

# Saudi Aramco

# Refining Sector In a Changing Environment

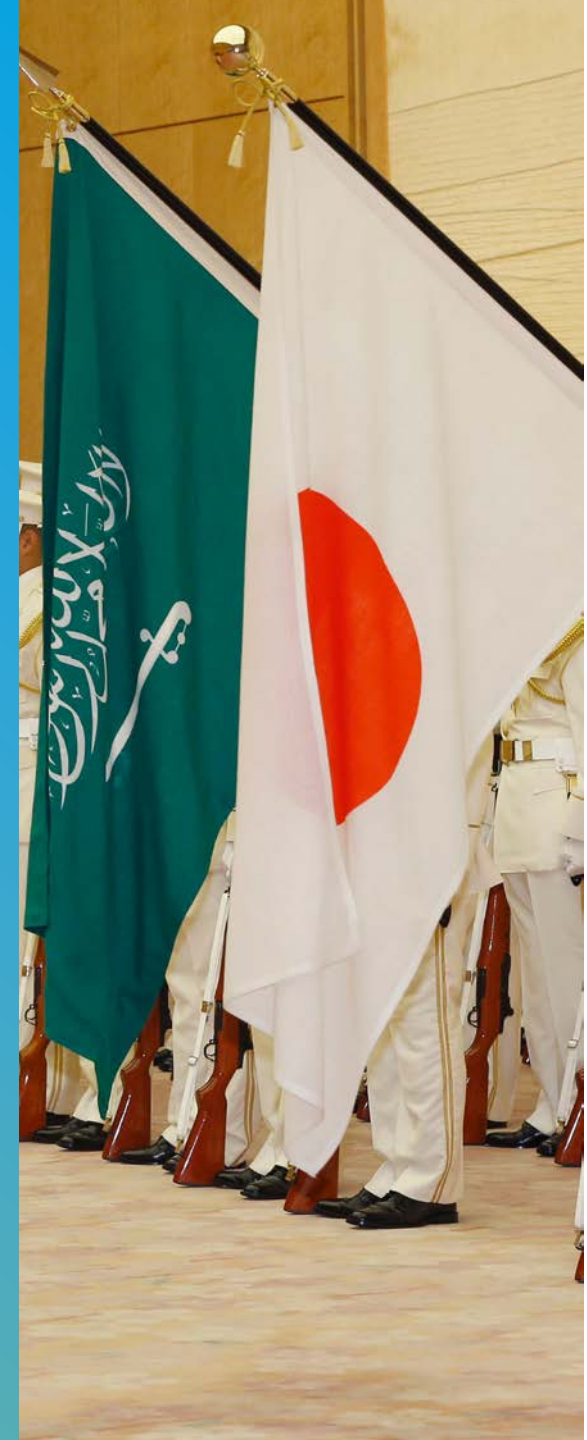
The 36<sup>th</sup> JCCP International Symposium

*Progress of the Petroleum Industry Reforms : Challenges and the Future*

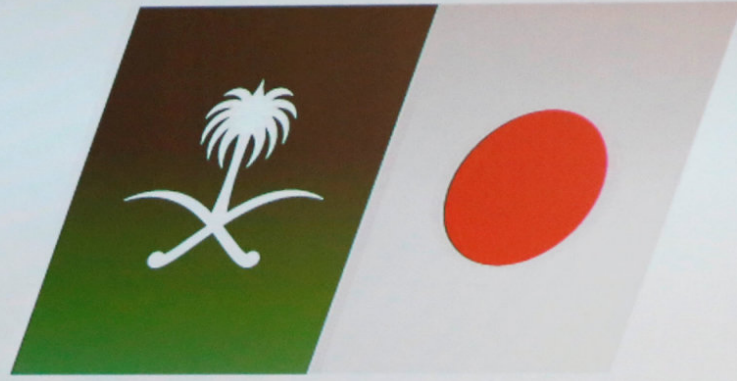
Thursday, January 25, 2018

# Outline

- Saudi Arabia & Japan Successful Partnership
- Saudi Aramco Crude & Refining Portfolio
- Refining Sector in a Changing Environment
- Crude Oil to Chemical







