KUWAIT NATIONAL PETROLEUM COMPANY \$ 40 BILLION MEGA INVESTMENT PLAN











PRESENTATION OUTLINE

KNPC PROFILE

\$ 40 BILLION INVESTMENT PLAN

KEY PROJECTS HIGHLIGHTS

CHALLENGES



KNPC PROFILE



KNPC TOP MANAGEMENT



Fahed S. Al-Ajmi
Chairman & Managing Director



Bakheet Al-Rashidi
Dy. Chairman and
DMD - Planning &
Local Marketing



Fahed Fahhad Al-Ajmi DMD - Finance & Admin.



Hatem Al- Awadhi
DMD - Projects



Mohammad Al-Mutairi
DMD – MAA



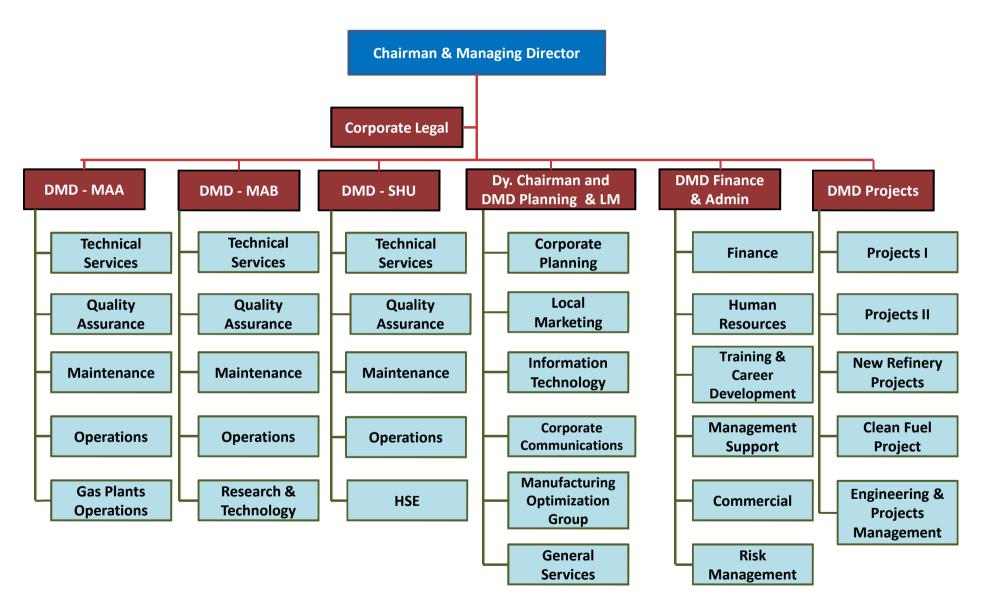
Ahmad Al-Jemaz DMD - MAB



Mutlaq Al-Azmi DMD - SHU



KNPC ORGANIZATION STRUCTURE



KNPC CORE BUSINESS

Refining & Local Marketing arm of KPC

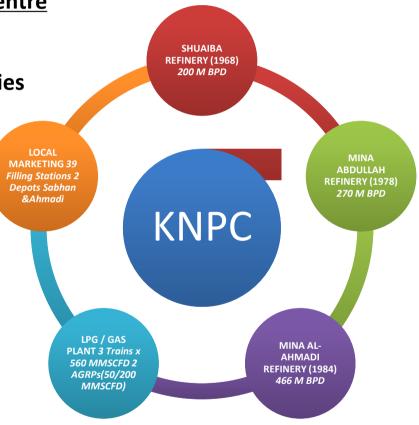
Established in 1960, focused on Marketing initially

Operates three complex Refineries, as a Profit centre

Refining capacity: 936,000 BPD

Manages and Operates five Marine Export facilities

V Over 5,800 employees















Our Mission

Maximize the value of Kuwaiti hydrocarbons through domestic and international refining, petrochemical and marketing.

Our Vision

To be a leading player in the global oil & gas downstream sector, recognized for the strength of our performance and admired for our significant contributions to the State of Kuwait,

To accomplish our Vision: Values - we commit to ... Excellence: High performance, Operational Excellence, continu-We integrate across the downstream to ous improvement, high quality products and services, customer maximize the value of Kuwait's hydrocar-**KPC** focus bons while meeting Kuwait's fuel Motivation: Collaborative work place, teamwork; loyal environ-Downstream... demand ment driven by appropriate performance culture Superior Business PERFORMANCE We pursue HSSE and operational . HSSE: Environmental protection, safety, security, and healthy excellence in everything we do We strive for growth and profitability in Society: Corporate social responsibility in Kuwait and in host ... Delivers communities lexibilit all our businesses through ... Alignment: Care for KPC's interest and issues and ensure. We provide our customers with high The right alignment to achieve KPC's goals "KPC First" quality products and superior service, PRACTICE always Flexibility: Willingness to change, Innovation, Responsiveness constantly Partnershii We work as a team and continuously develop our people Integrity: Openness, trust, respect, fairness, transparency, We are a reliable and trusted employer ... Superior honesty, reliability, high ethical standards, professionalism, accountand business partner in Kuwait and ability People and internationally Partnership: Long-term, value-adding relationships that support **Partnerships Build Best** We care for the environment, our customers growth and enhance operational excellence **PEOPLE** and the communities in which we operate



