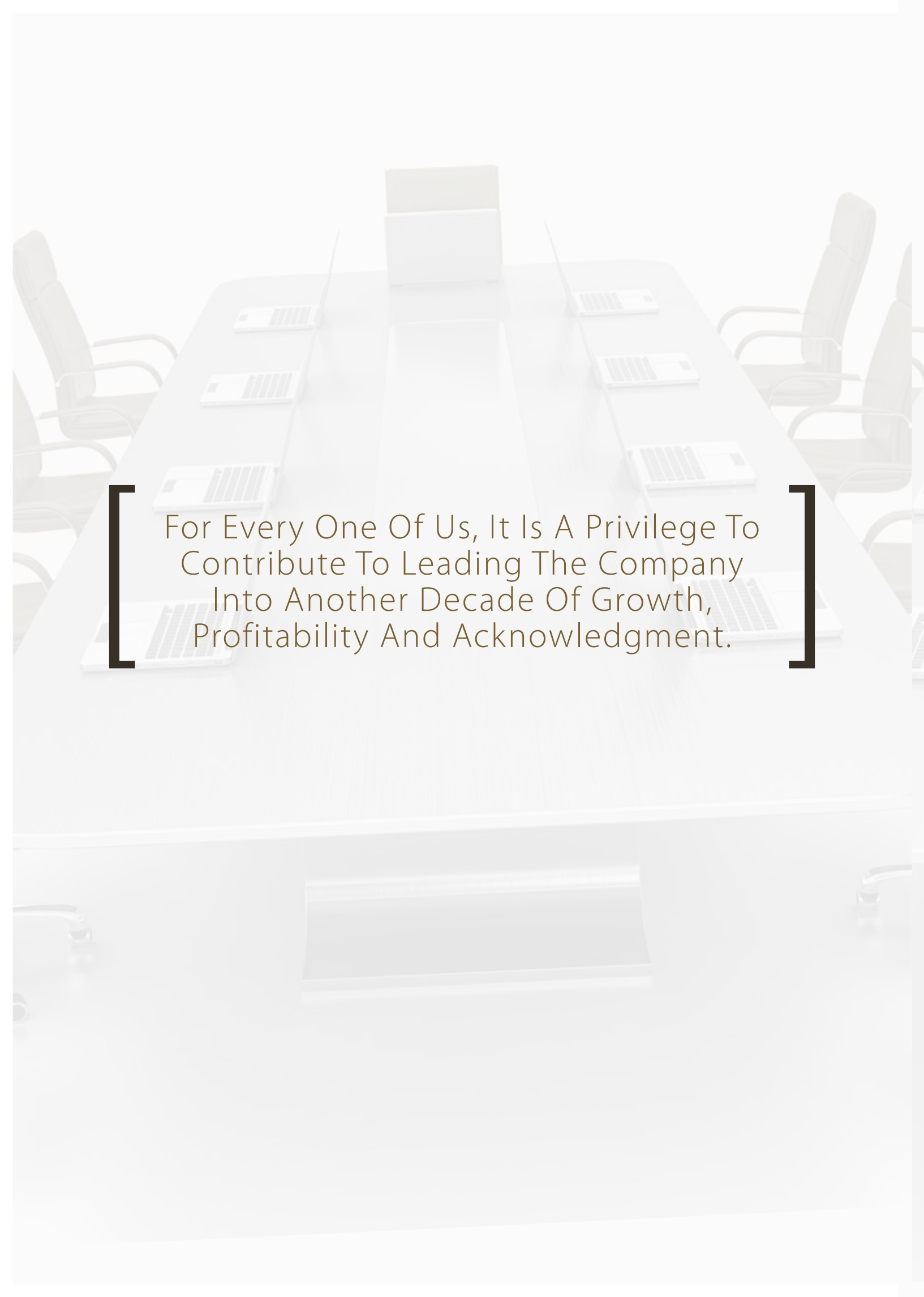


# STRIVE FOR PROGRESS

**ANNUAL REPORT  
2013 / 2014**



A photograph of a modern conference room with a long, light-colored wooden table. Several laptops are open on the table, and office chairs are arranged around it. The image is faded and serves as a background for the text.

For Every One Of Us, It Is A Privilege To  
Contribute To Leading The Company  
Into Another Decade Of Growth,  
Profitability And Acknowledgment.



# BOARD OF DIRECTORS

## EXECUTIVES:

**Eng. Mohammad Saafan**  
Chairman of the Board

**Eng. Ahmad Helmy**  
Executive Vice President, Operations

**Mrs. Hala Borai**  
Executive Vice President, Finance

**Eng. Amr Al-Halaby**  
Executive Vice President, Planning & Projects

## NON-EXECUTIVES:

**Eng. Sherine Ahmad**  
Undersecretary, Planning and Technical Affairs  
Ministry of Petroleum

**Eng. Mohammad Hafez**  
Executive Vice President, Planning & Projects  
Egyptian General Petroleum Corporation (EGPC)

**Eng. Mohammad Abd Al-Wadoud**  
Chairman  
Egyptian Petrochemicals Company (EPC)

**Eng. Khaled Abd Al-Badie**  
Vice President, Operations  
Egyptian Natural Gas Holding Company (EGAS)

**Mr. Mohammad Abbas**  
Petroleum Sector Union

# MESSAGE FROM THE CHAIRMAN



The promising investment forecast Egypt is currently approaching led us to reconsider the hardships and challenges Egypt faced throughout the past years; a global recession followed by January 25th revolution, out of which Egypt ascertains to harness the driving forces of success emerging as one of the most potent economies in the Middle East.

This promising investment climate, skilled labor, natural resources and strict environmental regulations have qualified

it to become an investment mecca for national and international strategic investors enlisting Egypt as a thriving market on the global economy map.

During its transition to democracy, the Egyptian government has announced a wide range of reforms based on diversity and openness to the world. Adopting outward strategies and reconnecting our economy with the global ones have a positive and remarkable impact on encouraging growth, boosting competitiveness and building a



long term sustainable economic recovery.

In this regard, EICHEM has committed itself to participate with a bountiful share in this success story with its groundbreaking projects and openhanded community services, giving due care to the environment while applying the government's wise strategy for rationalizing energy consumption.

Talking figures, the fiscal year 2013/2014 witnessed a boost in production and sales that positively affected revenues. Total production rates reached 2.53 Million Tons of petrochemical products, in comparison to 2.07 Million Tons for the last fiscal year, with an increase of 21%. The start-up of EIPET as well as the raise in production of EMETHANEX, E.STYRENICS and MOPCO have greatly contributed to this leap.

Total sales recorded 2.57 Million Tons in comparison to 2.11 Million Tons for the preceding year, with an increase of 21%. 677 Thousand Tons were dedicated to meet local market demands amounting 5.1 Billion EGP, while 1.9 Million Tons were exported

with a value of 1.2 Billion USD.