# Saudi Japan VISION 2030

الرؤية السعودية اليابانية 2030

The  
Successful  
Partnership



# The Successful Partnership

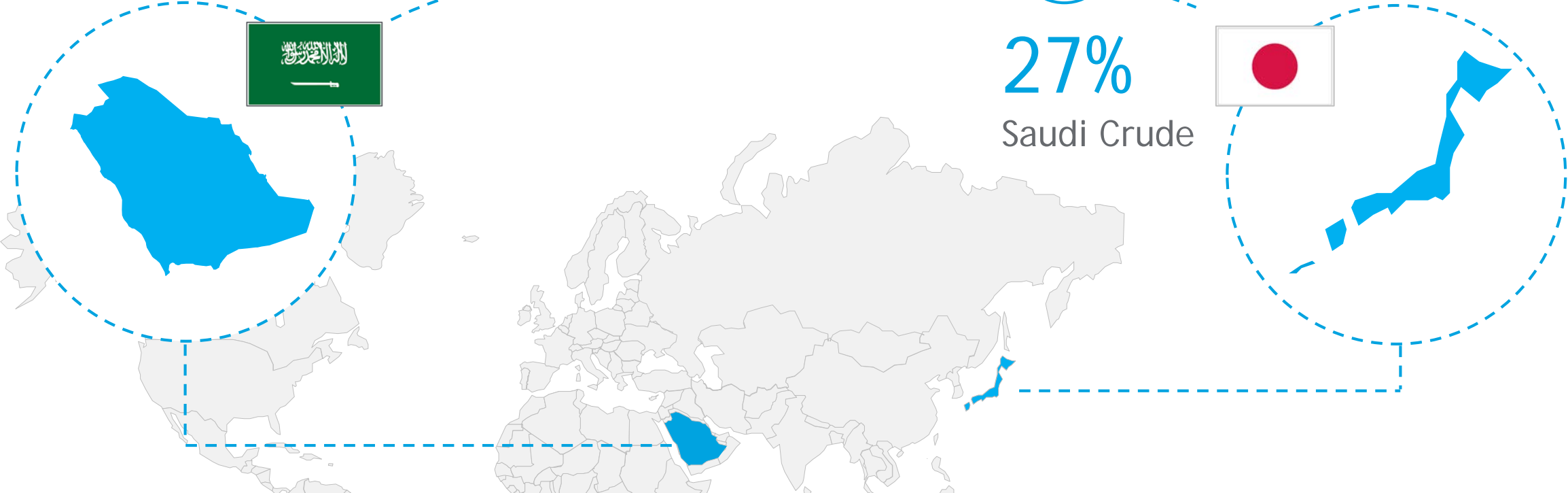
Stronger Partnership under Japan's Energy Reform

