA
- 48% share in crude and product pipeline (by length)

Leading Market Share Across Portfolio

- 45.1% petroleum market share in FY17 with over 46,500 touch points

Integrated Operations Across the entire Energy Value Chain

- 2nd largest domestic player in Petrochemicals
- E&P: 8 domestic and 9 overseas blocks

Strong Focus on Innovation Through R&D and Alternate Energy Sources

- 554 active patents as on 31.03.2017
- New focus on Alternate and Renewable Energy (Wind, Solar, Biofuels, Nuclear)

Driven by a Management Team That has Delivered Results

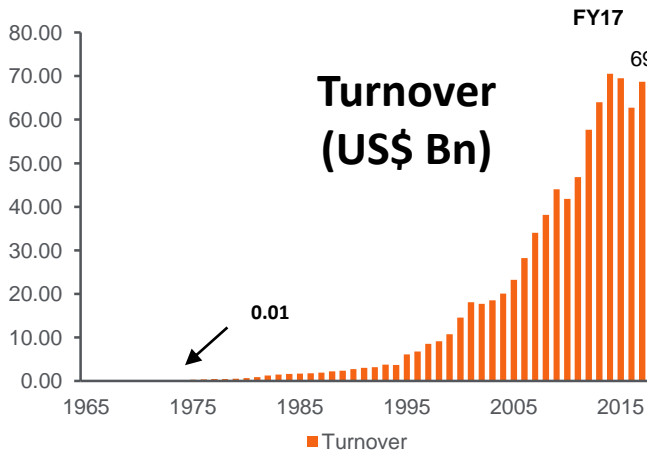
- Consistent growth
 - FY11-FY17 Revenue CAGR: 6.59%



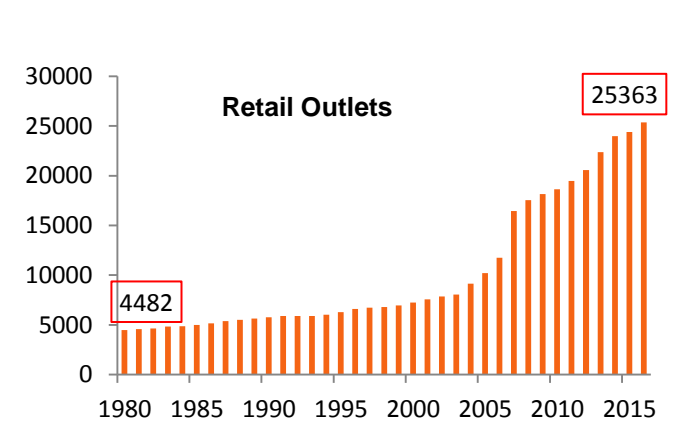
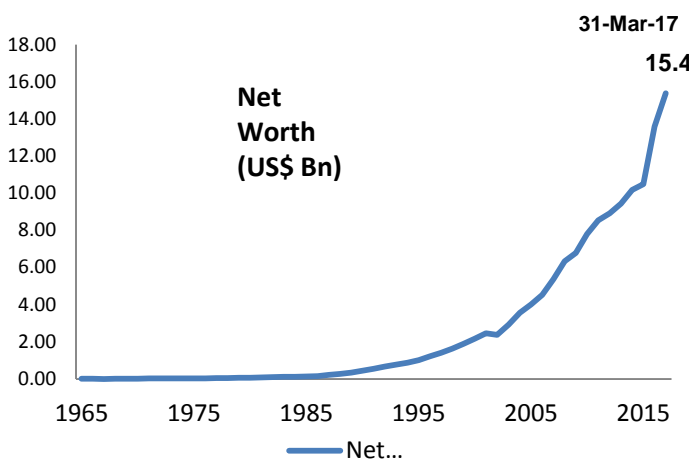
Note: Company Filings and Petroleum Planning and Analysis Cell (<http://ppac.org.in/>). USD-INR:64.8550 (as on March 31, 2017)

Our Journey at a Glance

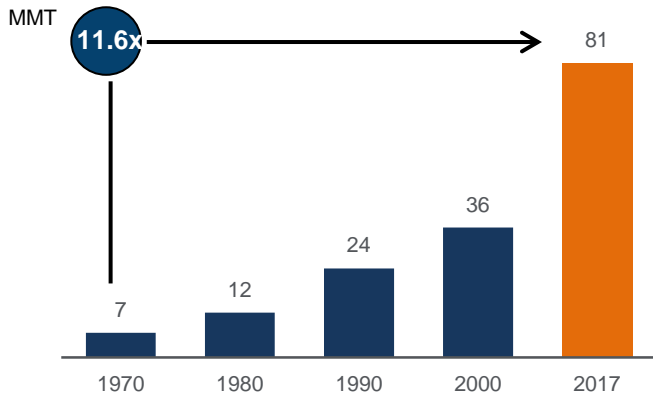
From a humble beginning to an Oil Giant



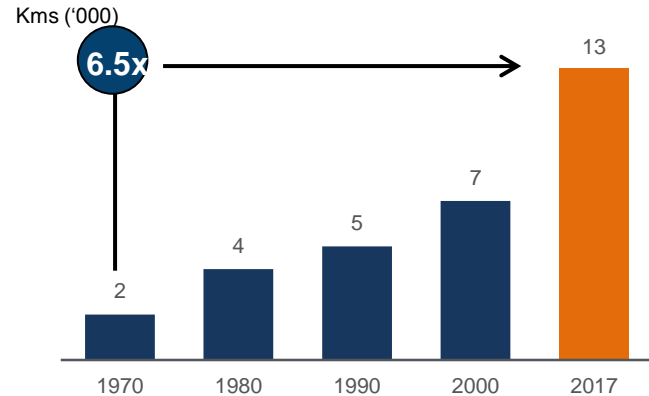
Source: Company Filings



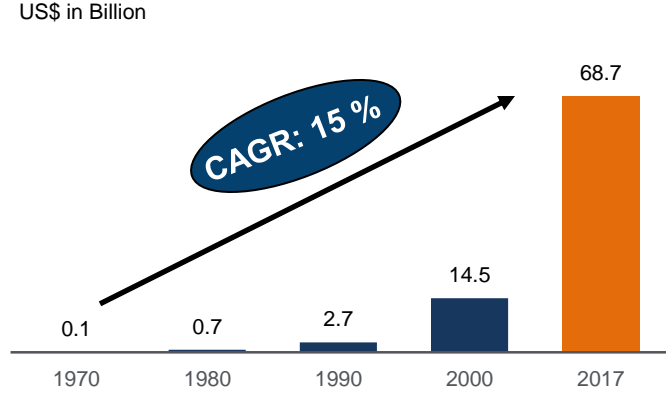
Refining Capacity



Pipeline Network



Turnover



Note: IOC is ranked 14th as per Platt Global Energy Company Rankings 2016.
 IOC is ranked 161 amongst Fortune Global 500 Companies in 2016.
 US\$-INR:64.8550 (as on March 31,2017)

Well Poised to Leverage Strong Industry Dynamics

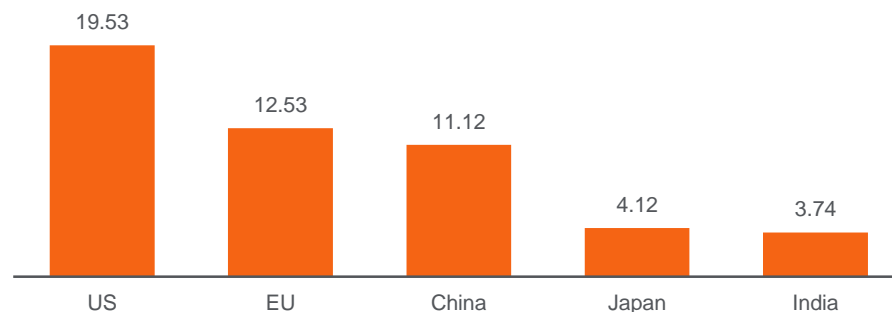
India is Among the World's Fastest Growing Economies

GDP Growth	2015	2016	2017 P	2018 P
India	7.3%	7.5%	7.5%	7.6%
China	6.9%	6.5%	6.2%	6.0%
ASEAN-5	4.8%	4.8%	5.1%	5.2%
Brazil	(3.8%)	(3.8%)	0.0%	1.1%
Russia	(3.7%)	(1.8%)	0.8%	1.0%

Source: IMF World Economic Outlook, April 2017 (GDP at constant Prices)
 ASEAN-5: Indonesia, Malaysia, Philippines, Thailand & Vietnam

Low per Capita Oil Consumption Represents an Underpenetrated Opportunity...

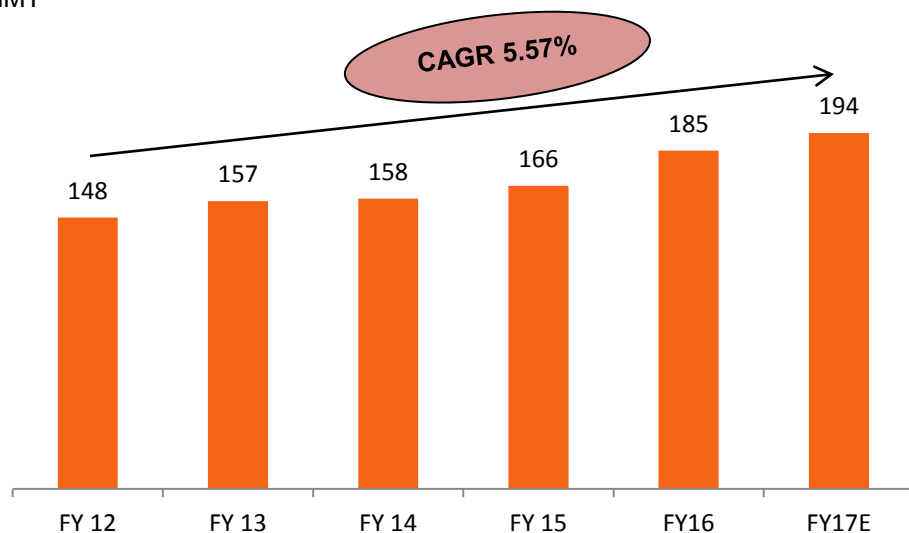
Consumption in million barrel per day



Source: CIA World Fact book (2014 & 2015 Est.)-as per website on 21 Aug 2017

Oil Consumption Trends Have Been Rising Marginally...