\$ 40 BILLION INVESTMENT PLAN

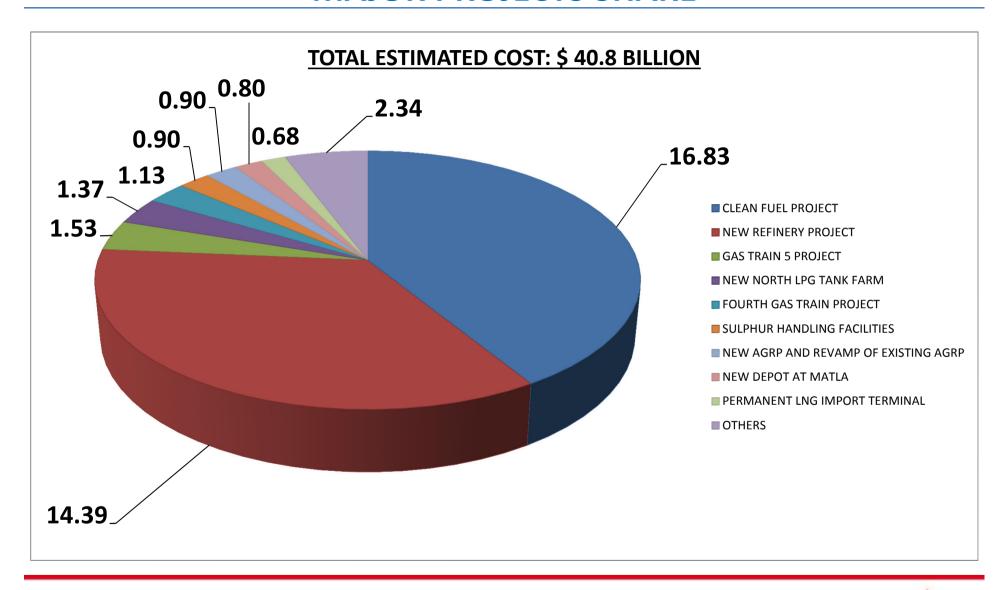


ONGOING AND UPCOMING PROJECTS

PROJECTS	ESTIMATED COST (MM USD)
CLEAN FUEL PROJECT	16,834.53
NEW REFINERY PROJECT	14,388.49
GAS TRAIN 5 PROJECT	1,532.37
NEW NORTH LPG TANK FARM	1,366.91
FOURTH GAS TRAIN PROJECT	1,134.89
SULPHUR HANDLING FACILITIES	899.28
NEW AGRP AND REVAMP OF EXISTING AGRP	899.28
NEW DEPOT AT MATLA	798.56
PERMANENT LNG IMPORT TERMINAL	683.45
SUBTOTAL	38,537.76
OTHERS	2,335.45
TOTAL	40,873.22

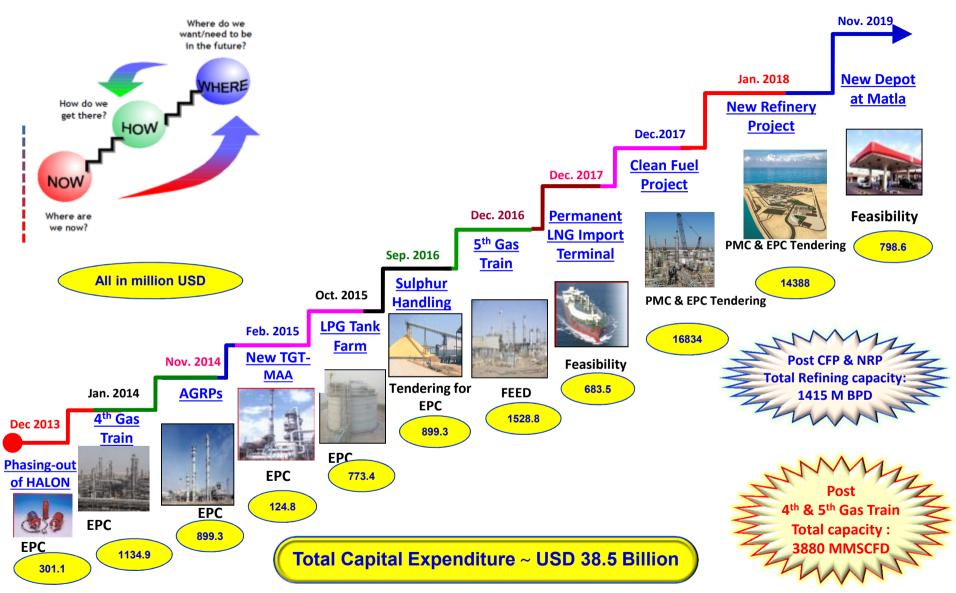


MAJOR PROJECTS SHARE





MAJOR PROJECTS COMPLETION TIMELINE



PROJECTS LIST

PROJECT NO.	PROJECT TITLE	STAGE	COMPLETION DATE	ESTIMATED COST (MM USD)	PROJECT PROGRESS (%)
1	CLEAN FUEL PROJECT	I	Dec-17	16,834.53	4.59
2	NEW REFINERY PROJECT	I	Jan-18	14,388.49	8.45
3	GT 5 PROJECT	D	Dec-16	1,532.37	7.2
4	NEW NORTH LPG TANK FARM	I	Mar-15	1,366.91	29.6
5	FOURTH GAS TRAIN PROJECT AT MAA	I	Jan-14	1,134.89	69.00
6	SULPHUR HANDLING FACILITES (REVAMP & NEW) PROJECT AT MAA REFINERY	I	Oct-16	899.28	15.4
7	NEW AGRP AND REVAMP OF EXISTING AGRP	I	Mar-15	899.28	59.00
8	NEW DEPOT AT MATLA	S	Nov-19	798.56	0.0
9	PERMANENT LNG IMPORT TERMINAL	S	Dec-17	683.45	0.0
10	ENHANCEMENT OF METERING/CUSTODY TRANSFER FACILITIES AT KNPC REFINERIES, EXISTING GAS TRAINS AND LM DEPOTS	S	Oct-12	647.48	2.9
11	UPGRADTION OF OBSOLETE FIRE DETECTION, ALARM AND SUPPERSSION SYSTEMS AT KNPC SITES INCLUDING THE PHASE —OUT OF HALON SYSTEM	I	Dec-13	301.08	52.2
12	ADDITIONAL TANKS & LOADING ARMS AT AHMADI DEPOTS	D	Sep-17	215.83	7.2
13	REVAMP OF EFFLUENT TREATMENT FACILITIES AT 3 REFINERIES	I	Mar-13	213.17	97.8
14	MODERNIZATION OF OBSOLETE INSTRUMENTATION AT OLD REFINERY	I	Mar-13	163.96	99.8



S: STUDY (FEASIBILITY)



PROJECTS LIST (Contd.)