Saudi Aramco is the **Largest** Energy Supplier to Japan

**4.2** Million Barrel / Day  
Total Import in **2000**



**27%**  
Saudi Crude



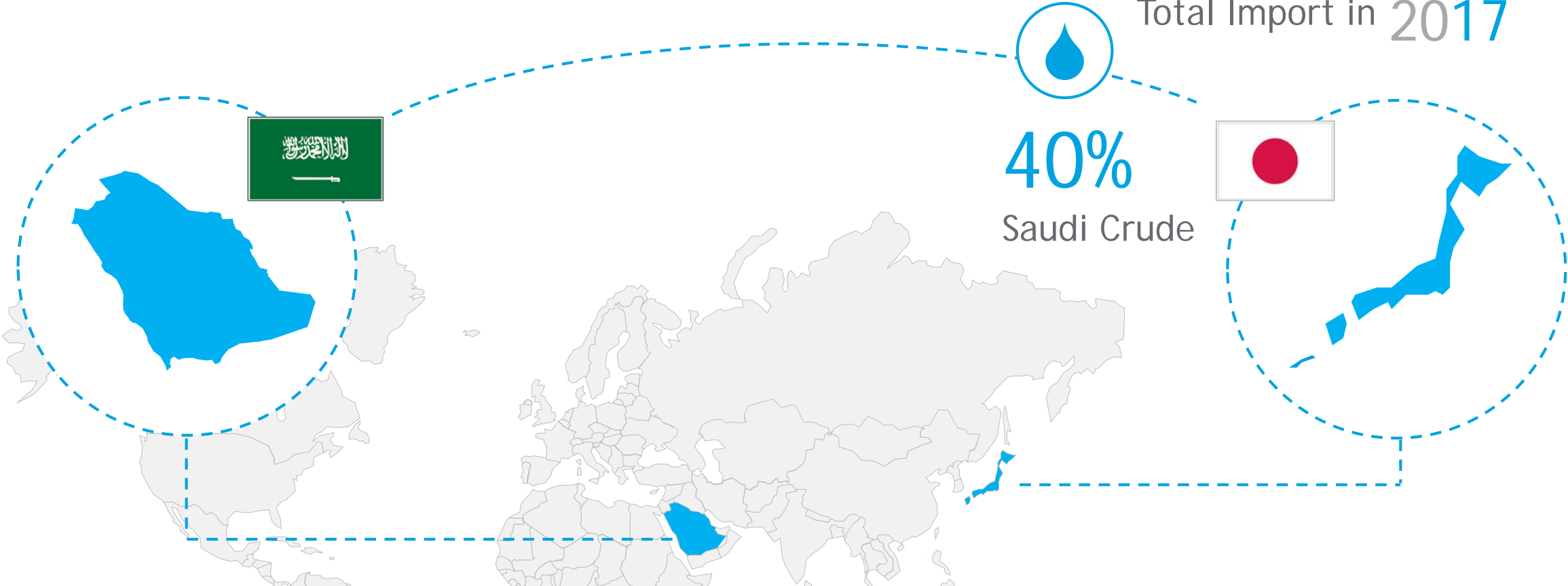
# The Successful Partnership

Stronger Partnership under Japan's Energy Reform

Saudi Aramco is the **Largest** Energy Supplier to Japan

**3.2** Million Barrel / Day

Total Import in 2017



# The Successful Partnership

Stronger Partnership under Japan's Energy Reform

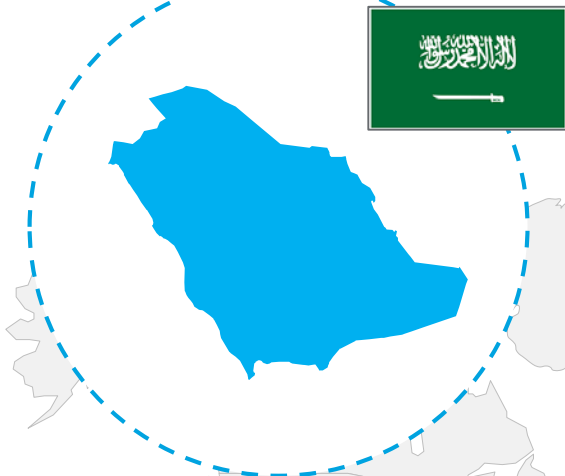
Saudi Aramco is the **Largest**  
and **Stable** Energy Supplier to Japan

**8.2** Million Barrel Capacity

Successful Partnership  
Since **2011**

**37** Million Barrel

Sold since inception



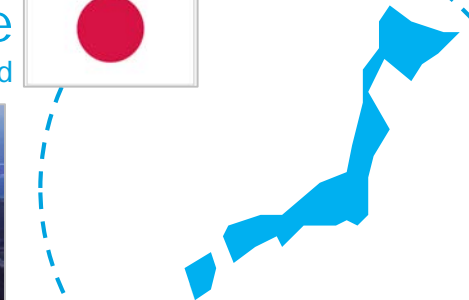
## Extension Ceremony

Tokyo (Japan) - 2016



## Joint Crude Oil Storage

Okinawa Island



# The Successful Partnership

Cooperation Broadens in Various Area



Investments



Programs



MoUs



Saudi-Japan  
(Vision 2030)

- 1965 Strategic Procurement and Logistics Department was established originally under AOC (Aramco Overseas Company)
- 1990 Established its 3<sup>rd</sup> overseas marketing office (and 1<sup>st</sup> in Asia) in Japan titled the "Saudi Petroleum Overseas Limited (SPOL)"
- 1993 The office changed to Saudi Petroleum Limited, Tokyo (SPL Tokyo) in the marketing arm to cover Asia region
- 1996 AOC Tokyo branch office was established to support AOC's procurement, logistics and inspection services in Asia
- 2012 Aramco Asia Japan was established by merging both SPOL & AOC