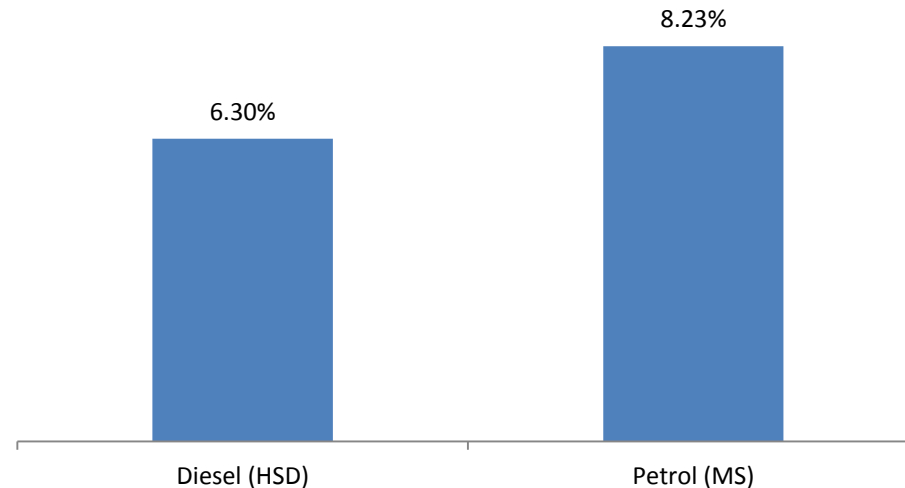
MMT



Source: Petroleum Planning and Analysis Cell, Ministry of Petroleum and Natural Gas, Govt. of India.

...With Strong Growth in Consumption Across Key Products

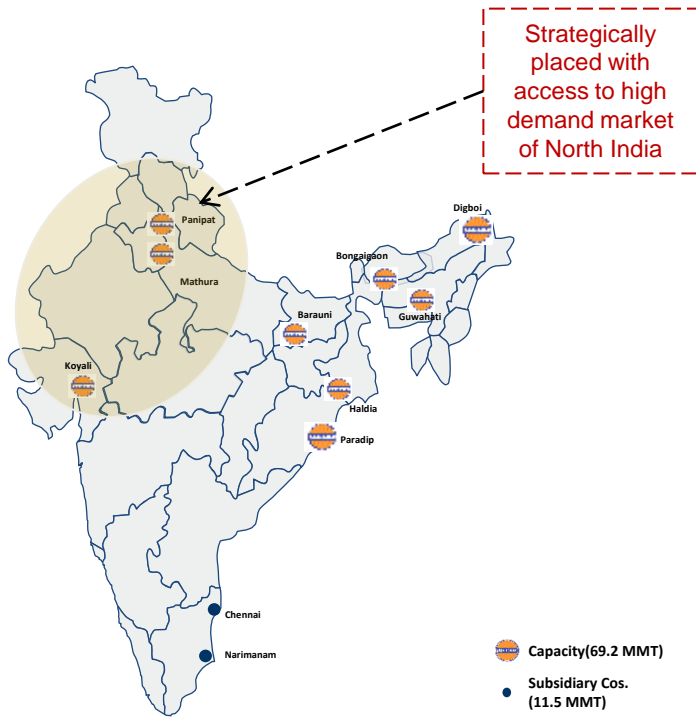
FY18 – FY22 E CAGR



Note: HSD: High Speed Diesel and MS: Motor Spirit
 Source: Petroleum Planning and Analysis Cell

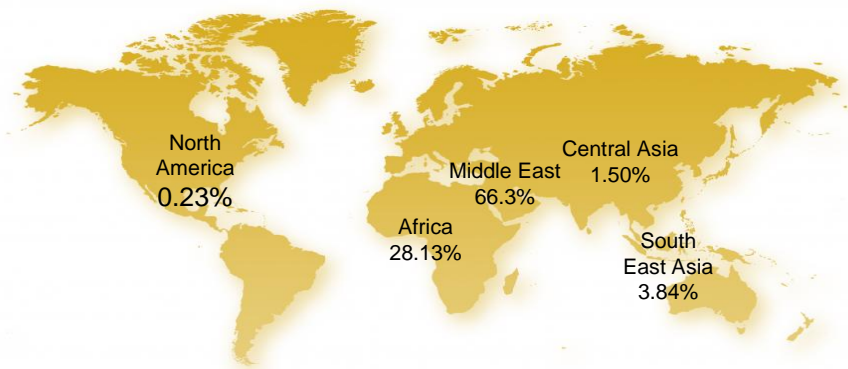
IOC - The Largest Refiner in India

Strategic Presence With Access to High Demand Markets



Note: Figures as of March 31, 2017

Importing Crude from Across the Globe

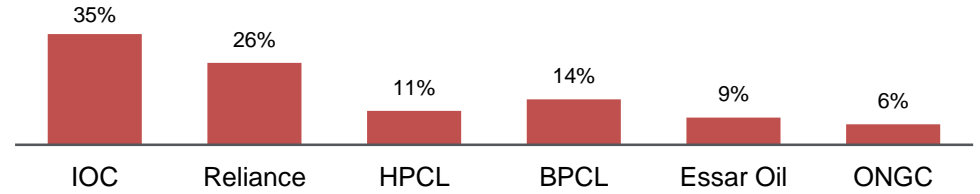


Total crude oil import : 63.79 MMT (including 7.74 MMT for CPCL)

Figures for FYE 2017

Source: Company Filing

Leader in Refining Market Share⁽¹⁾

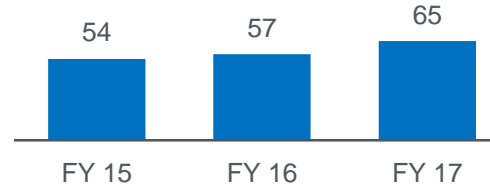


Note: Figures as of March 31, 2017.

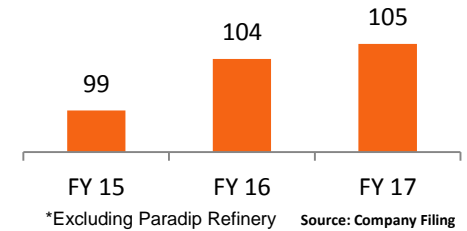
(1) Market share based on group Refining Capacity

Source: PPAC website

Refinery Throughput (MMT)

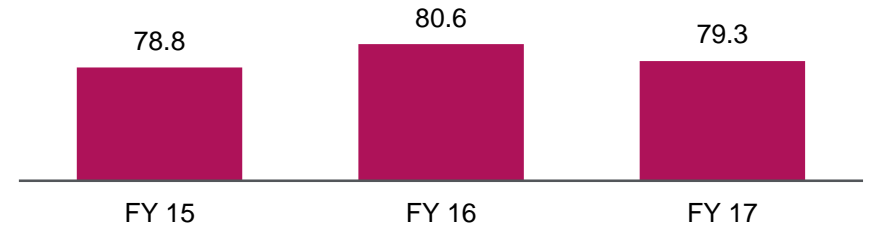


Capacity Utilization* (%)



*Excluding Paradip Refinery Source: Company Filing

Steady Distillate Yields* (%)