Our business plan is flexible encompassing breakthrough projects that either offer clean alternative energy resources or provide primary and intermediate materials for major industries. We endeavor to replace imports through maximizing value added to our natural resources hence enhancing our national economy.

Our vision for the future is quite promising outlining a number of business opportunities which clearly attract foreign and local investors comprising various financial institutions and strategic partners, thus highlighting our potential for growth and ability to thrive with excellence and integrity.

*Mohammad Saafan*

***President & Chairman of the Board***



# PROLOGUE

ECHEM was established in 2002 as one of the Ministry of Petroleum holding companies to be the legal entity dedicated to develop, monitor and enhance petrochemicals industry in Egypt.



## OUR CHARTER

To develop a competitive petrochemicals industry based on local human and natural resources using state-of-the-art technology and through implementing a pre-set National Petrochemicals Master Plan.

We seek a high standard of performance, etching a prominent position in the competitive environment in which we exist and we aim to work closely with our partners and policy makers to advance more efficient and sustainable use of our natural resources.



## OUR VALUES

We set high standards of performance and ethical behaviors and our reputation is upheld by how we live up to our values. We believe that our long-term success and shareholders benefits depend on our dedication to social responsibility, environmental protection, market satisfaction, employee empowerment, technological partnership and fair competition. Our future businesses will therefore be governed the very same values.



## OUR PEOPLE

In its early establishment phase, ECHEM was equipped with an educated team of professionals who were responsible for laying the solid foundation on which the company was built. Gradually, and over the past decade, the company was blessed with valuable additions to its team members who are now building on the early successes and planning for the future. At ECHEM, we create an environment that values differences and provides channels to report concerns. We encourage our staff to report their views on personal and professional processes and practices ensuring that they receive prompt feedback which demonstrates that we value such views.



## OUR LEADERSHIP

Our Board is chaired by an executive Chairman and comprises four executive directors and five non-executive directors who are experts in the Oil, Gas & Petrochemicals fields.



# KEEPING OUR MOMENTUM



## OUR BUSINESS ENVIRONMENT.... IS IT THE SAME??

As business dictates, an organization does not exist in a vacuum. The Egyptian government realized this predicament and has been preparing and planning a strategy for continued and steady economic growth.

Transforming Egypt into a vital and prosperous emerging market, economic policies were set to insure that market forces are given maximum potential to drive growth and employment. Today, there is a universal recognition that Egypt has become one of the most stable emerging markets in the region. With its strategic location and its booming market, Egypt is currently conducive for business.

A more level playing field may spur the growth of small and medium sized businesses which according to a World Bank study, contribute only 20% of the region's domestic production but employ 70 to 80% of its work force. These businesses could in turn create the tens of millions of new jobs that the Middle East and North Africa- with 65% of their 355 million people currently under the age of 25 – will need in the next decade to avoid social disaster.

This target is on top of EICHEM's agenda for the coming few years as will be shown in the Master Plan progress discussed later.





## || CORPORATE GOVERNANCE

Although corporate governance has not yet been fully and legally imposed in Egyptian companies, however, EICHEM is committed to applying international standards of corporate governance taking into consideration its statute.

Company policies and practices are implemented with a high level of transparency allowing auditors and parties of interest to monitor its activities very smoothly. Our commitments, investment methodologies and development plans greatly reflect compliance to corporate governance since establishment, i.e. long before beginning to implement it, which was this year.



It is this transparency achieved by ECHEM Board and Management, as part of its strategy, that ensures the company is accountable for its actions, thus improving public understanding of its activities, its policies and performance with respect to environmental and ethical standards and its relationship with the communities in which it operates. Here at ECHEM, we realize that corporate governance is not an option, but rather, an essential overriding element in attracting investments and stimulating economic growth.

## II RE-ADJUSTING OUR MASTER PLAN

When first set, the National Petrochemicals Master Plan was characteristically a flexible plan aiming to provide the company with sufficient means to periodically appraise the local and international market to provide direction on what best to do next.

In this respect, some projects were introduced in Phase II such as Bio-fuels, Formaldehyde & derivatives and Propylene & derivatives.

Such flexibility is vital in promoting the company's competitive edge in the region and at the same time enables optimum serving of the national economy through maximizing the value added of Egypt's natural resources.

## II SUCCESSFUL PARTNERSHIPS

Egypt has always been a key player in the Middle East. Today, and especially after the recent happenings on the political map, it is re-emerging as a very promising investment attraction and re-establishing itself to be solid ground for long term businesses.

We, at ECHEM, seek partners who best serve our purposes and at the same time their aspirations. Our methodology is based on models designed to attract foreign direct investments through equity participation of international organizations or financing through local and foreign financial institutions.

Our partnerships vary in range, however, they all have a common feature, that is they are all of strategic nature. Our partner could be a technology owner, a major off-taker, a feedstock provider, a financial loan marketer, etc... In all cases our partnerships enjoy a solid base of win-win situations.

## II WHAT'S IN IT FOR THEM?

Our methodology is systematic and precise. We provide detailed feasibility studies by independent international specialized consultants to maximize safety of investments, generate credibility to interested parties and facilitate financing by reputable local and foreign financial institutions.

We further avail to the investor appropriate project sites suitable for future expansions and enjoy proximity to utilities, feedstock and export facilities. We guarantee feedstock at competitive prices in coordination with our fellow companies and arrange long-term off-take agreements to guarantee loans payback. To top it all, we participate in the equity structure with varying percentage to assure investors of our commitment to the success of the projects in question.

## II WORKING WITH OTHERS

Our contribution does not stop here, we provide our partners with additional services such as obtaining all governmental approvals necessary to project execution and we also provide specialized experienced personnel during all phases of the project until final commissioning and start-up.

In the coming chapters we will be presenting several success stories with various partners who have been working with us upon commencement of Phase I of the master plan. We are now proud to present such experiences after completion of Phase I with all projects placed on production map.

We shall also be presenting our prospective business opportunities seeking the interests of wise investors who wish to join train of success.

## II INVESTING IN COMMUNITY

In today's modern world, big industrial organizations are not only appraised for their successful financial figures or the importance of their field of activities, but also for their investment in the communities around them.

Investment in community is also investment in the long term success of any company; as they both deliver mutual benefits and promote shared progress. Wherever we are, we strive to be a good neighbour sharing the concerns of our communities and working to create a better future.

We manage our business in a way that promotes social, environmental and economic benefits for our stakeholders. We believe that the effort of building a competitive workforce, enhancing health and wellbeing while protecting the environment benefit both ECHM and the communities in which it operates.

Our community investment revolves around major areas of focus which are the building blocks of any strong community:

**ECONOMIC DEVELOPMENT:** we support programs that create sustainable employment opportunities. This promotes self-sufficiency, stimulates job growth and economic development thus raising the standard of living.

**HEALTH:** we work on preventive care through applying state of the art technologies that ensure maintaining a clean environment.

**EDUCATION:** we promote technical and career training to ensure people can help their communities thrive in the 21<sup>st</sup> century economy.