# The Successful Partnership

Cooperation Broadens in Various Area



Investments



Programs



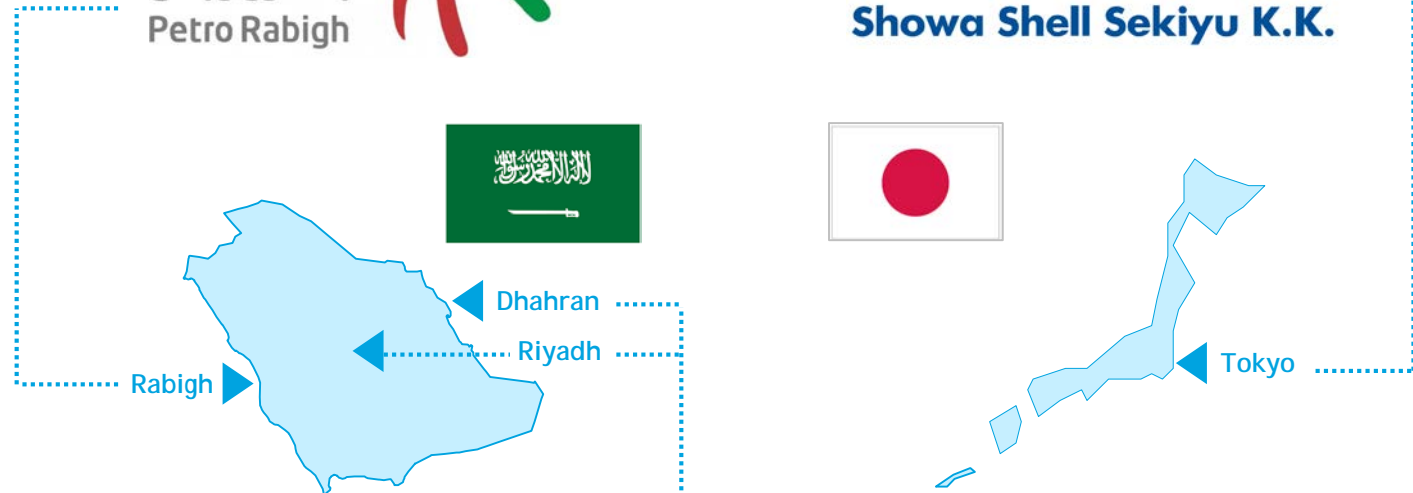
MoUs



Saudi-Japan  
(Vision 2030)



Showa Shell Sekiyu K.K.



More than 100 Japanese companies are successfully operating in Saudi Arabia today.



# The Successful Partnership

Cooperation Broadens in Various Area



Investments



Programs



MoUs



JCCP  
Japan Cooperation Center - Petroleum



Saudi-Japan  
(Vision 2030)

## LPG Emergency Relief Program



With **Iwatani**  
to provide support the areas affected  
by disaster



# The Successful Partnership

Cooperation Broadens in Various Area



Investments



Programs



MoUs



JCCP  
Japan Cooperation Center Petroleum



Saudi-Japan  
(Vision 2030)

3

Japanese Financial Institutions  
Foreign direct investment  
into Saudi Arabia



# The Successful Partnership

Cooperation Broadens in Various Area



Investments



Programs



MoUs



JCCP  
Japan Cooperation Center Petroleum



Saudi-Japan  
(Vision 2030)

# 3

Japanese Financial Institutions

Foreign direct investment  
into Saudi Arabia



**Showa Shell Sekiyu K.K.**

Solar Power Plant

Solar panel manufacturing plant  
in Saudi Arabia.



**Sumitomo Corporation**

Chemicals Industry

corrosion-resistant alloy pipes and  
tubular goods industry in Saudi Arabia

# The Successful Partnership

Cooperation Broadens in Various Area



Investments



Programs



MoUs



Saudi-Japan  
(Vision 2030)





# The Successful Partnership

Cooperation Broadens in Various Area



Investments



Programs



MoUs



JCCP  
Japan Cooperation Center - Petroleum



Saudi-Japan  
(Vision 2030)