PROJECT NO.	PROJECT TITLE	STAGE	COMPLETION DATE	ESTIMATED COST (MM USD)	PROJECT PROGRESS (%)
16	IMPLEMENTATION OF KBR RECOMMENDATION IN GAS PLANT UNIT - MAA	ı	Oct-16	88.24	13.8
17	CONDUCTING FEED FOR FLARE GAS RECOVERY FACILITIES IN U-49 MAB REFINERY	D	Oct-12	77.81	7.3
18	REPLACEMENT OF OLD & OBSOLETE SUBSTATIONS IN MAA REFINERY (PH-1)-FEED	D	Mar-13	61.15	5.7
19	REPLACEMENT/ INSTALLATION OF IRT PIPELINES	I	Sep-13	52.52	98.1
20	NEW INCINERATOR STACKS (2 NOS.) OF 110M HEIGHT IN TGTU (U-24) - MAB	ı	Sep-13	42.55	87.9
21	NEW FLARE GAS RECOVERY UNIT AT MAA	I	Mar-13	39.82	92.1
22	HIGH INTEGRITY PRESSURE PROTECTION (HIPPS)	I	Oct-16	38.60	13.8
23	FACILITIES FOR MOISTURE CONTROL AND DEHAZING OF GAS OIL AT MAA REFINERY	D	Jun-16	38.49	7.5
24	DISCHARGE OF TREATED EFFLUENT AT 500M DISTANCE AWAY FROM SEA COAST - MAA & MAB REFINERIES	S	Jul-14	34.71	5
25	CONSTRUCTION OF NEW OFFICE BUILDING FOR MAA REFINERY	I	Dec-12	26.93	97
26	PARALLEL H.P. STEAM HEADER TO GAS PLANT AT MAA	I	Mar-13	20.41	94
27	REVAMP OF MAA BURNERY FOR RECOVERY & SMOKELESS OPERATION	I	Jul-15	17.99	16.8
28	IMPROVEMENT OF SANITARY SEWERAGE SYSTEMS & ASSOCIATED WORKS IN MAA REFINERY	S	Sep-17	17.09	1.7
29	REPLACEMENT OF UNIFLUX HEATERS IN LPG TRAINS #1,2 &3	D	Apr-18	15.47	3.4
30	ADDITIONAL PUMP FOR FUEL OIL SUPPLY TO AL-ZOUR POWER STATION	I	Jun-13	14.93	83.4

I: IMPLEMENT (EPC)
D: DESIGN (FEED)

S: STUDY (FEASIBILITY)



PROJECTS LIST (Contd.)

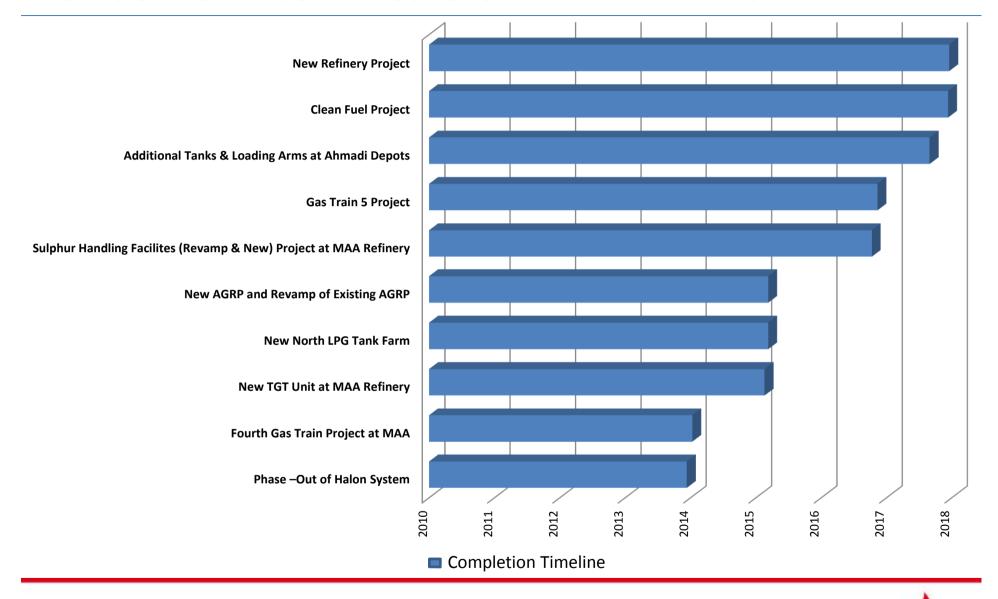
PROJECT NO.	PROJECT TITLE	STAGE	COMPLETION DATE	ESTIMATED COST (MM USD)	PROJECT PROGRESS (%)
31	NEW OPERATOR SHELTERS (14NOS.) AT MAA REFINERY	S	Sep-16	12.59	5.5
32	NEW KITCHEN BUILDING AT MAB REFINERY	S	Oct-16	12.23	0.3
33	REPLACEMENT OF AIR PREHEATERS IN HP UNITS	I	Jun-15	12.05	71.9
34	REPLACEMENT OF FRESH WATER NETWORK IN MAA REFINERY	I	Mar-14	9.65	84.2
35	REPL. OF OLD & INADEQUATE FLOODLIGHT TOWERS AT TANKAGE & OFFSITE AREAS OF OLD REF.	ı	Aug-13	7.91	84
36	PROVISION OF ELECTROSTATIC PRECIPITATOR (ESP) IN FCCU	I	Mar-13	6.58	99
37	KNPC NATURAL RESERVE PROJECT AT WAFRA –PHASE 2	S	Jul-16	6.12	3.4
38	NEW FACILITIES FOR H2S REMOVAL FORM SWS FLASH DRUM OFF-GAS IN SOUR WATER STRIPPER UNIT U-26 (MAB)	ı	Feb-13	5.40	83.4
39	UPGRAD. & RE-ROUTING OF 8" LPG, 24" BLACK OIL & 14" MOGAS IRT	I	Oct-12	3.81	99.5
40	DEBOTTLENECKING OF DISTILLATE CIRCUIT IN ARD UNITS # 41& 81	I	Aug-13	3.58	89.2
41	KNPC NATURAL RESERVE PROJECT AT WAFRA -PHASE-01	I	Oct-12	2.36	97



S: STUDY (FEASIBILITY)