ECHM's basic approach is "Living Our Values", our long-standing commitment to health & safety, environmental stewardship, honesty & integrity, corporate citizenship and a high performance team. Our Corporate Social Responsibility (CSR) policy keeps us focused on key concepts that help align our social responsibility efforts with our business goals, needs and operations.

Over the upcoming lines, we will recite stories of success and dedication in which ECHM & its affiliates participate to etch a smile on faces of needy people living in the communities in which we operate.



### SIDPEC

Talking CSR, we can't overlook the marvelous efforts exerted by Sidi Kerir Petrochemicals Company (SIDPEC). SIDPEC is an Egyptian joint stock entity established on November 1997, in Al-Amerya Alexandria, to produce a number of pivotal petrochemical products that best serve our local market and national economy like Ethylene, Polyethylene and Liquefied Petroleum Gas (LPG).

For SIDPEC, community service is a creed to live by. From providing medical assistance to backing up financially embarrassed, the company deeply mingled with the neighborhood and profoundly created a strong bond with the citizens.

SIDPEC's health care extended to aid a number of medical care centers and hospitals not only in Alexandria but also in Cairo; like Al-Amerya General Hospital, Al-Maamoura Chest Hospital, Alexandria Association for Visually Impaired Care and Children's Cancer Hospital 57357. Investing in future calibers, SIDPEC as well subsidized the underprivileged students in the neighborhood.

Over the past decade, integration and cooperation were and still are two main features that best characterize SIDPEC. Our reputable affiliate, together with a number of Petroleum Sector companies, have contributed to improve the infrastructure of the neighborhood by repairing the main roads leading to Al-Nahda & Al-Amerya.



## ELAB

Egyptian Linear Alkyl Benzene Company (ELAB) was implemented on November 2003 to meet local market demand for Linear Alkyl Benzene whereas surplus is dedicated for export. Production is widely used in the manufacture of liquid and powder detergents.

Since ELAB stands closely to those in need, the company has extended a helping hand to Al-Miry Hospital, Al-Mabarah Hospital, Egyptian Authority for Children's Villages S.O.S. & many other associations and organizations that pay due care to impoverished people in Alexandria.



## EMETHANEX

Another story of success is that of Egyptian Methanex Methanol Company (EMETHANEX). EMETHANEX is an Egyptian joint venture with Canadian Methanex Corporation; the global leader in Methanol industry distribution and marketing. ECHEM along with a number of Egyptian governmental organizations hold sizeable percentages of this venture.

A great sense of belonging is shared between EMethanex and the neighborhood in which it operates. The company touched the challenges the community has been facing long ago and is trying its best to improve their standard of living.

On health scale, EMethanex is currently establishing a medical care center for Friends of Liver Patients Association in Kafr Al-Bateikh, serving around 1500 families in the neighborhood. Another health-related project is the inauguration of a neonatal center for Ansar Al Sonnah Association in Damietta. The neonatal center can accommodate 20 babies and can be expanded in the future to receive up to 32. EMETHANEX donated 10 of the center's 20 incubators along with their corresponding ventilator units and accessories.

As for education, EMETHANEX has inaugurated 2 kindergartens for Manar Al Sabeel Association at Sananya, Damietta. The 2 KGs are now serving 234 children with a good educational service at competitive prices.



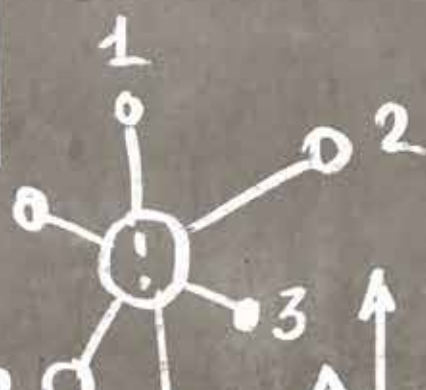
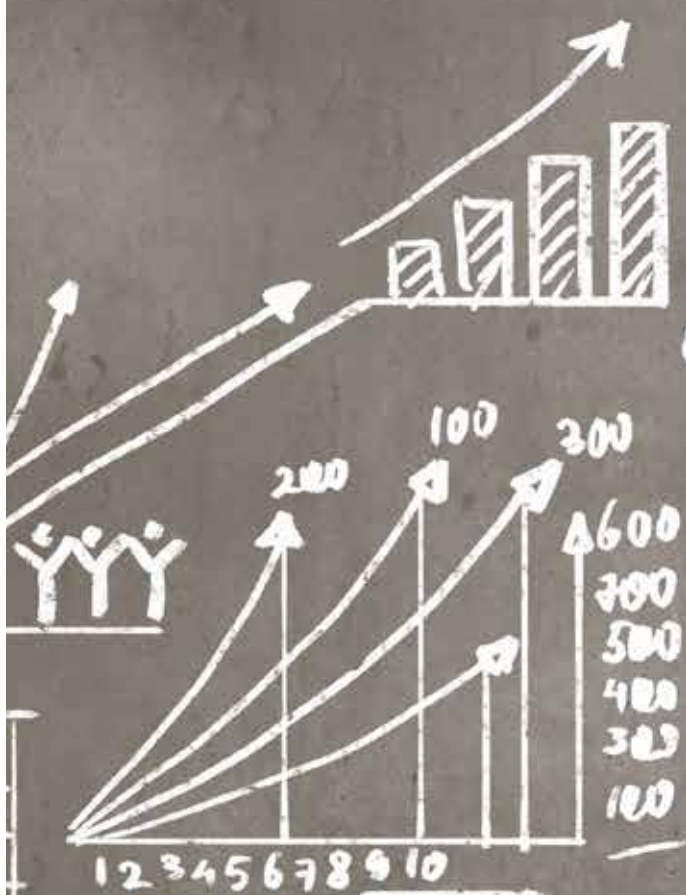
## MOPCO

Misir Fertilizers Production Company (MOPCO) was established on July 1998 in Damietta free zone to produce Ammonia and Urea. The company is committed to protect and develop the environment by maintaining the highest international codes and standards of environmental protection.

Investing in community is an integral part of MOPCO's strategy. The company uses its skills, money and expertise to support the surrounding community and exerts a lot of effort to promote development in Damietta; the first initiative of which is covering the drainage system of Al-Sananya village while establishing a two-ways road to and fro Damietta/Ras Al-Bar provinces with a total cost of 47 Million EGP. The second is executing phase III of Farascor's garbage recycling factory; with a cost of 25.5 Million EGP for the first 2 phases. The third initiative comprised the participation of MOPCO in providing Shata Shelters with LPG with a share of 500 Thousand EGP. MOPCO as well aims to create a healthy and beautiful landscape in the neighborhood by planting 500 shrubs and trees.

These are just examples of the efforts exerted to serve the community. Initiatives displayed by ECHEM and its affiliates have been always received with warmth and happiness by the hosting societies. ECHEM believes that the importance of community service can be realized only when there is a feeling of gratitude to the society and sympathy for the underprivileged in it. Without community service in our society many people would not know the meaning, usefulness, or importance of charity. Serving in your community addresses many deep rooted problems that fall through the cracks of government and social agencies.