2016

September 1<sup>st</sup>



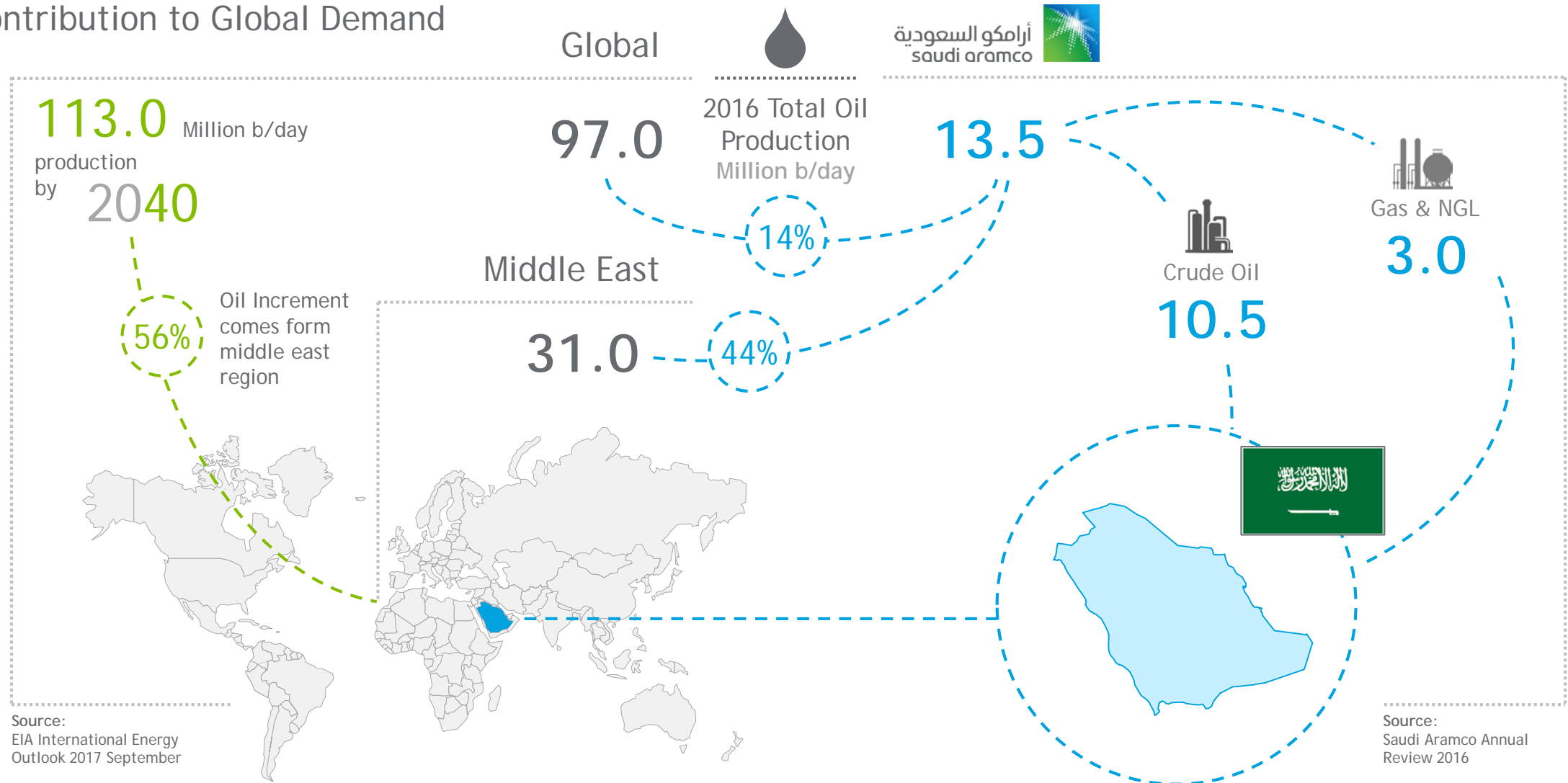
HRH Deputy Crown Prince Mohammed bin Salman and Prime Minister Shinzo Abe decided to set up the Joint Group for “Saudi-Japan Vision 2030 (SJV 2030)”