ONGOING MAJOR PROJECTS IMPLEMENTATION TIMELINE





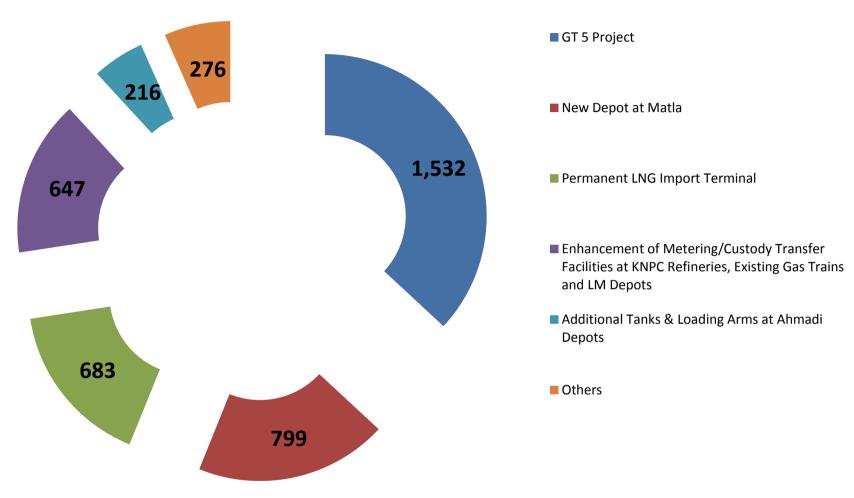
LIST OF UPCOMING PROJECTS

PROJECT TITLE	STAGE	FORECAST COMPLETION DATE	TOTAL BUDGET (MM USD)
GT 5 PROJECT	D	02-Oct-12	1,532.37
NEW DEPOT AT MATLA	S	30-Nov-19	798.56
PERMANENT LNG IMPORT TERMINAL	S	30-Dec-17	683.45
ENHANCEMENT OF METERING/CUSTODY TRANSFER FACILITIES AT KNPC REFINERIES, EXISTING GAS TRAINS AND LM DEPOTS	S	28-Feb-18	647.48
ADDITIONAL TANKS & LOADING ARMS AT AHMADI DEPOTS	D	19-Sep-17	215.83
CONDUCTING FEED FOR FLARE GAS RECOVERY FACILITIES IN U-49 MAB REFINERY	D	31-Oct-12	77.81
REPLACEMENT OF OLD & OBSOLETE SUBSTATIONS IN MAA REFINERY (PH-1)-FEED	D	20-Mar-13	61.15
FACILITIES FOR MOISTURE CONTROL AND DEHAZING OF GAS OIL AT MAA REFINERY	D	30-Jun-16	38.49
DISCHARGE OF TREATED EFFLUENT AT 500M DISTANCE AWAY FROM SEA COAST - MAA & MAB REFINERIES	S	31-Jul-14	34.71
IMPROVEMENT OF SANITARY SEWERAGE SYSTEMS & ASSOCIATED WORKS IN MAA REFINERY	S	29-Sep-17	17.09
REPLACEMENT OF UNIFLUX HEATERS IN LPG TRAINS #1,2 &3	D	27-Apr-18	15.47
NEW OPERATOR SHELTERS (14NOS.) AT MAA REFINERY	S	30-Sep-16	12.59
NEW KITCHEN BUILDING AT MAB REFINERY	S	30-Oct-16	12.23
KNPC NATURAL RESERVE PROJECT AT WAFRA –PHASE 2	S	30-Jul-16	6.12
		TOTAL	4,513.35