# THE NATIONAL PETROCHEMICALS MASTER PLAN

ECHEM chose to stand strong and took upon itself the challenge of unraveling any obstacle in the way of thriving. Thanks to our crisis management that helps us move steadily but surely on the road map of a successful implementation for the national petrochemicals master plan.

Talking figures, the fiscal year 2013/2014 witnessed a boost in production and sales that positively affected revenues.

Total production rates reached 2.53 Million Tons of petrochemical products, in comparison to 2.07 Million Tons for the last fiscal year, with an increase of 21%.

The start-up of EIPET as well as the raise in production of EMETHANEX, E.STYRENICS and MOPCO have greatly contributed to this leap.

Total sales rates recorded 2.57 Million Tons in comparison to 2.11 Million Tons for the preceding year, with an increase of 21%. 677 Thousand Tons were dedicated to meet local market demands amounting to 5.1 Billion EGP, while 1.9 Million Tons were exported with a value of 1.2 Billion USD.

# **[ PROJECTS INAUGURATED DURING THE YEAR ]**





# EGYPTIAN INDIAN POLYESTER COMPANY

## EIPET

### PURPOSE OF THE PROJECT:

The project aims to produce Polyester Bottle Grade used for packaging to meet local market demands while exporting surplus.

### SHAREHOLDERS:

NATIONAL INVESTMENT		30%
<ul style="list-style-type: none"><li>Egyptian Petrochemicals Holding Company (ECHEM) 23%</li><li>Engineering for the Petroleum &amp; Process Industries (ENPPI) 7%</li></ul>		
FOREIGN INVESTMENT		70%
<ul style="list-style-type: none"><li>DHUNSERI Petrochem and Tea Ltd. (DPTL)</li></ul>		



**PLANT CAPACITY:** 420 Thousand T/Y Polyester



**TOTAL INVESTMENT COST:** 262 Million USD



**LOCATION:** Economic Zone – North West Gulf of Suez



**PROJECT PROGRESS:**

- Performance tests are successfully completed.
- Production rates reached 100% for both trains.



**START UP DATE:** **1st Train:** January 2014 **2nd Train:** April 2014

**PROJECTS  
UNDER EXECUTION**



# [ MISR FERTILIZERS PRODUCTION COMPANY MOPCO ]

## PURPOSE OF THE PROJECT:

The project aims to produce Urea to meet local market demands and export surplus, while surplus Ammonia production shall serve local market needs

## SHAREHOLDERS:

<b>National Investment</b>	<b>70.97%</b>
<b>1- Petroleum Sector:</b> <ul style="list-style-type: none"> <li>Egyptian Petrochemicals Holding Company (ECHEM) 30.75%</li> <li>Egyptian Natural Gas Holding Company (EGAS) 7.62%</li> <li>Egyptian Natural Gas Company (GASCO) 5.72%</li> </ul>	44.09 %
<b>2- Banking &amp; Insurance Institutions:</b> <ul style="list-style-type: none"> <li>National Investment Bank 12.82%</li> <li>National Bank of Egypt 2.56%</li> <li>Nasser Social Bank 2.56%</li> <li>Misr Insurance Company 2.3%</li> <li>Misr Life Insurance 1.98 %</li> </ul>	22.22%
<b>3- Initial Public Offering:</b>	4.66%
<b>Arab &amp; Foreign Investment:</b>	<b>29.03%</b>
<ul style="list-style-type: none"> <li>Arab Petroleum Investments Corporation (APICORP) 3.03%</li> <li>Agrium 26%</li> </ul>	



### PLANT CAPACITY:

1.38 Million T/Y Urea  
100 Thousand T/Y surplus Ammonia



### TOTAL INVESTMENT COST:

1840 Million USD



### LOCATION:

Free Zone – West of Navigation Channel - Damietta



### PROJECT PROGRESS:

#### 3rd Train:

- Erection works for ZLD unit are in progress.

#### 1st & 2nd Trains:

- Construction works resumed in Feb. 2014.
- EPC works for both Urea/Ammonia trains are in progress.
- Overall EPC preogress reached 88.7%.



### START UP DATE:

**1st Train:** December 2014

**2nd Train:** 1st Quarter 2015



# EGYPTIAN ETHYLENE & DERIVATIVES COMPANY ETHYDCO

## PURPOSE OF THE PROJECT:

The project aims to produce Ethylene and Polyethylene to maximize the value added to Ethane/Propane mixture produced by Western Desert Gas Complex in Alexandria. Production is to satisfy local market needs while surplus is to be exported.

## SHAREHOLDERS:

<b>National Investment</b>	100%
<b>1- Petroleum Sector:</b> <ul style="list-style-type: none"><li>• Egyptian Petrochemicals Holding Company (ECHEM) 20%</li><li>• Sidi Kerir Petrochemicals Company (SIDPEC) 20%</li><li>• Egyptian Natural Gas Company (GASCO) 11%</li></ul>	51%
<b>2- Banking Institutions:</b> <ul style="list-style-type: none"><li>• Al Ahly Capital Holding 21%</li><li>• National Investment Bank 14%</li><li>• Banque Misr 10%</li><li>• Nasser Social Bank 4%</li></ul>	49%



### PLANT CAPACITY:

460 Thousand T/Y Ethylene  
400 Thousand T/Y Polyethylene  
26 Thousand T/Y Butadiene Derivatives



**TOTAL INVESTMENT COST:** 1925 Million USD



### LOCATION:

Al Amerya – Alexandria (EPC & SIDPEC Land)




### PROJECT PROGRESS:

- Overall EPC progress reached 63.9%.
- EPC works for both Ethylene & Polyethylene plants are in progress.
- Installation & erection of main utilities systems are in progress.
- Engineering designs review of auxiliary units are in progress.



### START UP DATE:

4<sup>th</sup> Quarter 2015



# EGYPTIAN STYRENE & POLYSTYRENE PRODUCTION COMPANY E.STYRENICS

## PURPOSE OF THE PROJECT:

The project aims to produce Styrene as a feedstock for Polystyrene production while exporting surplus.

## SHAREHOLDERS:

NATIONAL INVESTMENT		100%
Petroleum Sector: <ul style="list-style-type: none"><li>• Egyptian Petrochemicals Holding Company (ECHEM) 25%</li><li>• Petroleum Projects and Technical Consultations Company (PETROJET) 20%</li><li>• Engineering for the Petroleum &amp; Process Industries (ENPPI) 15%</li></ul>		60%
Ministry of Finance: <ul style="list-style-type: none"><li>• National Investment Bank 24%</li><li>• Ministry of Finance 16%</li></ul>		40%



### PLANT CAPACITY:

300 Thousand T/Y Styrene



### TOTAL INVESTMENT COST:

560 Million USD



### LOCATION:

Al-Dekheila Port - Alexandria



### PROJECT PROGRESS:

- Basic engineering designs are successfully completed.
- ITB for EPC works & TIC are in progress.
- Bankable feasibility study for overall complex (Styrene & Polystyrene) is in progress.