# Saudi Aramco Crude & Refining Portfolio



# Saudi Aramco

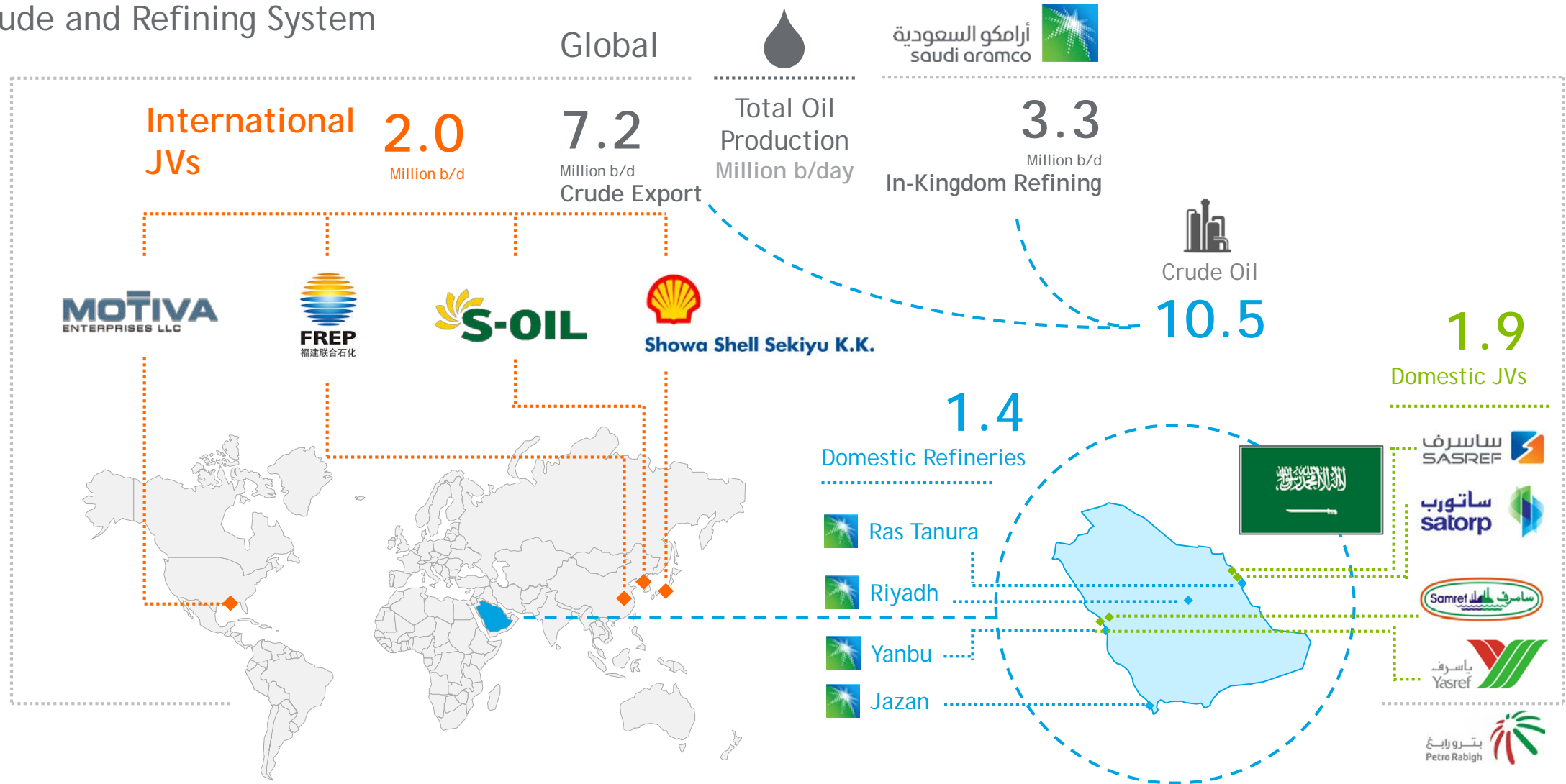
## Contribution to Global Demand





# Saudi Aramco

## Crude and Refining System







# Changing Environment

# Changing Environment

in Saudi Aramco Refining Sector



Saudi Aramco  
IPO

●  
2018



IMO MARPOL  
Annex VI

●  
2020



Clean Fuel  
Standards

●  
2022

# Changing Environment

Clean Fuel Projects in Domestic Refineries

Saudi  
Aramco

Riyadh Refinery



Ras Tanura Refinery



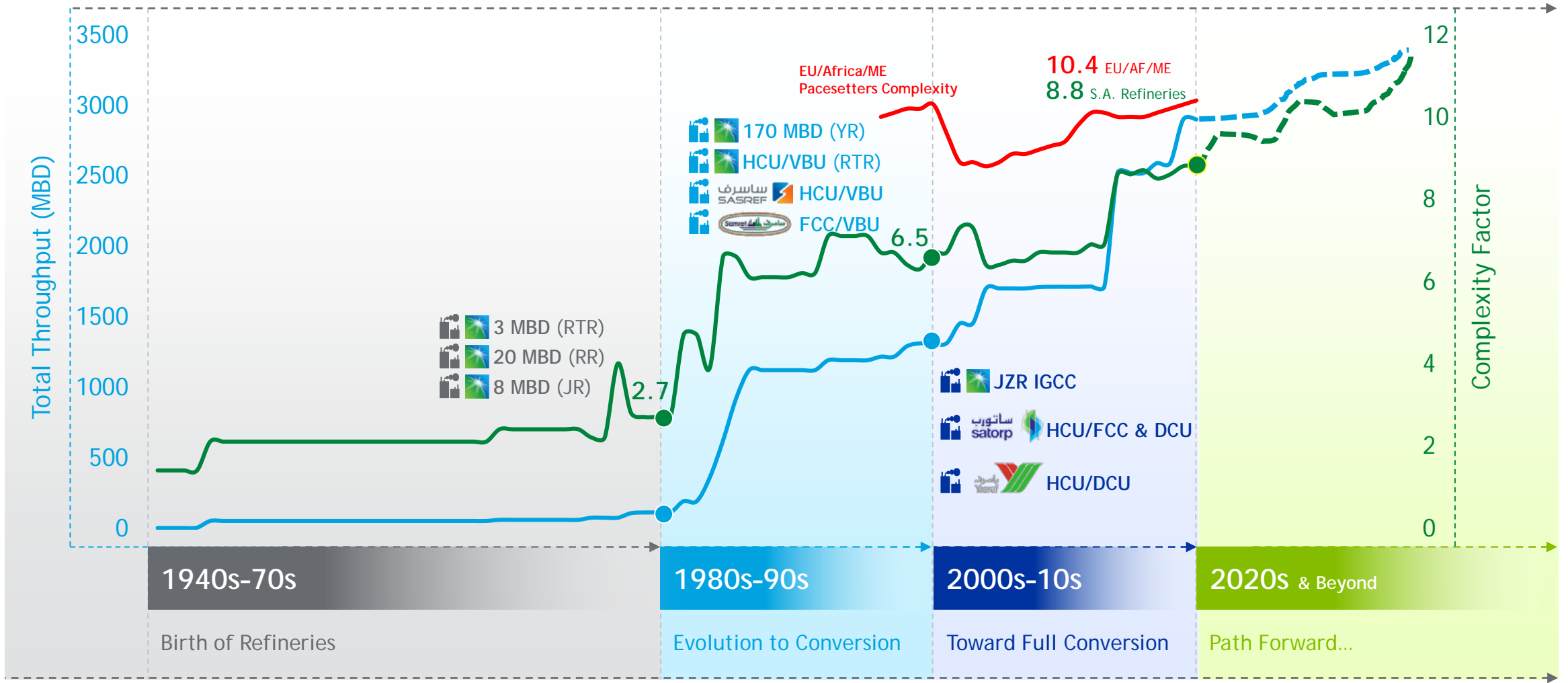
Yanbu Refinery



# Clean Fuel Projects

# Changing Environment

## Bottom of the Barrels Upgrade





# Integration with Petrochemical



# Changing Environment

Integration with Petrochemical



أرامكو السعودية  
saudi aramco



New  
Strategic Intent

“by **2020** we intend to be the world’s leading integrated energy and **chemicals** company”



# Integration with Petrochemical

Refining with a growth of chemical sector

■ Chemical Products  
(Million Ton per annum)

■ Crude to Chemical Conversion  
(Percent %)