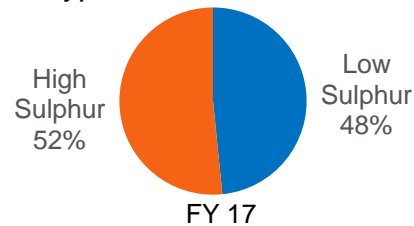


*Excluding Paradip Refinery

Source: Company Filing

Changing Crude Mix for Enhanced Profitability

Type of Crude Oil Used



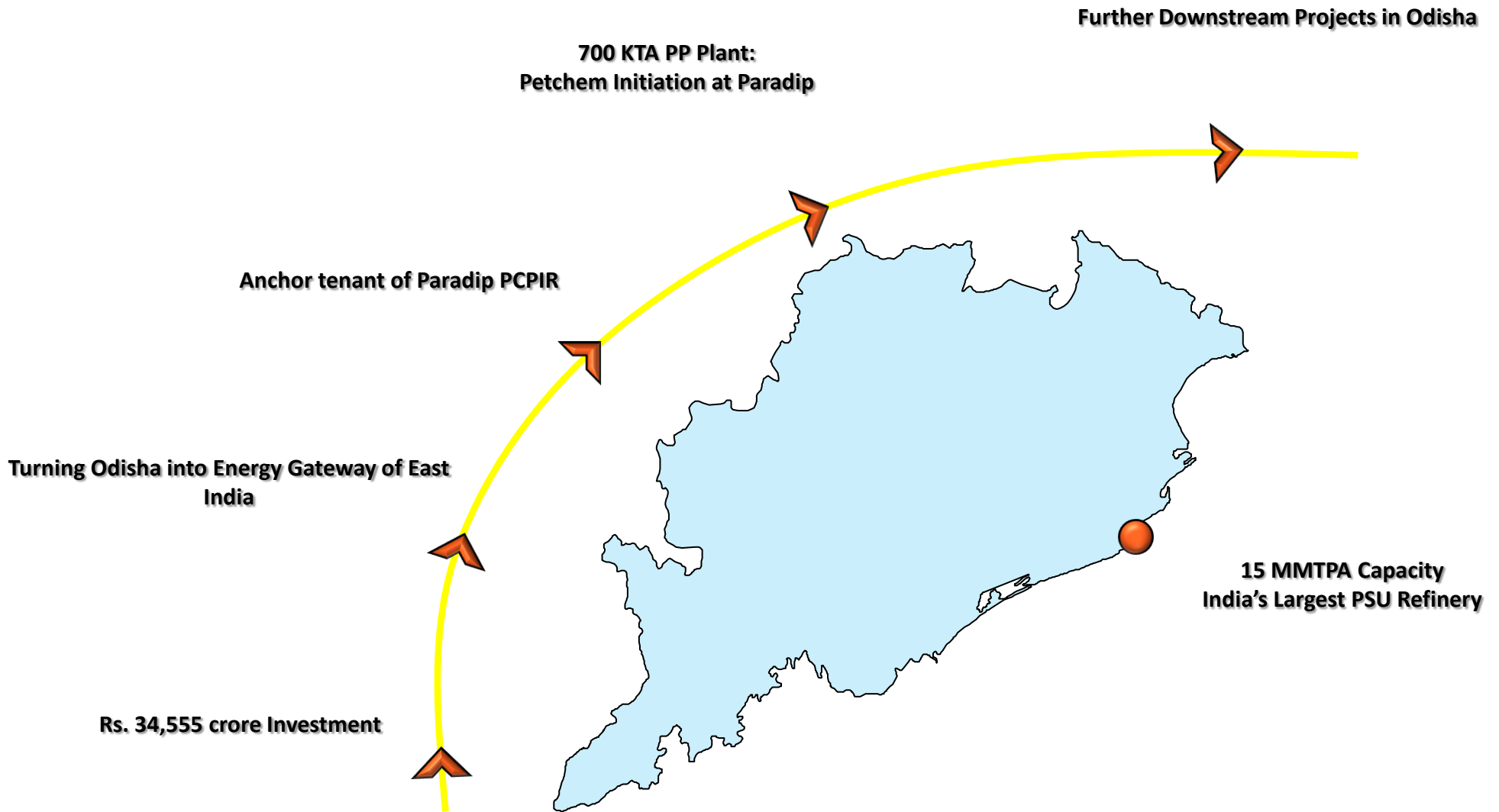
✓ Producing Euro IV grade fuels

✓ Preparing for Euro VI

Note: All figures for the year ended March 31 of the respective years.

Source: Company Filing

Paradip Refinery – Modern Marvel



Paradip Refinery– Salient Features

Paradip Refinery: Augmenting IOC's Capacity

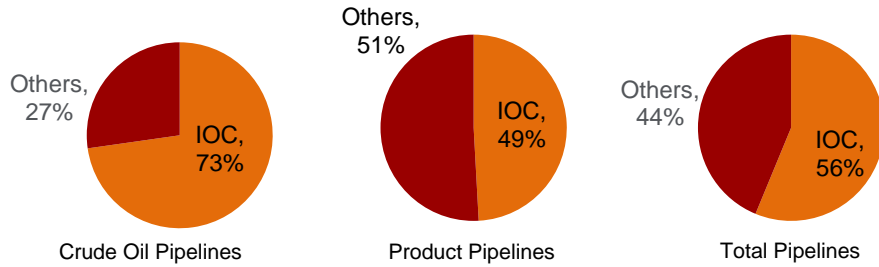
- **Capacity : 15 MMPTA**
 - Operating at 100% capacity from May'17 onwards
- **One of the most modern refineries:**
 - 100% HS including 40% Heavy
 - Nelson Complexity Factor – 12.2
 - Processed 99.99% Sour Crude in Q1 17-18
- **Product Slate :**
 - MS 25%, HSD 38%, ATF/SKO 13%, LPG 5%, Petcoke 8%
- **Distillate Yield – 80%**
 - For Q1 17-18
- **Improvising Opex**
 - 1.40 \$/bbl in Q1 17-18 against 2.05 \$/bbl in FY 16-17
- **Energy Index – 50 MBN**
 - Among the best in the industry

INDMAX Unit



Unparalleled Network of Cross Country Pipelines

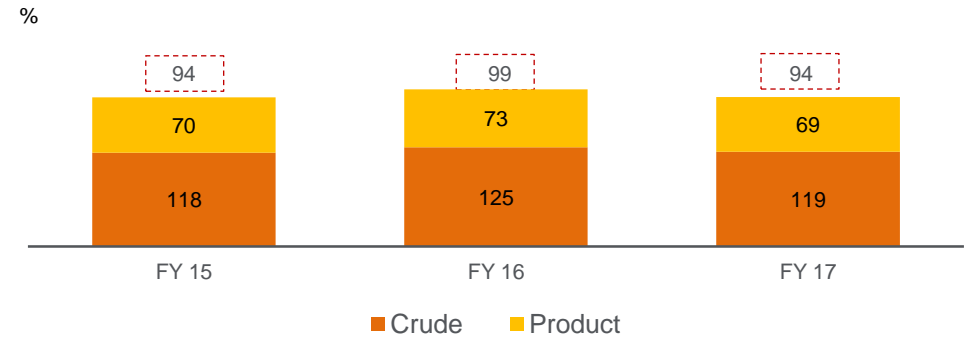
Largest Pipeline Market Share - Downstream



Source: PPAC Website

Note: Figures as of March 31, 2017

High Capacity Utilization

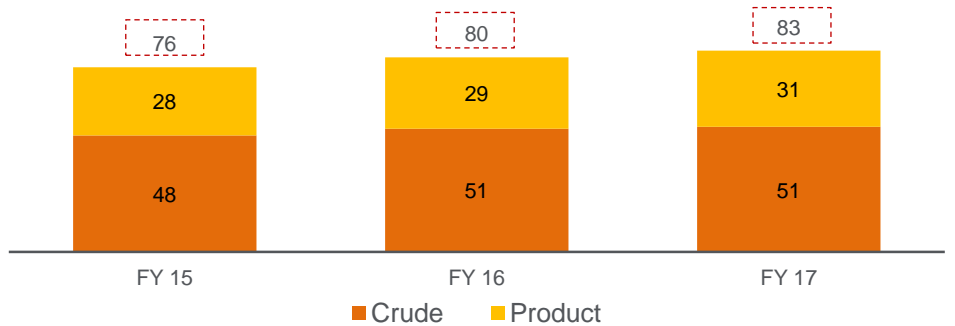


Source: Company Filing

Indicate Total Capacity Utilization

Pipelines Throughput

MMT

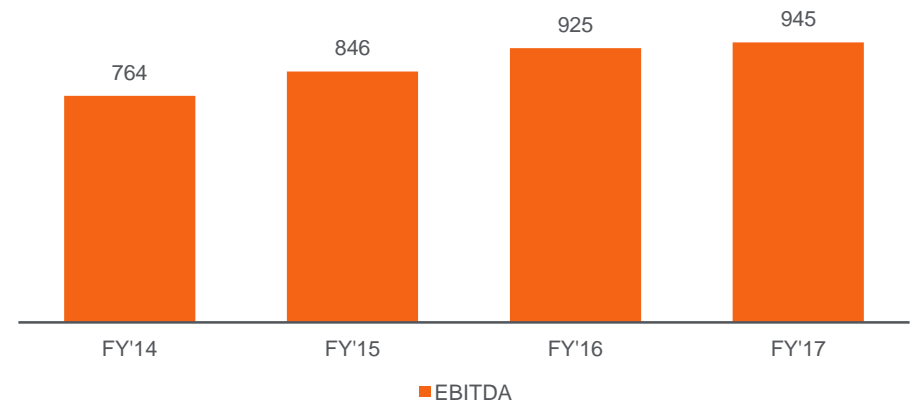


Indicate Total Throughput

Source: Company Filing

Steady Revenue Stream with healthy EBITDA

In US\$ millions



All annual figures for the year ended March 31 of the respective years.
USD-INR:64.8550 (as on Mar 31, 2017)

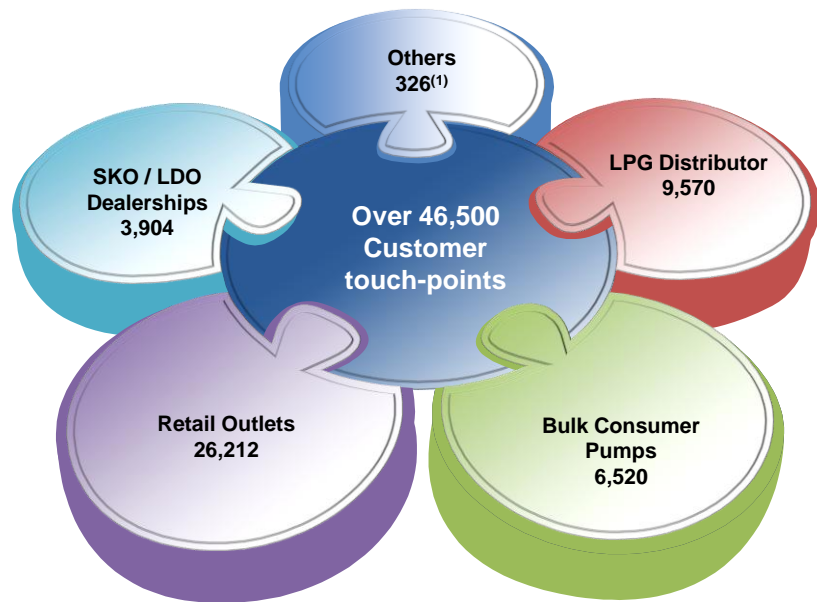
Extensive Network of Cross Country Pipelines