### START UP DATE:

1<sup>st</sup> Quarter 2017



# EGYPTIAN PETROCHEMICALS COMPANY WATER FILTRATION SYSTEM EPC

## PURPOSE OF THE PROJECT:

The project aims to provide ETHYDCO with 1000 m<sup>3</sup>/h of filtered water via installing a new water filtration system in the facility unit and its transformer station.

## Contractor:

The Petroleum Projects and Technical Consultations Company (PETROJET)

## Execution Duration:

15 Months



**TOTAL INVESTMENT COST:** 41.3 Million EGP



### PROJECT PROGRESS:

- Overall progress reached 42.06%.
- PETROJET has been chosen for supplying and installing the water filtration system.



### START UP DATE:

1<sup>st</sup> Quarter 2015





# EGYPTIAN PETROCHEMICALS COMPANY PLANT CAPACITY INCREASE

## EPC

### PURPOSE OF THE PROJECT:

The project aims to increase PVC production to 90 Thousand T/Y through renovating VCM unit to reach its capacity.



### PROJECT PROGRESS:

#### 1- Switching Thermal Cracking Furnace Bulbs to Gas Burner:

- INTERNATIONAL COMBUSTION EQUIPMENT (I.C.E.) is assigned on May 2014.
- Lead Time: 6 months from assignment ending November 2014.
- Contract Value: 3 Million EGP.
- 

#### 2- Supplying & Installing New Chiller Unit:

- MIRACO CARRIER is assigned on June 2014.
- Lead Time: 6 months from assignment ending December 2014.
- Contract Value: 1.9 Million EGP.
- 

#### 3- Manufacturing a Reactor for Direct Chlorination Unit:

- PETROJET is assigned on September 2013.
- Lead Time: EPC granted PETROJET a grace period ending September 2014 for reactor manufacturing. The reactor is set to be installed on the upcoming overhaul. EPC and PETROJET are currently readjusting the time schedule to overcome delay.
- Contract Value: 4 Million EGP.
- 

#### 4- Supplying Super Duplex Pipes for EA-504 Exchanger:

- WECO (an authorized agent for MANNESMANN) is assigned on February 2014.
- Lead Time: 7 months from assignment ending September 2014. Manufacturing duration in EPC will take 3 months.
- Contract Value: 3.3 Million EGP.
- Startup Date: 1st Quarter 2015.

# **FORTHCOMING OPPORTUNITIES**

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# BIO ETHANOL FROM SUGAR BEET MOLASSES

## PURPOSE OF THE PROJECT:

The project aims to produce Bio Ethanol from Sugar Beet Molasses to be blended with Gasoline providing a clean alternative energy resource. Ethanol as well shall be used as a feedstock for a number of petrochemical products to maximize value added.

## SHAREHOLDERS:

- Egyptian Petrochemicals Holding Company (ECHEM)
- Others



### PLANT CAPACITY:

100 Thousand T/Y Bio Ethanol



### FEEDSTOCK:

420 Thousand T/Y Sugar Beet Molasses



### TOTAL INVESTMENT COST:

135 Million USD (Understudy)



### LOCATION:

Motobus – Kafr Al-Sheikh Governorate (ECHEM Land)



### PROJECT PROGRESS:

- Pre-feasibility study and financial model have been prepared.
- Memorandum of Understanding (MOU) is signed with a number of Egyptian sugar companies to provide the project with 220 Thousand T/Y Molasses; representing 50% of feedstock. Undergoing negotiations are in progress to provide the project with the remaining feedstock.
- Non-Disclosure Agreements (NDAs) are signed with a number of local and international companies for partnership.
- Channels are open with potential national and international investors to discuss possible scenarios of investment.



### START UP DATE:

2018





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# BIO ETHANOL FROM RICE STRAW

## PURPOSE OF THE PROJECT:

The project aims to produce Bio Ethanol from Rice Straw and agricultural wastes to be blended with Gasoline providing a clean alternative energy resource. Ethanol as well shall be used as a feedstock for a number of petrochemical products to maximize value added.

## SHAREHOLDERS:

- Egyptian Petrochemicals Holding Company (ECHEM)
- Others

	<b>PLANT CAPACITY:</b>	50 Thousand T/Y Bio Ethanol
	<b>FEEDSTOCK:</b>	275 Thousand T/Y Rice Straw & Agricultural Wastes
	<b>TOTAL INVESTMENT COST:</b>	220-233 Million USD (Understudy)
	<b>LOCATION:</b>	Motobus – Kafr Al-Sheikh Governorate (ECHEM Land)
	<b>PROJECT PROGRESS:</b>	<ul style="list-style-type: none"><li>• Pre-feasibility study and financial model have been prepared.</li><li>• Cooperation protocol is to be signed by the ministries of Petroleum, Agriculture, Environment and Industry together with the Social Fund for Development (SFD) to provide the project with feedstock.</li><li>• Licensor is to be chosen shortly.</li><li>• Channels are open with potential national and international investors to discuss possible scenarios of investment.</li></ul>
	<b>START UP DATE:</b>	2018

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# PROPYLENE & PROPYLENE DERIVATIVES

## PURPOSE OF THE PROJECT:

The project aims to produce Propylene & Derivatives using GASCO's Propane as a feedstock to maximize value added. Production shall serve local market needs and export surplus.

## SHAREHOLDERS:

- Egyptian Petrochemicals Holding Company (ECHEM)
- Others

	<b>PLANT CAPACITY:</b>	300-350 Thousand T/Y Propylene
	<b>FEEDSTOCK:</b>	350-420 Thousand T/Y Propane
	<b>TOTAL INVESTMENT COST:</b>	2-3 Billion USD (Understudy)
	<b>LOCATION:</b>	Alexandria Governorate (EPC Land)
	<b>PROJECT PROGRESS:</b>	<ul style="list-style-type: none"><li>• Pre-feasibility study and financial model have been prepared.</li><li>• Gas term sheet signed with GASCO to provide the project with Propane (Feedstock).</li><li>• Initial approval for project implementation has been granted by EEAA.</li><li>• A specialized French entity has been chosen to prepare detailed feasibility study.</li><li>• Channels are open with potential national and international investors to discuss possible scenarios of investment.</li></ul>
	<b>START UP DATE:</b>	2019



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# FORMALDEHYDE & DERIVATIVES

## PURPOSE OF THE PROJECT:

The project aims to produce Formaldehyde & Derivatives using EMETHANEX's Methanol as a feedstock to maximize value added. Production shall serve local market needs and export surplus.