D: DESIGN S: STUDY



UPCOMING PROJECTS SHARE



TOTAL ESTIMATED COST OF FUTURE PROJECTS: USD 4,153 MM



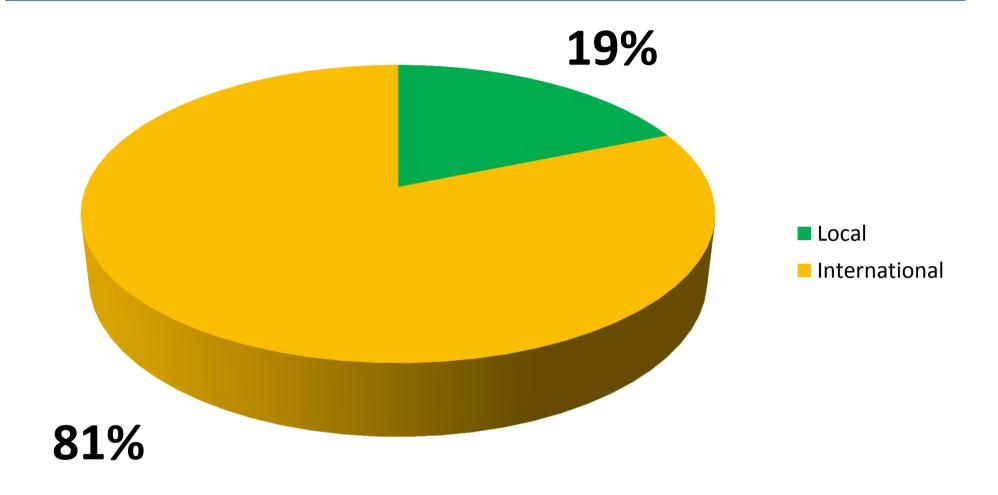
ONGOING CONTRACTS FOR PROJECTS & STUDIES

Si. No.	Project / Study Title	Contractor Type	Contractor	Contract Value (MM USD)
1	Fourth Gas Train Project at MAA	I	Daelim	921
2	New North LPG Tank Farm		GS E&C - Korea	553
3	New AGRP and Revamp of Existing AGRP		Tecnimount S.P.A Italy	419
4	Phase –Out of Halon System		M/s Hanwha, Korea	224
5	Revamp of Effluent Treatment Facilities at 3 Refineries	L	Ahmadiah Cont. & Trad. Co.	181
6	Modernization of Obsolete Instrumentation at Old Refinery	L	ATSCO	146
7	New Incinerator Stacks (2 nos.) of 110M Height in TGTU (U-24) - MAB	L	Gulf Spic	34
8	New Flare Gas Recovery Unit at MAA	L	M/s Gulf Spic	31
9	Replacement/ Installation of IRT Pipelines	L	ISCO	29
10	Construction of New Office Building for MAA Refinery	L	Kuwait Dynamics Limited	23
11	Additional Pump For Fuel Oil Supply To Al-Zour Power Station	L	ISCO	11
12	Parallel H.P. Steam Header to Gas Plant at MAA	L	ISCO	10
13	Consultancy Services - FEED for GT 5 Project	I	AMEC	7
14	Replacement of Fresh Water Network in MAA Refinery	L	ISCO	6
15	Provision of Electrostatic Precipitator (ESP) in FCCU	L	M/s Al-Ghanim	5
16	Repl. Of Old & Inadequate Floodlight Towers at Tankage & Offsite Areas of Old Ref.	L	IMCO	5
17	Additional Tanks & Loading Arms at Ahmadi Depots	I	AMEC	4
18	New Facilities for H2S Removal Form SWS Flash Drum Off-Gas in Sour Water Stripper Unit U-26	L	ISCO	4
19	Replacement of Air Preheaters in HP Units	L	ксс	4
20	Conducting FEED for Flare Gas Recovery Facilities in U-49 MAB Refinery	I	AMEC	3
21	Replacement of old & obsolete substations in MAA refinery (PH-1)-FEED	I	AMEC	2
22	KNPC Natural Reserve Project at Wafra -Phase-01		Bu Khamseen International Group of Contractors	2
23	Enhancement of Metering/Custody Transfer Facilities at KNPC Refineries, Existing Gas Trains and LM Depots	I	AMEC	1
24	Improvement of Sanitary Sewerage Systems & Associated Works in MAA Refinery	L	Gulf Consult	1
25	Discharge of Treated Effluent at 500m Distance Away From Sea Coast - MAA & MAB Refineries	L	KISR	1
26	Upgrad. & Re-routing of 8" LPG, 24" Black Oil & 14" MOGAS IRT	L	ISCO	1
27	KNPC Natural Reserve Project at Wafra –Phase 2	L	KCCEC	0.17
28	New Operator Shelters (14Nos.) at MAA Refinery	L	UNETEC	0.17
TOTAL				2,627





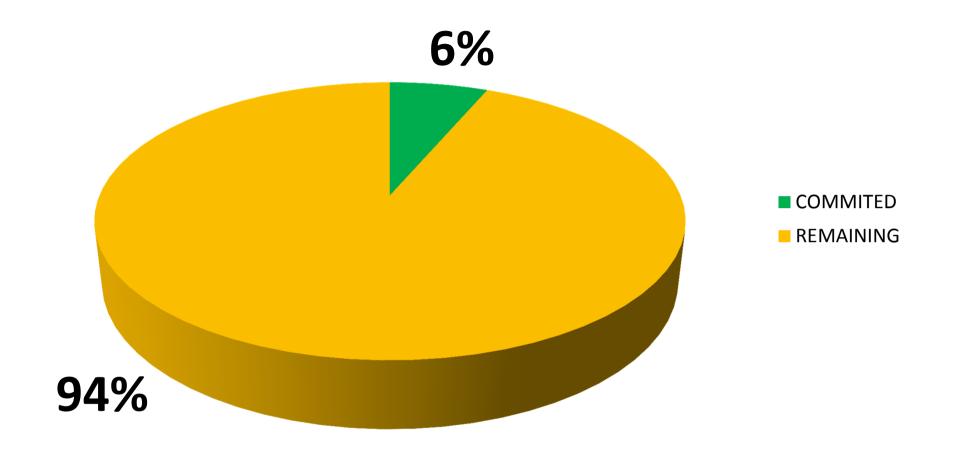
ONGOING CONTRACTS COST-WISE SHARE



TOTAL VALUE OF ONGOING CONTRACTS: USD 2,627 MM



COST-WISE SHARE OF PROJECTS COMMITTED



TOTAL VALUE OF PROJECTS: USD 40.8 BILLION



KEY PROJECTS HIGHLIGHTS

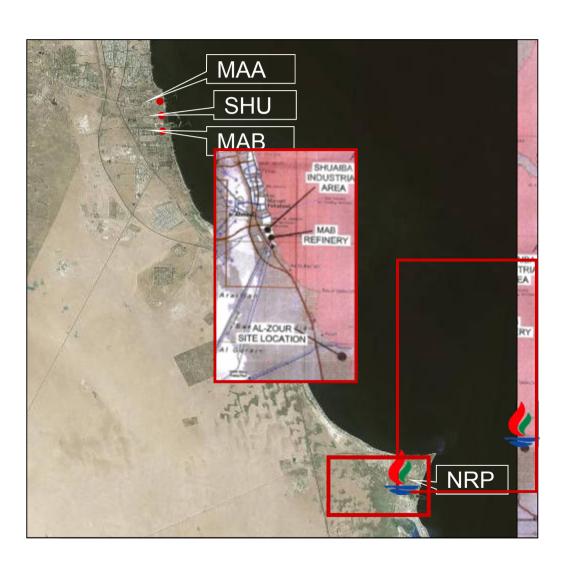




NEW REFINERY PROJECT



NEW REFINERY PROJECT (NRP) LOCATION



NEW REFINERY PROJECT

OBJECTIVE

• A national strategic and environmental initiative to achieve self sufficiency in fuel required for power generation and protect the environment

TIMELINE

• START DATE: FEB 2012

FORECAST COMPLETION DATE: JAN 2018

ESTIMATED COST

• USD 14,388.49 MM

CONTRACTS

• EPC CONTRACTORS: Contracts yet to be awarded

STATUS

• ACTUAL PROGRESS: 8.45%



NRP IMPORTANCE

NRP is one of the main initiatives in KPC's LTSP-2030 to reach a refining capacity of 1.4 million barrels per day

Significantly improves the environmental emission levels in the country

Produce 225 KBPSD LOW SULFUR FUEL OIL For meeting the growing demand of LSFO Needed for power generation economical and strategic outlet for Kuwaiti Heavy Crudes

Produce 340 KBPSD Of export products. (ULS DIESEL, ULS KEROSENE, PETROCHEMICAL NAPHTHA AND LPG)

Contribution to economic growth and development and creation of job opportunities for Kuwaiti Nationals



NRP STATUS AND BRIEFING

Subsequent to the decision of the Council Of Ministers, the Project was put on 'HOLD' since March 2009.