As on July 31 2017

Marketing: Reach in Every Part of the Country

Pan India Presence with Multiple Consumer Touch Points



All figures for the year ended March 31, 2017

Source: Company Filing

Other Key Highlights

- Rural Thrust and Penetration ✓ 7,051 Kisan Sevak Kendras (KSK)

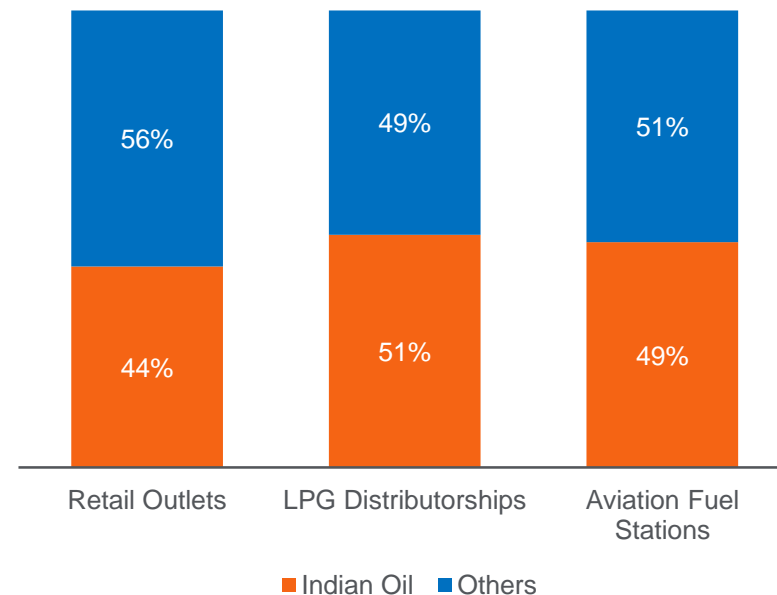
- LPG ✓ Supply to over 99 million households

- Petroleum Product Market Share ✓ 45.1% share in petroleum products

Note: (1) Others includes Aviation Fuel Stations, Terminals, Depots and LPG Bottling Plants.

Source: Company Filing

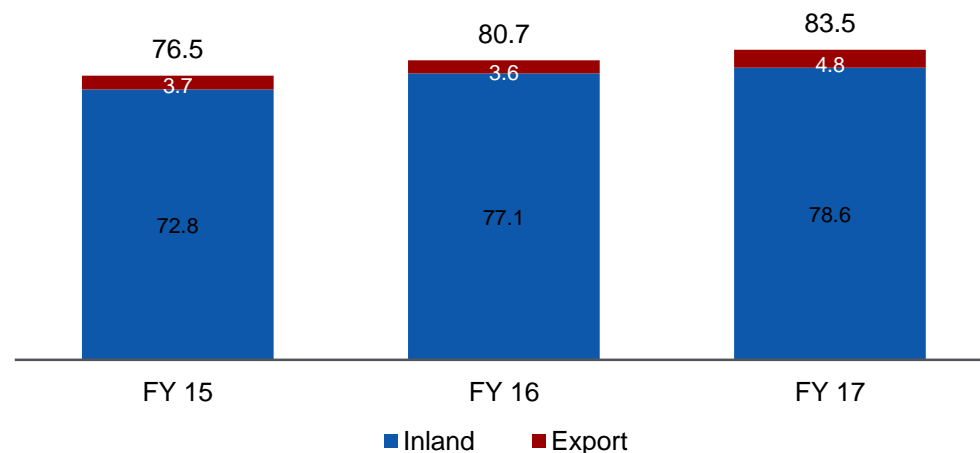
Leader in Market Infrastructure



Source: Company Filing & PPAC Website

Operating Highlights (Inland / Export Mix)

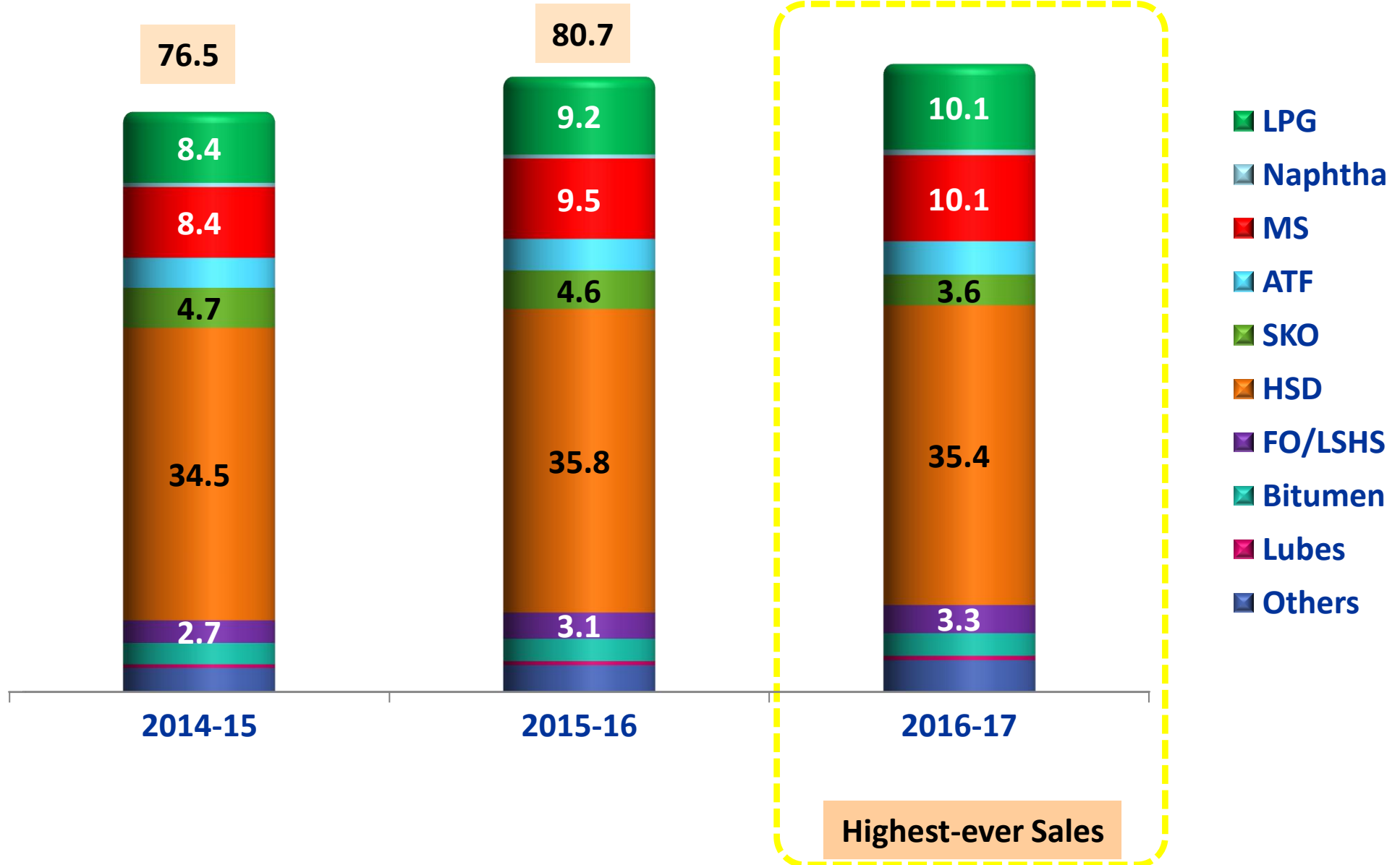
Sales (MMT)



Source: Company Filing

Unparallel Sales

Domestic POL Sales (MMT)