## SHAREHOLDERS:

- Egyptian Petrochemicals Holding Company (ECHEM)
- Others

	<b>PLANT CAPACITY:</b>	70 Thousand T/Y Formaldehyde & Derivatives
	<b>FEEDSTOCK:</b>	30 Thousand T/Y Methanol
	<b>TOTAL INVESTMENT COST:</b>	50 Million USD (Understudy)
	<b>LOCATION:</b>	Motobus – Kafr Al-Sheikh Governorate (ECHEM Land)
	<b>PROJECT PROGRESS:</b>	<ul style="list-style-type: none"><li>• Pre-feasibility study and financial model have been prepared.</li><li>• Initial approval for project implementation has been granted by EEAA.</li><li>• Methanex Europe is to raise feedstock quantities to 130 Thousand T/Y Methanol.</li><li>• Channels are open with potential national and international investors to discuss possible scenarios of investment.</li></ul>
	<b>START UP DATE:</b>	2018

[ In The Upcoming Decade, The Company  
Will Go Through A Tenfold Increase,  
Diversify Its Portfolio And Introduce  
New Products And Investments. ]



# MONITORING, DEVELOPMENT & INTEGRATION

## OPERATIONS ACTIVITY

The continued support of existing petrochemical complexes through technical and administrative supervision has led to an increase in production and marketing of petrochemical products which had the greatest impact in supporting the financial position of these companies and increasing their competitive edge.

Our best practices to enhance operational excellence have yielded record breaking performance for the operating projects while forecasting a prolific vision for the upcoming ones depending on two essential axes:

### **II FOLLOW-UP & DEVELOPMENT:**

ECHEM offers non-stop support for the affiliated companies to secure their need for raw materials and utilities. The company as well follows-up execution of revamps, scheduled and preventive maintenance to enhance the continuity of operation and minimize shutdowns.

Typically, ECHEM shows interest in the development projects of affiliated companies to increase their income and profits along with enhancing their capability of competition in the local and global markets.

### **II INTEGRATION & RESOURCES MANAGEMENT:**

#### **EGYPTIAN PETROCHEMICALS COMPANY (EPC)**



**Reducing Power Consumption in Chlorine Plant:**  
ECHEM is currently studying the application of UHDENORA technology (A joint company of THYSSENKRUPP UHDE & INDUSTRIE DE NORA) in EPC's Chlorine Plant; through which power consumption can be reduced by 30% via replacing the current electrolysis cells with new ones.

#### **EGYPTIAN STYRENE & POLYSTYRENE PRODUCTION COMPANY (E.STYRENICS)**



In coordination with INEOS, ECHEM, ENPPI & E.STYRENICS have formed a joint committee to standardize the consumption rate for the facilities while securing the safety of production for both trains.



### EGYPTIAN PROPYLENE AND POLYPROPYLENE COMPANY (EPPC)



ECHEM extends its guidance and support for EPPC in acquiring :

- Approval of EGPC on importing a monthly quantity ranging from 12 to 15 Thousand Tons Propane throughout 2014.
- Approval of The Armed Forces Operations Authority and Specialized Ports Permanent Committee on establishing a floating platform for liquefied Propylene and Propane tankers with 35 Thousand Tons capacity and 16 Million EGP estimated cost.
- Approval of UGDC on receiving imported Propane freights.

### EGYPTIAN LINEAR ALKYL BENZENE COMPANY (ELAB)



- Storage capacity has been successfully increased by establishing 4 new tanks (2 for raw material & 2 for product) to overcome emergency shutdowns.
- ELAB & UOP have successfully increased plant capacity by 15-20% via upgrading production units (water injection with PACOL unit). Accordingly, the estimated net profit is to reach 3.5 Million USD/Annum.

### EGYPTIAN ETHYLENE AND DERIVATIVES COMPANY (ETHYDCO)



- Coordinating with GASCO, EGAS & ETHYDCO to increase feedstock quantities of Ethane/Propane mixture (from 528 Thousand T/Y to 610 Thousand T/Y) reaching Ethylene Plant capacity (460 Thousand T/Y Ethylene). Ethylene production shall serve the need of Styrene Plant for feedstock.
- EGPC is to coordinate with ECA (Egyptian Customs Authority) to exempt ETHYDCO of administrative fees for imported equipment and machinery, saving up to 30 Million EGP.



# DEVELOPMENT

## MONITORING, DEVELOPMENT & INTEGRATION

### PRODUCTION & SALES

At ECHEM, we operate a portfolio of businesses; well positioned to take advantage of integration synergies with our affiliates and operating units, as well as maintaining focus on operational excellence.

Production and maintenance plans are key elements in enhancing productivity and reducing shut-down periods. The start-up of EIPET together with the leap in production rates of EMETHANEX, E.STYRENICS and MOPCO's 3rd train perked up ECHEM's progress in the fiscal year 2013/2014, resulting to 2.53 Million Tons of total petrochemicals production with an increase of 21%.

An ambitious plan was set for sales as the total reached 2.57 Million Tons, with an increase of 21%. 677 Thousand Tons were dedicated to meet local market demands amounting 5.1 Billion EGP while 1.9 Million Tons were directed for export with a value of 1.2 Billion USD.





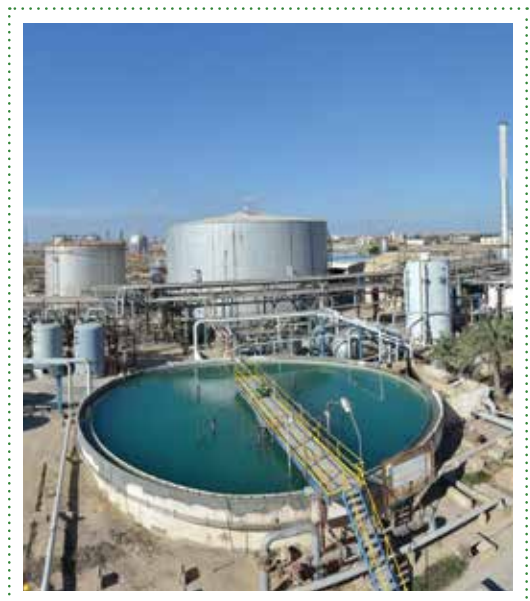
## EGYPTIAN PETROCHEMICALS COMPANY (EPC)

### **POLYVINYL CHLORIDE (PVC)**

68 Thousand Tons were produced achieving 90% of production plan. 69 Thousand Tons were sold; 54 of which were directed to meet local market demands amounting 414 Million EGP while 15 Thousand Tons were dedicated for export at a value of 15 Million USD.

### **LIQUEFIED CAUSTIC SODA 100%**

62 Thousand Tons were produced achieving 106% of the production plan. 56 Thousand Tons were sold; out of which 56 Thousand Tons were directed to meet local market demands amounting 170 Million EGP while 25 Tons were dedicated for export at a value of 12 Thousand USD.





## SIDI KERIR PETROCHEMICALS COMPANY (SIDPEC)

### ETHYLENE

274 Thousand Tons were produced meeting 98% of production plan; 230 Thousand Tons of which were dedicated for Polyethylene production. 39 Thousand Tons were sold to EPC at a value of 374 Million EGP.