ARDS REACTORS (36 NOS.) and SEPARATORS (6 NOS.) have been delivered to Kuwait and are stored in Shuaiba Industrial Area.

Kuwait Municipality has completed the process of handing over the land for new site location in September 2010. Council Of Ministers transferred the land ownership to KNPC in October 2011.

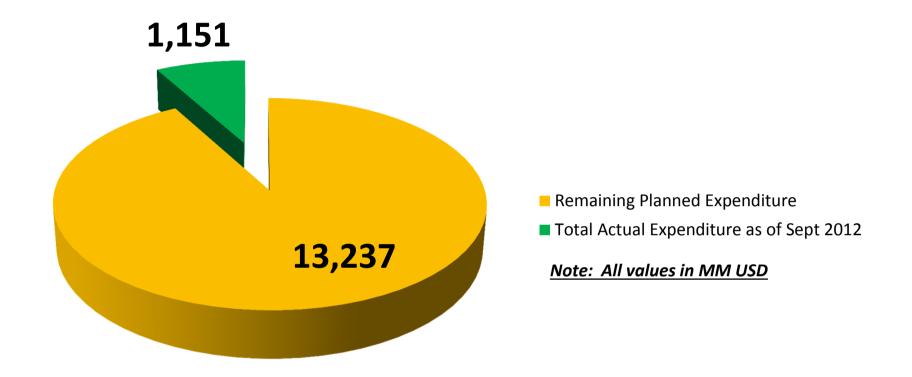
Approval to go ahead with the project received in FEB. 2012.

AMEC has been selected as the PMC to manage the Project.

PQ for EPC is underway



NEW REFINERY PROJECT – EXPENDITURE STATUS



ESTIMATED COST OF PROJECT : USD 14,388 MM





CLEAN FUEL PROJECT



CLEAN FUEL PROJECT

OBJECTIVE

• To upgrade KNPC's existing MAA & MAB Refineries into an integrated Merchant Refining Complex meeting the future diversified market requirements while maintaining high safety & environmental standards

TIMELINE

• START DATE: FEB 2012

• FORECAST COMPLETION DATE: DEC 2017

ESTIMATED COST

• USD 16,834.53 MM

CONTRACTS

• EPC CONTRACTORS: Contracts yet to be awarded

STATUS

• ACTUAL PROGRESS: 4.59%



CFP IMPORTANCE

The reference year for the project is 2020 based on full conversion refining scheme (base case + BOB)

Gas & Power available to support Refineries operations

Project Execution on lump sum basis with 3 main EPC packages (1 at MAA and 2 at MAB)

Production of on-spec. Products will start 6 months after commissioning

SHU Refinery considered retired, ahead of CFP commissioning



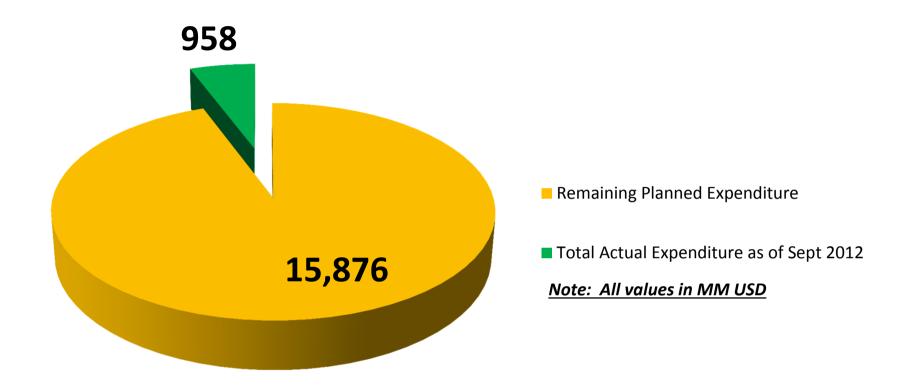
CFP STATUS AND BRIEFING

Foster Wheeler has been selected as the PMC to manage the Project.

PQ for **EPC** is underway



CLEAN FUEL PROJECT- EXPENDITURE STATUS



ESTIMATED COST OF PROJECT : USD 16,834 MM



NEW AGRP AND REVAMP OF EXISTING AGRP

FOURTH GAS TRAIN

GAS RELATED PROJECTS

NEW NORTH LPG TANK FARM



NEW AGRP AND REVAMP OF EXISTING AGRP

OBJECTIVE

• Construction of new AGRP train and revamp of the existing AGRP train at KNPC to process all the available sour gas and condensate from KOC, West Fields, Kuwait.

TIMELINE

• START DATE: SEPT 2009

FORECAST COMPLETION DATE: MAR 2015

ESTIMATED COST

USD 899 MM

CONTRACTS

• CONTRACTOR: M/S TECNIMOUNT S.P.A ITALY

• CONTRACT VALUE: USD 419.06 MM

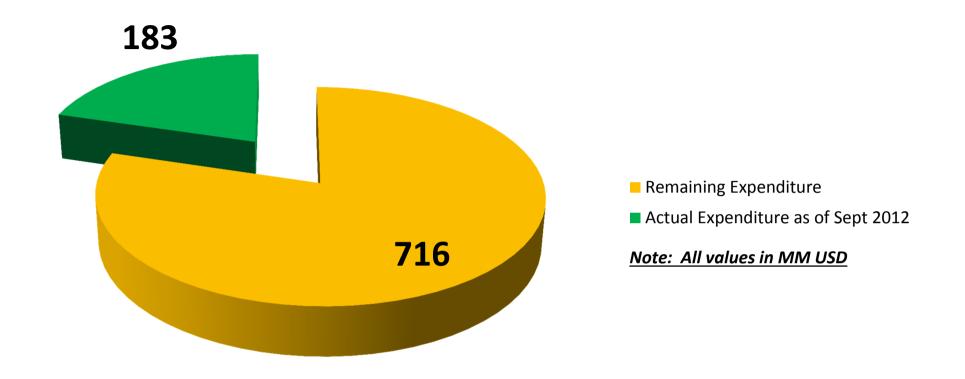
STATUS

• PLANNED PROGRESS: **80.1%**

• ACTUAL PROGRESS: **59%**



NEW AGRP AND REVAMP OF EXISTING AGRP – EXPENDITURE STATUS



ESTIMATED COST OF PROJECT: USD 899 MM



FOURTH GAS TRAIN

OBJECTIVE

• The Fourth Gas Train Project (FGTP) envisage to process additional associated gas and condensate produced by KOC and LPG produced by KNPC Refineries. The capacity of the FGTP is 805 MMSCFD of gas and 106.3 MBPSD condensate and it shall be integrated with the existing three (3 nos) trains.