Maintaining Leadership with 45.1% Market Share

Diversified Customer Base & Renowned Brands

Diversified Products & Brands

Branded Products



Branded Services



Kisan Seva Kendra outlets for extending rural reach

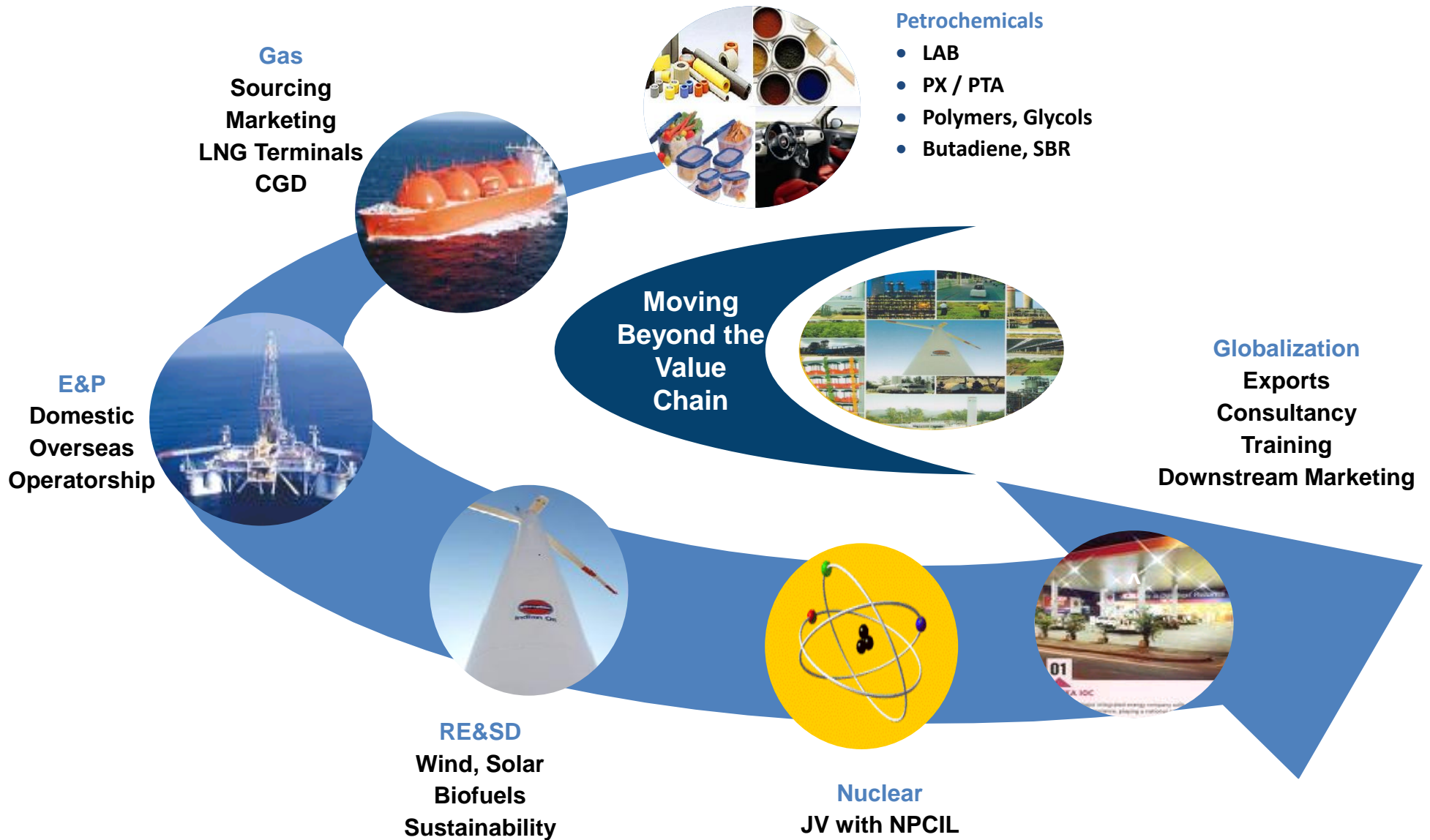
Diversified Customer Base



Retail Outlet at Boat house

- The turnover growth is insulated from the cyclical demand fluctuations due to diversified customer base

Moving Beyond the Traditional Value Chain



One of the Leading Producer of Petrochemical Products

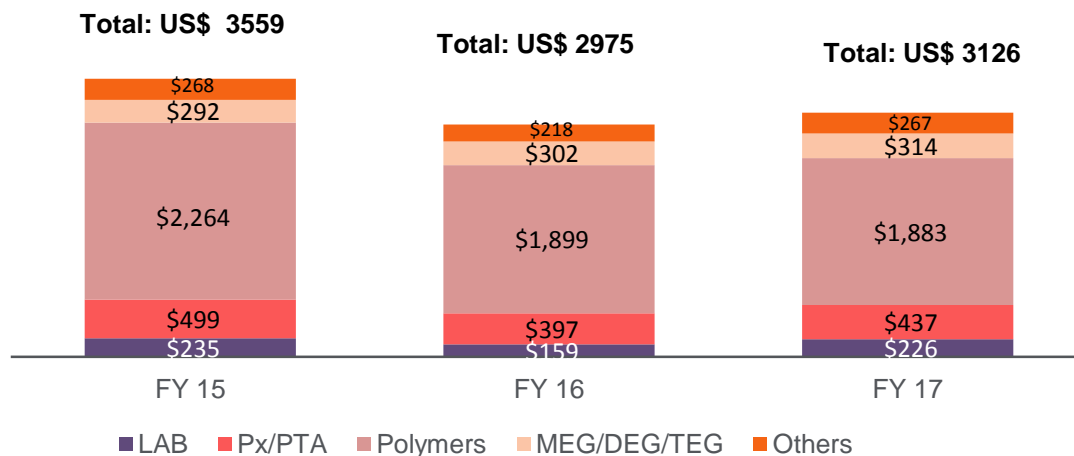


Capacity

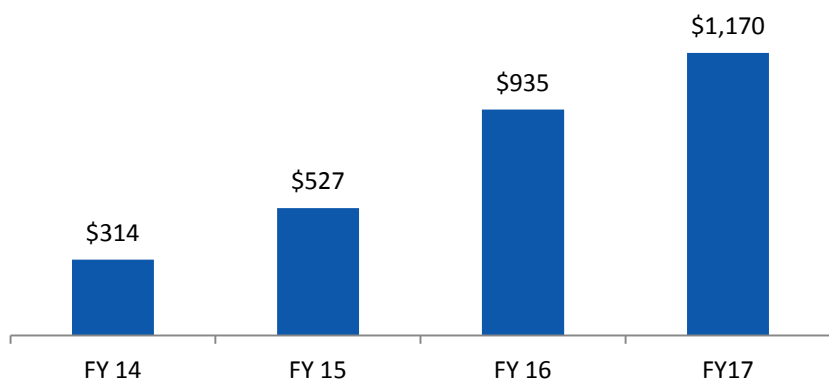
Project	Capacity (MT)	Capex (US\$m)
Guajarat LAB	120,000	175
Styrene Butadiene Rubber Plant	120 KTA	150
Panipat Px / PTA	553,000	508
Panipat Naphtha Cracker	1,460,000	2337

Source: Company Filing

Sales Breakup (in US\$ millions)



EBITDA (in US\$ millions)



US\$-INR: 64.8550 (as on March 31, 2017)

Source: Company Filing

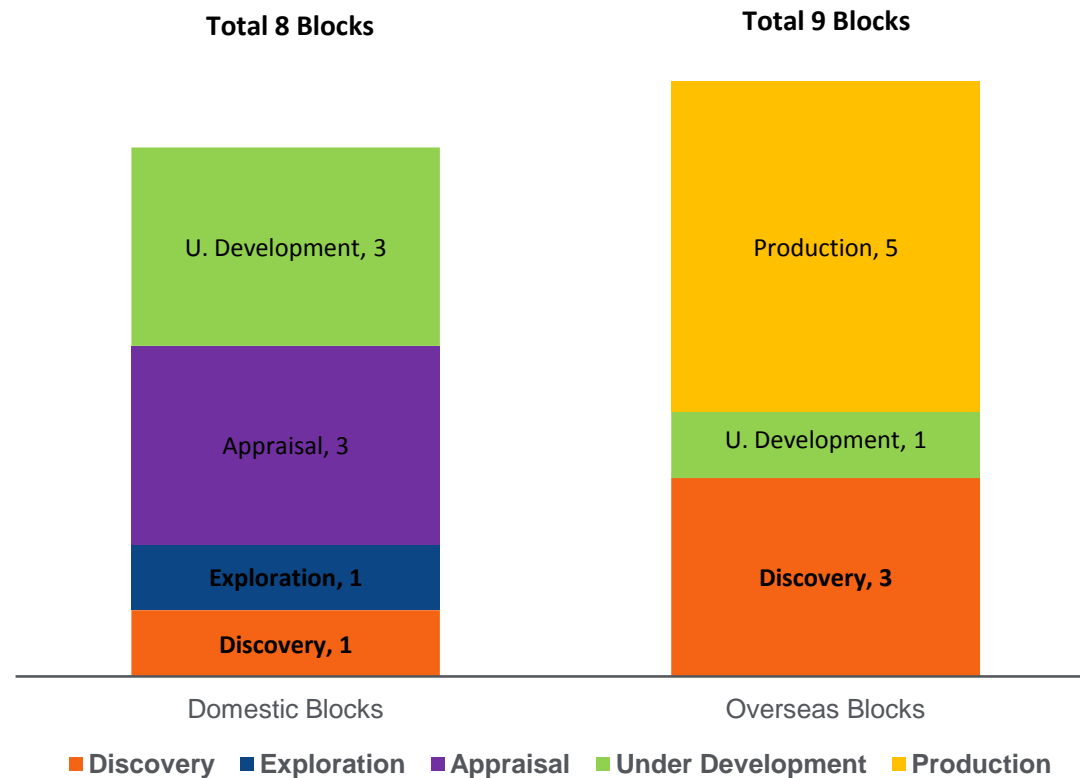


Backward Integration Through E&P

IOC: E&P Capabilities

- Stake in 17 exploration blocks
- 8 Domestic blocks
 - With ONGC / OIL / GAIL / GSPC
 - Including 2 Coal Bed Methane blocks with ONGC (20% participating interest)
- 9 International blocks
 - Libya (1), Yemen (1), Nigeria (1), Gabon (1), Venezuela (1), USA (1), Canada (1) and Russia (2)

Status of Domestic and Overseas Blocks



All figures as on March 31, 2017

Recent Developments on E&P

- Increasing Equity Oil and Gas Production.
- New Asset
 - Taken stakes in Vankor and Taas Yuryakh (Rosneft's Russian Assets). Both are producing Assets.