RAPID Refinery  
JV in Malaysia



Jazan Complex  
IK Wholly-Owned Facility



Equity JV  
in South Korea

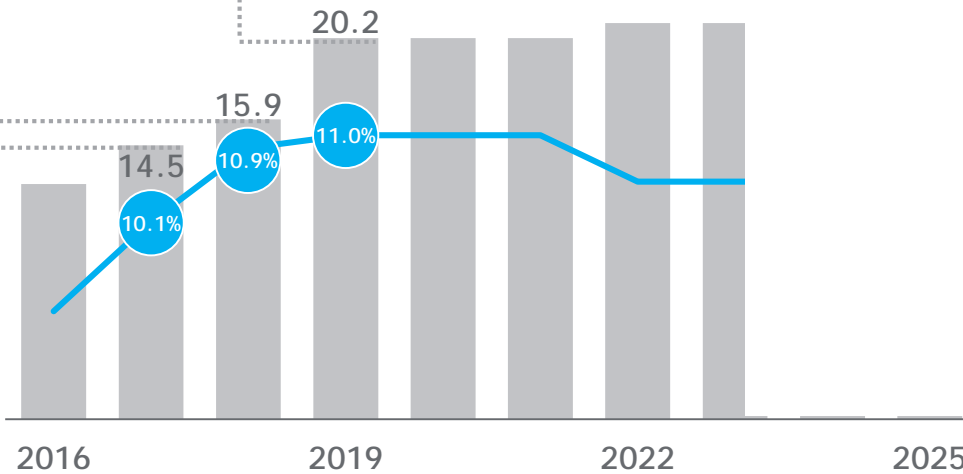


In-Kingdom JV

2019

2018

2017

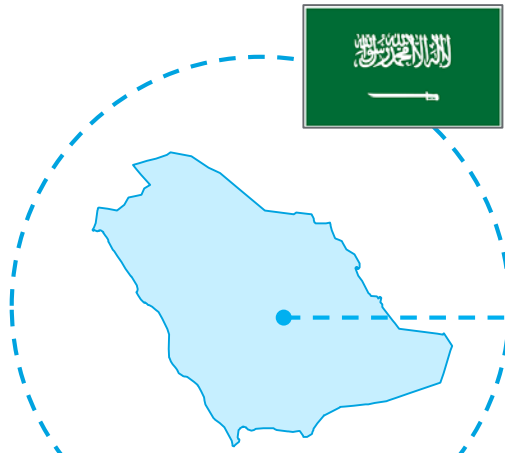


# Integration with Petrochemical

Refining with a growth of chemical sector

■ Chemical Products  
(Million Ton per annum)

■ Crude to Chemical Conversion  
(Percent %)



Feasibility Study Kick Off  
2016

Feed Completion  
2019

Detail Engineering Start  
2020

2025  
New Joint Investment



## Crude Oil to Chemical (COTC) Complex

■ Largest Integrated Petrochemical Complex

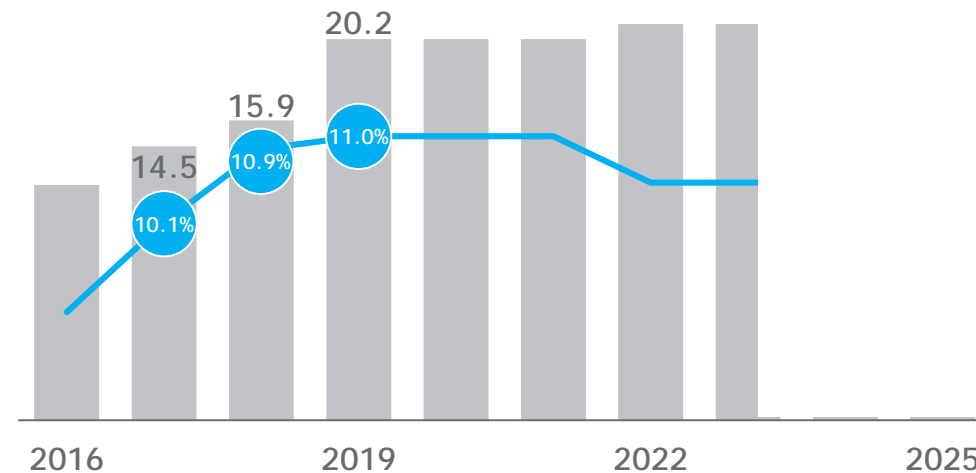
■ 400 MBD Crude Processed

■ 9 Million Ton Annual Chemical Products

■ 45% Conversion from Crude Oil to Chemicals

توقيع مذكرة تفاهم مشروع تحويل النفط الخام إلى كيميائيات بين أرامكو السعودية وسابك

MoU Signing Ceremony The Crude Oil to Chemicals Projects in Jazan, SABIC 26 نوفمبر 2016





# Integration with Petrochemical

Refining with a growth of chemical sector

2025

New Joint Investment

أرامكو السعودية  
saudi aramco



سابك  
sabic

## Crude Oil to Chemical (COTC) Complex







# Jazan Complex



أرامكو السعودية  
saudi aramco