### POLYETHYLENE

226 Thousand Tons were produced with a percentage of 101 over planned. 227 Thousand Tons were sold; out of which 143 Thousand Tons were dedicated to meet local market demands amounting 1689 Million EGP while directing 84 Thousand Tons for export at a value of 136 Million USD.

### LIQUEFIED PETROLEUM GAS (LPG)

19 Thousand Tons were produced with a percentage of 77 of production plan. Total quantity was dedicated to GASCO at a value of 29 Million EGP.



## AMREYA PETROLEUM REFINING COMPANY (APRC-LAB UNIT)

55 Thousand Tons of LAB were produced with 108% over planned; 50 Thousand Tons were dedicated to serve the local market with 588 Million EGP, and 1 Thousand Ton was exported amounting 1.9 Million USD.



## EGYPTIAN LINEAR ALKYL BENZENE COMPANY (ELAB)

ELAB has successfully achieved an overall progress of 106% planned with the production of 106 Thousand Tons of LAB. 104 Thousand Tons were sold; 25 Thousand Tons of which were dedicated for local market at a value of 322 Million EGP, while 79 Thousand Tons were exported at a value of 138 Million USD.



## EGYPTIAN METHANEX METHANOL COMPANY (EMETHANEX)

Production rates marked 1.03 Million Tons of Methanol with 79% of production plan. 1.1 Million Tons were sold; where 89 Thousand Tons were dedicated to meet local market demands at a value of 250 Million EGP, and 962 Thousand Tons were exported at a value of 437 Million USD. Excess in sales rates resulted from a carried over production.



## MISR FERTILIZERS PRODUCTION COMPANY (MOPCO)

Repeated turndowns & shutdowns have limited Ammonia/ Urea production rates & MOPCO's plant capacity haven't been reached.

### AMMONIA

Ammonia production reached 333 Thousand Tons, with 89% planned. 308 Thousand Tons of which were dedicated to meet Urea production, while 25 Thousand Tons were dedicated to meet local market demands at a value of 57 Million EGP.

### UREA

Urea production reached 546 Thousand Tons, with 93% planned. 555 Thousand Tons were sold; 101 of which were dedicated to meet local market demands amounting 141 Million EGP. 454 Thousand Tons were directed for export at a value of 166 Million USD.



## EGYPTIAN PROPYLENE & POLYPROPYLENE COMPANY (EPPC)

Production rates marked 193 Thousand Tons of Polypropylene with 79% of production plan. 192 Thousand Tons were sold; where 69 of which were dedicated to meet local market demands at a value of 757 Million EGP, while 123 Thousand Tons were exported at a value of 193 Million USD.



## EGYPTIAN STYRENE & POLYSTYRENE PRODUCTION COMPANY (E.STYRENICS)

Production rates marked 107 Thousand Tons of Polystyrene with 80% of production plan. 105 Thousand Tons were sold; where 17 Thousand Tons were dedicated to meet local market demands at a value of 181 Million EGP while 88 Thousand Tons were exported at a value of 163 Million USD. Excess in sales rates resulted from a carried over production.



## EGYPTIAN INDIAN POLYESTER COMPANY (EIPET)

Production rates marked 94 Thousand Tons of Polyester; 84 of which were fully dedicated to export at a value of 112 Million USD. 1st train was on stream in January 2014 whereas the 2nd in April of the same year.





## MARKETING STRATEGY

Every CEO and marketing executive periodically faces urgent strategic marketing challenges that can affect the future of the company for many years. Frequently these decisions are made without having an opportunity to study the situation and make the best possible decision.

At ECHEM, we follow a better approach by performing an annual comprehensive review of markets and opportunities, then making long-term strategic decisions without the distractions of day-to-day market-

ing and sales activities. Daily decisions then fit into the company's overall strategic marketing goals.

The top-down process of developing a strategic marketing plan helps insure that all tactical marketing programs support the company's goals and objectives, as well as convey a consistent message to customers. This approach improves company efficiency in all areas, which helps improve revenue and assure market share growth while minimizing expenses, all of which lead to higher profitability.

## II DYNAMIC STRATEGIC MARKETING

ECHEM follows a dynamic strategic marketing plan applying SWOT analysis for the surrounding environment and applying the Know-How strategy of meeting national and international market demand.

### ECHEM adopts a wise marketing strategy to meet its target plan outlining:

- Participation in feasibility studies concerning projects under construction & under study, en- route to establishing integrated industries that meet local market demands and export surplus as well as maximizing the value added of the local feedstock used in production.
- Marketing the products of the affiliated companies locally and export surplus via short term and long term contracts.
- Opening new channels with world-class entities via global conferences and exhibitions or direct communication.



## II OUR STRATEGY

- Utilizing technical and administrative capabilities of fresh and trained manpower to apply state-of-the-art technologies.
- Maximizing the value added of the feedstock used to raise revenues of ECHEM and its affiliates.
- Minimizing imports through the rational utilization of local products offered by national petrochemical plants in an attempt to save foreign currency.
- Exporting surplus to generate foreign currency.

## II APPLICATION

Applying this strategy, ECHEM will positively affect the national economy through:

- Availing petrochemical products needed to meet local market demands.
- Replace imports and increase exports.
- Establishing industries that utilize petrochemical products as a feedstock.
- Availing direct and indirect job opportunities through downstream projects requiring mass labour such as industrial clusters .



# ENVIRONMENT, HEALTH & SAFETY

ECHEM endeavors to maintain the highest and the strictest levels of environment, health and safety international codes and standards. Projects in the development phase, under execution or operating plants are kept under strict supervision for applying those standards. Moreover, support is provided when needed.

SN	LIST	COMPANY	CONTRACTOR	OVERALL
1	Total Number of Working Hours	13870773 Hr.	8157000 Hr.	22027773 Hr.
2	Number of Employees	6934	2719	9653
3	Fatality/Serious Injuries	-	-	-
4	Lost Time Injuries (LTI)	-	-	-
5	First Aid/Minor Injuries	26	1	27
6	Recordable Injuries	26	1	27
7	Injuries (Outside Workplace)	5	-	5
8	Fatalities (Outside Workplace)	-	-	-

Average Working Hours/ Company Employee/Year = **2000 Hr.**

Average Working Hours/ Contractor Employee/Year = **2500 Hr.**

## ECHEM Companies’ Fatal Accident Rate (FAR) compared to OGP

FAR (2012)	ECHEM	OGP
Overall	0.00	2.12
Company	0.00	1.83
Contractor	0.00	2.20

Fatal Accident Rate (Far): The Number Of Company/Contractor Facilities Per 100 Million Hours Worked.

## ECHEM Companies’ Lost Time Injury Frequency (LTIF) compared to OGP

LTIF (2012)	ECHEM	OGP
Overall	0.00	0.45
Company	0.00	0.40
Contractor	0.00	0.47

Lost Time Injury Frequency (Ltif): The Number Of Lost Time Injuries (Facilities + Lost Work Day Cases) Per 1 Million Hours Worked.