A view of the drilling site at IOC Khambhat 1

All figures as on March 31, 2017

Russian Asset Acquisition

Vankor: Today's Behemoth

Reserves	331 MMT
Production	21 MMTPA
Consortium Stake	23.9%
IndianOil Stake	8%

Taas: Tomorrow's Star

Reserves	196 MMT
Production	1 MMTPA
Peak Envisaged	5 MMTPA
Consortium Stake	29.9%
IndianOil Stake	10%

Investment Approval for
\$1.23 billion



Vankor

US\$ 598 million invested
(till 31.03.2017)

Taas

US\$ 408 million invested
(till 31.03.2017)

Diversified Across Geographies and Energy Sources

Geographical Diversification

IndianOil Mauritius Ltd. (IOML) (100% Stake)

- Aviation, terminal & retail business
- 24,000 MT Storage Terminal
- Market Share : 24%



Lanka IOC Plc. (75.1% Stake)

- Storage, terminal & retail business
- 200 retail outlets
- Market Share 43.5%



IOC Middle East FZE (100% Stake)

- Marketing of Lubes



Diversification Across Sources

Gas



- JV for City Gas Distribution with presence in 9 Cities
- 5 MMTPA LNG import, storage and re-gassification terminal under construction at Ennore (Near Chennai)
- Ennore –Tuticorin Pipeline (1175 km)

Wind Power



- Wind – 167.60 installed capacity
- 21 MW plant at Gujarat;
- 48.3 MW plant at AP
- 72.3 MW plant at Rajasthan

Solar



- 6000+ Retail Outlets Solarised. Installed capacity 24 MW (Mar'17).
- Other Solar capacity is 20 MW

Strong Focus on Research and Development

Focus on Products & Technology

INDMAX	<ul style="list-style-type: none"> Technology developed to maximize light distillates from refinery residue 	Indane NANOCUT LPG	<ul style="list-style-type: none"> Hi-therm LPG based metal cutting gas Improved efficiency and safety standards
Diesel Hydro treating	<ul style="list-style-type: none"> Commercialized 1.2 MMTPA grass-root DHDT facility in Bongaigaon 	Railroad Oils	<ul style="list-style-type: none"> 1st in India to introduce multi-grade railroad oil to Indian Railways - significant fuel and oil savings
Naphtha Isomerization	<ul style="list-style-type: none"> Retrofitting of Bongaigaon refinery for producing Euro-III/IV motor spirit 	Marine Oils	<ul style="list-style-type: none"> One of six companies to develop "OEM Approved Marine Technology Equipment"
Fuel Efficient Engine Oils	<ul style="list-style-type: none"> Commercialization of R&D developed fuel efficient engine oil for gasoline & diesel car 	Hot Rolling Oils	<ul style="list-style-type: none"> Commercialization of R&D developed energy efficient hot rolling oil in association with RDCIS in steel plants

Collaborations



Game-changing technology for Conversion of CO₂ to value added products

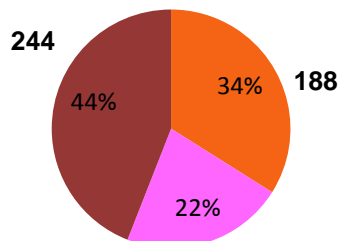


Conversion of Carbon dioxide to chemicals

Active Patents Portfolio

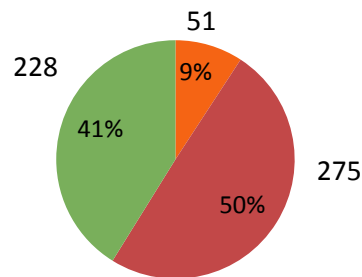
As on March 31, 2017

By Geography



122
India USA Others

By Division



51 275 228
Lubes Refineries Others

Total Patents: 554

Investments in Research & Development

Indalin: Technology for conversion of naphtha to light olefins, LPG & aromatic rich gasoline; feasibility under study

Delayed Coking: Thermal cracking technology for conversion of long/short residue to distillates. Partnership with Engineers India Limited

Octamax: Technology for dimerization of cracked C4 to high octane (RON) component for Euro IV/V gasoline

FCC Catalyst Additives: CO - Combustion promoter, Coke Reduction Additive, Residue Upgradation Additive for bottom Upgradation

DHDS / DHDT Catalysts: Demonstrated at CPCL for ULSD in 2009. Partnership with Sud-Chemie India Limited (SCIL)

Vegetable Oil co-processing in DHDT: Successful technology demonstrated in 2013 including demetallation of vegetable oil

INDMAX: INDane MAXimization



IndianOil R&D's "Make In India"
Initiative

Indigenously developed
technology to bridge India's LPG
Deficit

Over 2 times LPG yield over
regular FCC

Flexibility to cater to Seasonal
Demand: LPG/ MS/ HSD Mode

High Octane MS (97-98 RON)
production

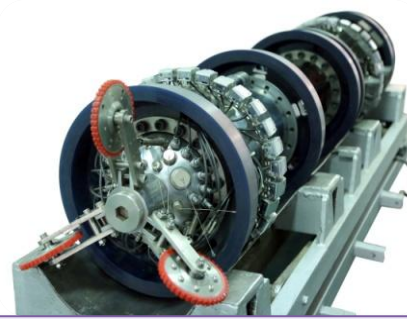
INDMAX unit being installed at Bongaigaon refinery as well

R&D Prowess

- *Technology Commercialisation*



**35 TMTPA INDAdapt^G Plant
at Guwahati Refinery**

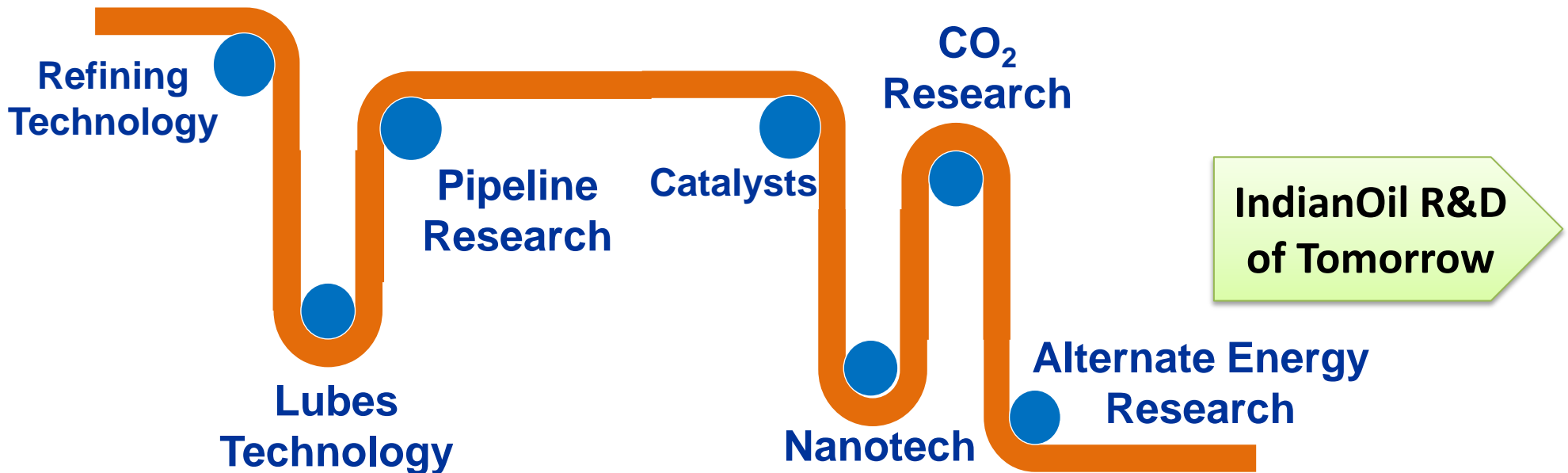


**Indigenous In-Line Pipeline
Inspection Tool**



**Indigenously Developed
Delayed Coker at Barauni**

- *2nd R&D Campus – Upscaling Thrust Areas*



New generation of Lead Acid Battery trials underway

Investing In Future Growth

Major Ongoing Projects

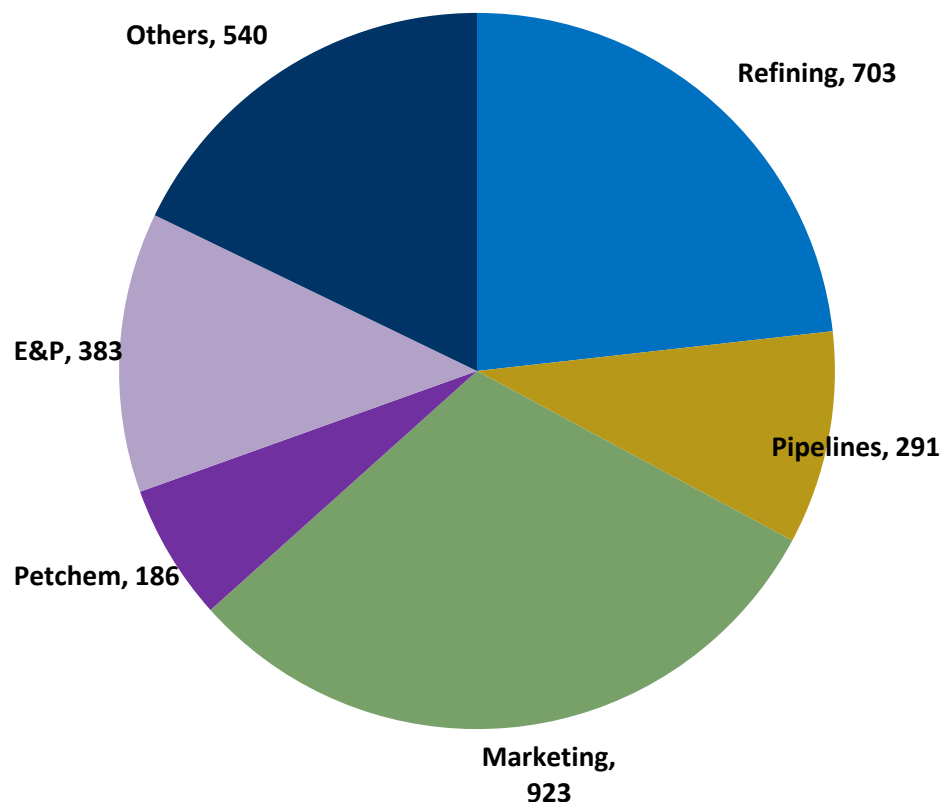
Project	Estimated Cost (US\$ mn)
Polypropylene unit at Paradip	486
Coker at Haldia	474
BS-VI Projects	2376
INDMAX unit at Bongaigaon	398
Paradip-Hyderabad Pipeline (1150 km, 4.5 MMTPA)	341