TIMELINE

• START DATE: APR 2006

FORECAST COMPLETION DATE: MAR 2014

ESTIMATED COST

• USD 1134.9 MM

CONTRACTS

• CONTRACTOR: M/S DAELIM, SOUTH KOREA

• CONTRACT VALUE: USD 921.2 MM

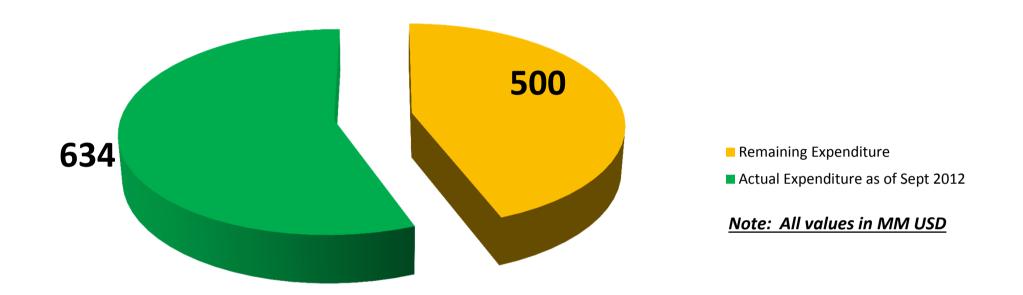
STATUS

• PLANNED PROGRESS: 72.8%

ACTUAL PROGRESS: 69%



FOURTH GAS TRAIN – EXPENDITURE STATUS



ESTIMATED COST OF PROJECT : USD 1134 MM



NEW NORTH LPG TANK FARM

OBJECTIVE

•To increase the LPG tankage in light of 4th & 5th gas train project requirements and to allow simultaneous loading of two LPG tankers, simultaneous bunkering and loading of the same tanker, to reduce emissions from existing KNG tanks on the South LPG Tank Farm by adding geodesic domes and replacing floating roof seals.

TIMELINE

• START DATE: APR 2010

• FORECAST COMPLETION DATE: MAR 2015

ESTIMATED COST

• USD 1366.9 MM

CONTRACTS

• CONTRACTOR: M/S GS ENGINEERING & CONSTRUCTION- KOREA

CONTRACT VALUE: USD 553.24 MM

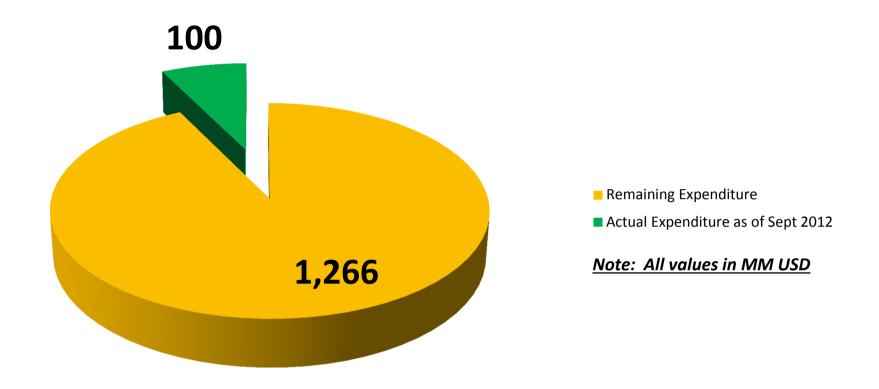
STATUS

• PLANNED PROGRESS: 40.9%

ACTUAL PROGRESS: 29.6%



NEW NORTH LPG TANK FARM – EXPENDITURE STATUS



ESTIMATED COST OF PROJECT: USD 1366 MM



SULPHUR HANDLING FACILITIES

PHASE -OUT OF HALON SYSTEM

NEW TAIL GAS TREATING UNIT AT MAA REFINERY

PERMANENT LNG IMPORT TERMINAL

OTHER MAJOR PROJECTS

NEW DEPOT AT MATLA



SULPHUR HANDLING FACILITIES

OBJECTIVE

 This project envisages a revamp of the Sulphur Handling Facilities in MAA Refinery in order to cater the expanded & enhanced capacity operation of sulphur production in KNPC Refineries and also from KOC/Equate / PIC, to improve the sulphur transfer

TIMELINE

• START DATE: JUL 2011

FORECAST COMPLETION DATE: OCT 2016

ESTIMATED COST

USD 899 MM

CONTRACTS

• Contract yet to be awarded

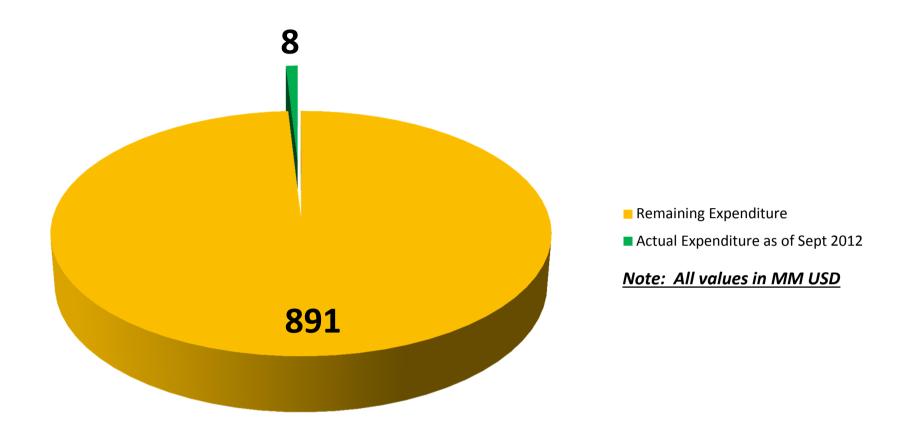
STATUS

• PLANNED PROGRESS: 15.5%

• ACTUAL PROGRESS: 15.4%



SULPHUR HANDLING FACILITIES – EXPENDITURE STATUS



ESTIMATED COST OF PROJECT : USD 899 MM



PHASE - OUT OF HALON SYSTEM

OBJECTIVE

• To replace the existing Halon System along with the complete fire alarm systems in all three Refineries & LM covering tanks, process areas, substations, local control rooms, CCRS & building.