Major approved Capex Plans

Project	Estimated Cost (US\$ mn)
Ennore – Tuticorin Natural Gas Pipeline	693
Koyali – Ahmednagar – Solapur Pipeline	303
Phase – IV of Retail Automation	206
Haldia Barauni Product Pipeline	160

Planned Capital Expenditure Outlay⁽¹⁾ (2017-18)

(US\$ millions)



Capex planned for 2017-18, approx USD 3.0 bn

Experienced Management Team & GOI Ownership and Support

Management Team



Sanjiv Singh
Chairman
35+ Year Experience

- Handled all aspects of Refining activities. Previously headed the Refinery Division. Also worked with centre for High technology and with Nigeria Petroleum National Company.
- Chemical engineer from IIT Roorkee



A K Sharma
Director (Finance)
32+ Year Experience

- Handled various assignments in finance functions. Was at the forefront of treasury operations to raise funds for IOC. Credited for issuing the first ever foreign currency bonds of IndianOil in the international market.
- Chartered Accountant (CA) by profession. Also possesses law degree.



Verghese Cherian
Director (HR)
32+ Year Experience

- Possesses a rich and comprehensive experience in human resource discipline in various positions at IndianOil. Also headed IIPM, an apex training centre of IndianOil
- Post graduate in Social Work (MSW).



Anish Agarwal
Director (Pipelines)
36+ Year Experience

- Has held various important portfolios in Pipelines, and has worked in various disciplines like operations, maintenance, engineering services, projects, etc.
- Electronics engineer from Punjab Engineering college and Executive MBA from MDI, Gurgaon.



B S Canth
Director (Marketing)
32+ Year Experience

- Has held several key portfolios including sales, operations, human resources etc. Has made significant contribution as a member of Retail Advisory Committee.
- PG in Personal Management & Industrial Relations and a Law graduate.



G K Satish
Director (Planning & Business Development)
30+ Year Experience

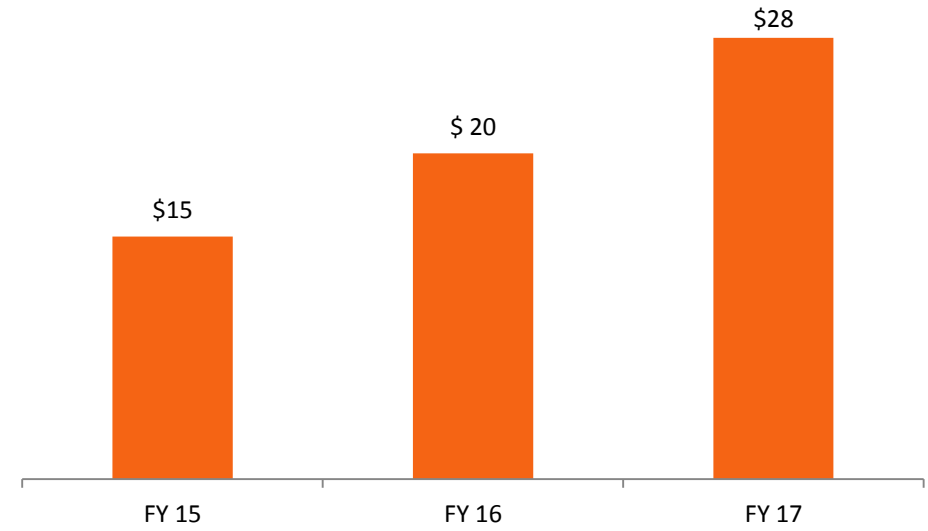
- Has experience in varied areas of business including International Trade, Business Development, Natural Gas, Marketing Operations, Logistics and Human Resources.
- A Graduate in Mechanical Engineering from the NIT Surat, and a Post-Graduate in Management from MDI, Gurgaon .



Dr. SSV Ramakumar
Director (R&D)
30+ Year Experience

- Has three decades of R&D experience in downstream hydrocarbons sector, notably in the areas of refinery process research streams
- A doctorate in Chemistry from IIT-Roorkee

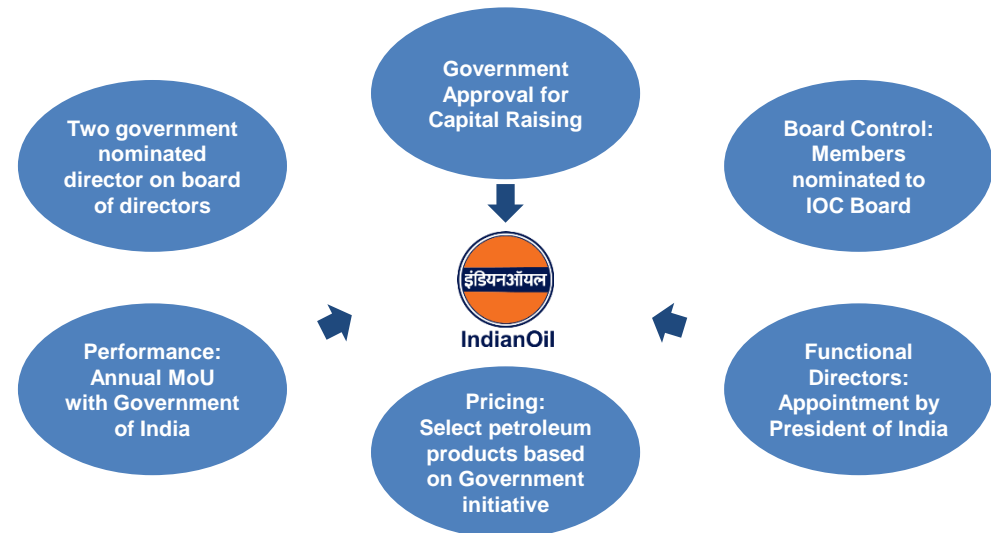
Contribution to Exchequer (in US\$ billions)



US\$-INR: 64.8550 (as on 31 March 2017)

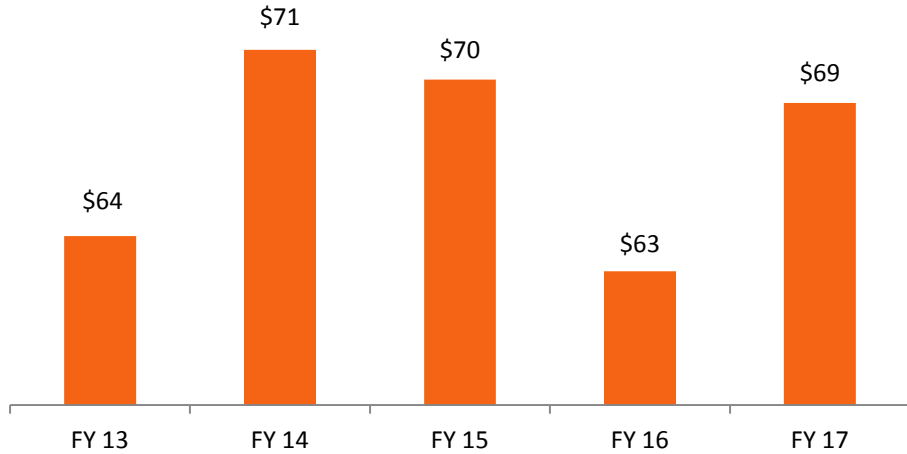
Source: Company Filing

Strong Support From the Government of India

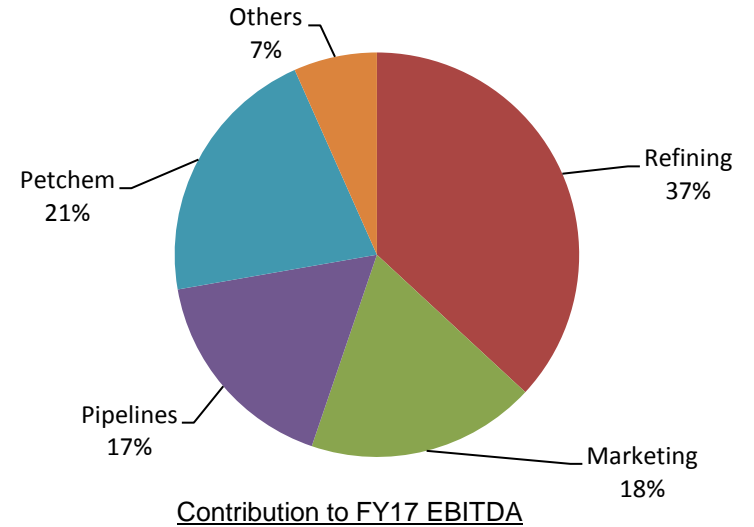


Our Differentiators: Strong Financials

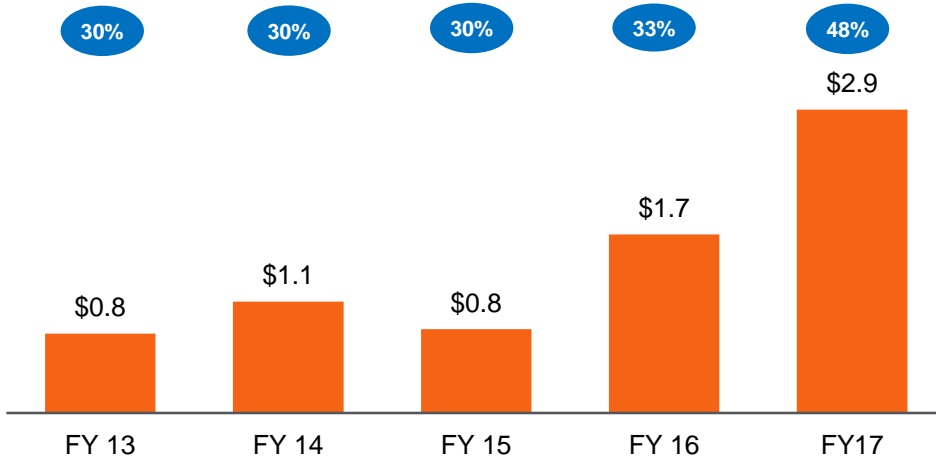
Turnover (in US\$ billions)



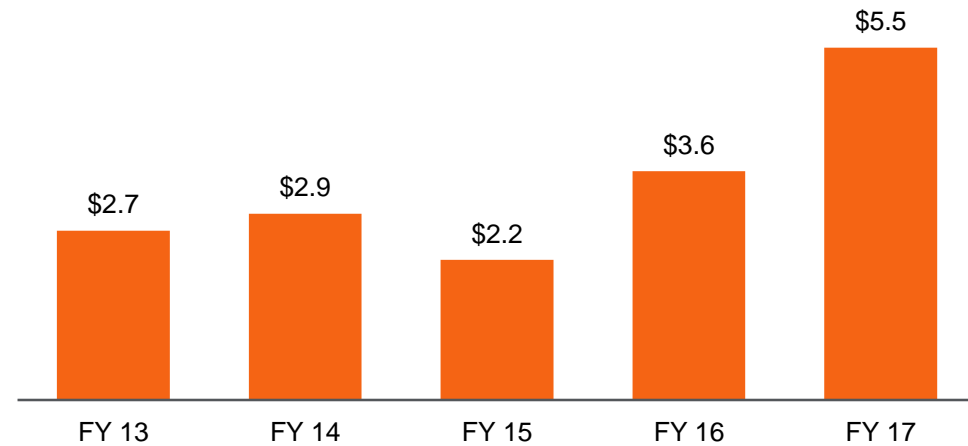
EBITDA (%)




Net Profit (in US\$ billions) and Dividends (%)



EBITDA (in US\$ billions)

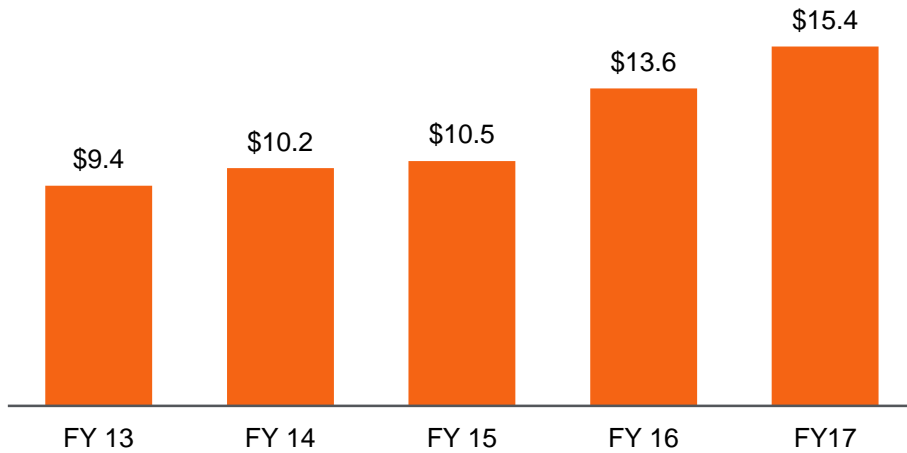


Exchange Rate 1USD= INR 64.8550

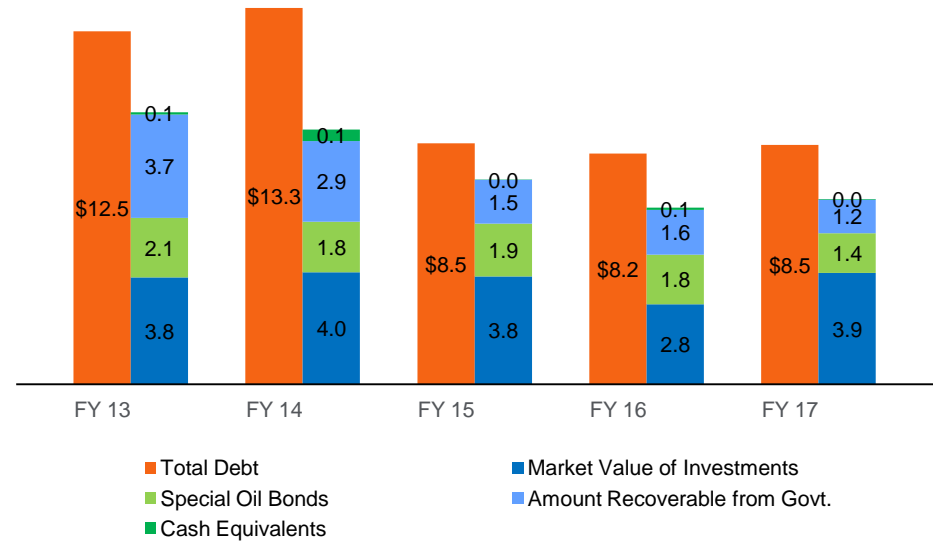
 Dividend Payout Ratio (% of PAT)

Our Differentiators: Strong Financials

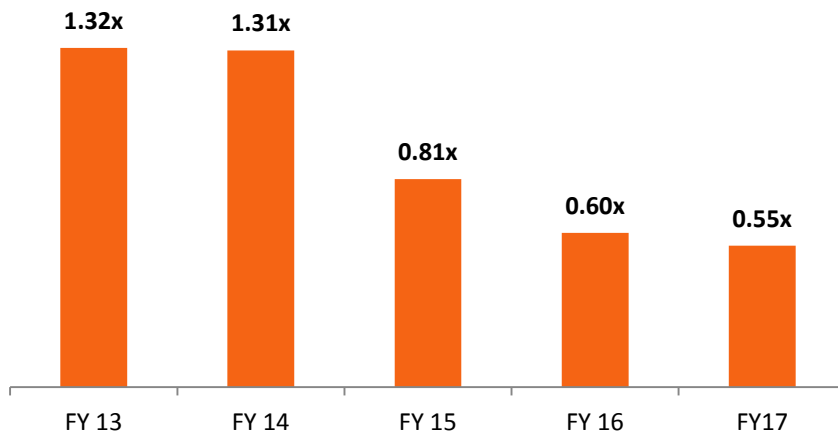
Net Worth (in US\$ billions)



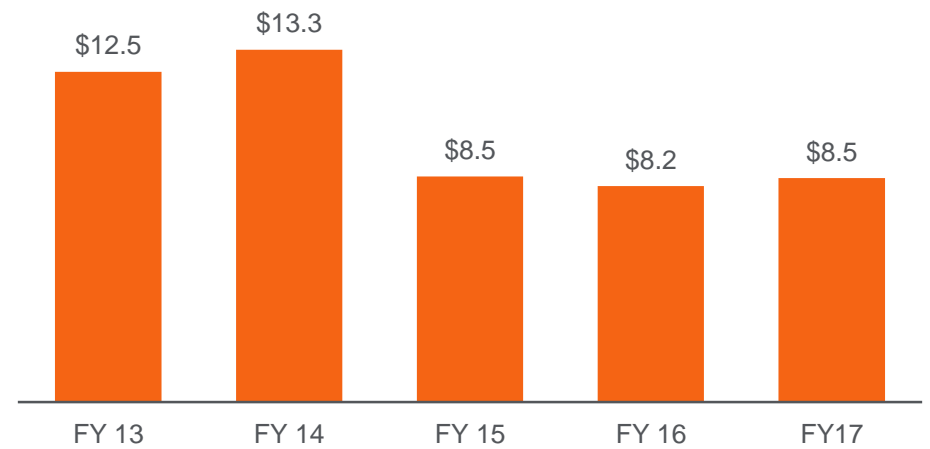
Cash breakdown & Debt (in US\$ billions)



Debt / Equity



Reduction in Debt Level



US\$-INR: 64.8550 (as on march 31, 2017)

- (1) Received from Government of India in lieu of compensation till the year FY 2009.
- (2) Core Debt = Debt less cash receivable from Government

Conclusion

India's Largest Oil Company

...Focused on Creating Shareholder Value

1

- Largest Refiner in the Country

2

- Pan-India Pipeline Infrastructure

3

- Leading Market Share Across the Portfolio

4

- Integrated Operations Across the entire Energy Value Chain

5

- Strong Focus on Innovation Through R&D and Alternate Energy Sources

6

- Driven by a Management Team That has Delivered Results

7

- With Strong Support from the Government of India

Key Risk Factors

- Fluctuations in commodity prices (e.g. crude oil)

- Fluctuation in exchange rates (INR – US\$)

- Fluctuations in global petroleum product prices