TIMELINE

• START DATE: DEC 2006

FORECAST COMPLETION DATE: DEC 2013

ESTIMATED COST

USD 301.07 MM

CONTRACTS

• CONTRACTOR: M/S HANWHA, KOREA

• CONTRACT VALUE: USD 223.38 MM

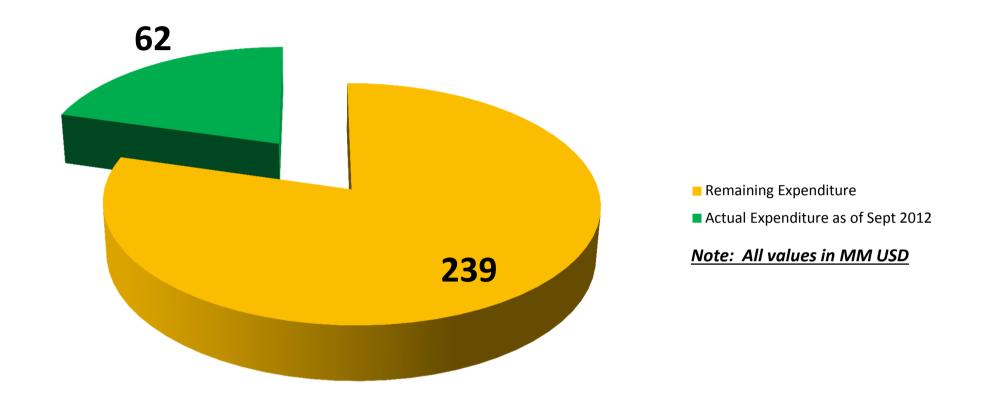
STATUS

• PLANNED PROGRESS: **67**%

• ACTUAL PROGRESS: 52.2%



PHASE -OUT OF HALON SYSTEM - EXPENDITURE STATUS



ESTIMATED COST OF PROJECT : USD 301 MM



NEW TAIL GAS TREATING UNIT AT MAA REFINERY

OBJECTIVE

• The objective of this Project is to install a New Tail gas Treatment Unit # 99 parallel to existing TGTU-93 along with new sour gas absorber and new regenerator in future upgrading project (FUP) block of MAA to process the entire tail gas

TIMELINE

• START DATE: MAY 2011

FORECAST COMPLETION DATE: SEPT 2014

ESTIMATED COST

• USD 124.8 MM

CONTRACTS

• CONTRACTOR: M/S SAMSUNG C&T CORPORATION, KOREA

CONTRACT VALUE: USD 56.4 MM

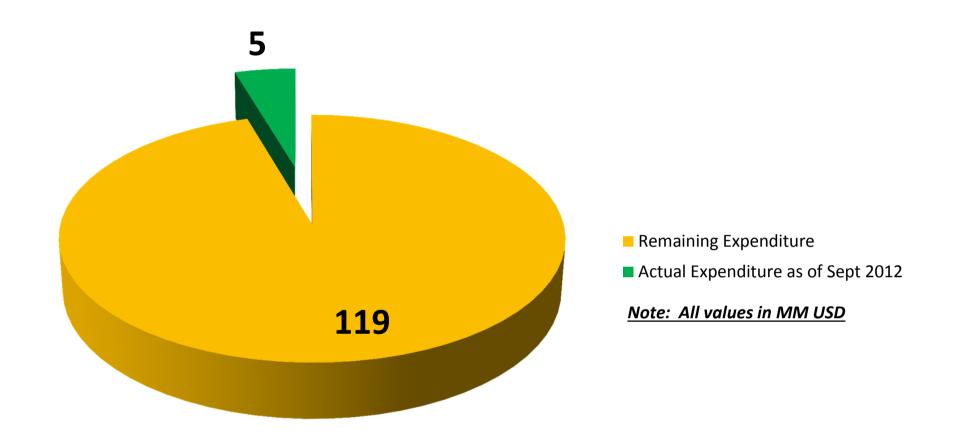
STATUS

• PLANNED PROGRESS: 22.9%

• ACTUAL PROGRESS: 22.2%



NEW TAIL GAS TREATING UNIT AT MAA REFINERY – EXPENDITURE STATUS



ESTIMATED COST OF PROJECT : USD 124 MM



PERMANENT LNG IMPORT TERMINAL

OBJECTIVE

• To meet the long term fuel requirements for Kuwait's Growing Energy demand.

TIMELINE

• FORECAST COMPLETION DATE: DEC 2017

ESTIMATED COST

• USD 683.5 MM

CONTRACTS

· Contract yet to be awarded

STATUS

• Currently In Feasibility Stage



NEW DEPOT AT MATLA

OBJECTIVE

 To construct a new depot at Matla and cross country pipe lines from MAA / SHU to Matla. This will improve strategic stocks at depot end to meet local market demand of Mogas, Gas oil, etc. in case of any interruption in supply from refineries.

TIMELINE

FORECAST COMPLETION DATE: NOV 2019

ESTIMATED COST

• USD 789.6 MM

CONTRACTS

• Contract yet to be awarded

STATUS

Currently In Feasibility Stage



CHALLENGES



CHALLENGES

LINING UP THE RIGHT EPC CONTRACTORS

HAVING THE RIGHT PROJECT MANAGEMENT CONSULTANT (PMC)

AVAILABILITY OF LOCAL CONTRACTORS TO CARRY OUT THE CONSTRUCTION WORKS

TRAINING AND DEVELOPING PROJECT MANAGERS GEARED FOR MANAGING LARGE SIZE PROJECTS

AVAILABILITY AND MOBILIZATION OF ENGINEERS, SKILLED AND UNSKILLED LABOR FORCE

PLANNING LOGISTICS FOR MOVEMENT OF WORKFORCE AND EQUIPMENT







Thank You



Caring for a CLEANER WORLD