\* **OGP:** The International Association of Oil & Gas Producers

\* **Ref.:** OGP Safety Performance Indicators – 2013 Data – Report No.: 2013s – July 2014





## **ZERO LIQUID DISCHARGE TECHNOLOGY (ZLD)**

At EICHEM, preserving environment is a credo to pursue and that what urges us to trace and apply the latest environmental codes and standards on equal footing with our projects' implementation. The application of ZLD technology is in progress for all our operating and under execution projects to achieve environmental compliance, reduce carbon footprint, and recover high purity water for reuse.

**We Protect Our Environment  
For Future Generations**

# HUMAN RESOURCES DEVELOPMENT

## II ECHEM HUMAN CAPITAL A DRIVER OF COMPETITIVE ADVANTAGE

During 2012/2013, ECHEM HR has set a key goal to foster a competent workforce and create an organizational culture to maintain its relevance as a place of opportunity and excellence.

This year, ECHEM HR main objective was to transform our petrochemical affiliates and operating units into "Learning Organizations" capable of developing knowledge in terms of know-how and expertise, and promote best practices in the petrochemical business.

ECHEM as a "Think-Tank" for Egypt's petrochemical industry, felt the crucial need to address key challenges and act as a platform where top executives from affiliate companies collectively address the challenges encountering the industry through a series of specialized workshops & training programs designed and conducted by ECHEM.

### ECHEM HR HAS ALSO SET A KEY GOAL TO INTEGRATE WITH ITS AFFILIATES THROUGH:

- Identifying and analyzing HR issues, defining optimized systems to recruit and train the right people.
- Promoting a business culture that encourages innovation and rewards individual initiative.
- Ensure that the emerging petrochemicals workforce has the right experience and skills needed to tackle the challenges that lie ahead and deliver business strategy.

ECHEM has managed to build a truly HR function capable of maintaining our talents across more than ten years of operation. Our priority is to retain close oversight of



employees with most sought-after skills. This allows us to manage all aspects of their career journeys from graduate recruitment to pay and performance management.

We believe that, in order to function in a more sustainable way, it is vital that ECHEM has the right people with the right skills in the right places. Our "Competency Based Management" project is currently underway. Our endeavor is to:

- Develop an effective succession planning model.
- Facilitate the selection and promotional processes.
- Build career formation programs in alignment with shared competencies.

Thinking of human capital as the real investment of any organization, we have taken positive steps towards introducing ECHEM Skills Bank, an information system which processes data of all ECHEM and affiliate employees. Using this data, we continuously model the demography of our workforce to identify the developing skills gap by tapping into our talent pool.

Our key initiatives for implementation over the coming years will add significant value to the organization and its strategic business goals.



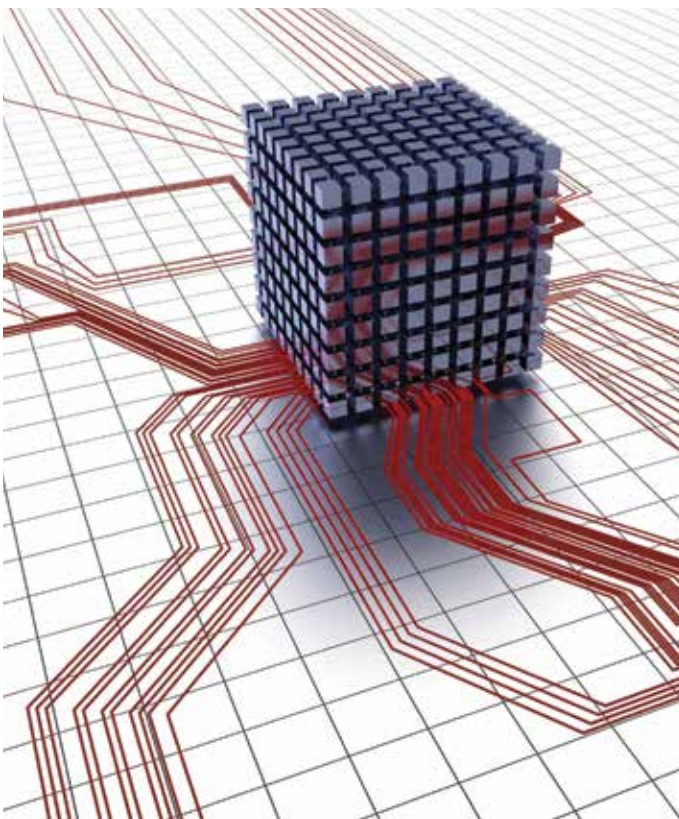
# MANAGEMENT INFORMATION SYSTEMS

Organizational intelligence and knowledge management refer to our capacity to gather information, to innovate, to generate knowledge and to act effectively based on that knowledge.

**AT ECHEM, ONE OF OUR MAIN TARGETS IS TO TRANSFORM INTO A LEARNING ORGANIZATION.**

Clearly, information technology plays a major role in managing organizational change to a knowledge organization and in enhancing and supporting the resulting intellectual capital and knowledge capital. Such organizational intelligence includes inherent historical knowledge and generative intelligence that results from collaboration among company employees and especially management. This intelligence is one of the main factors which lends us competitive edge.

It is in this context that our Information Technology experts function to support all plans for innovation and continued elevation of performance for the organization



and its members.

This is carried out parallel to the everyday services provided for daily operations and employee support including automation of all company activities, increasing web capacities and ensuring easy and secure access to information.

## THE BUSINESS DRIVERS

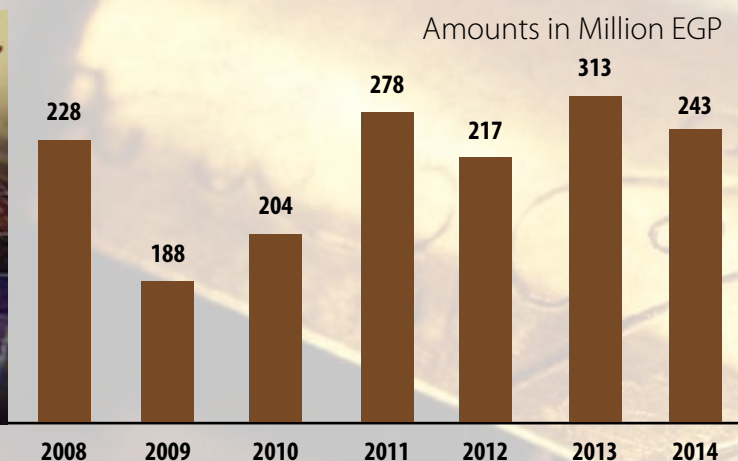
In carrying out our targets, integration seems to show up in almost all business initiatives. There are no single best strategy for integration, ours is driven by the information and business priorities required by the organization and identified from the end user perspective. The integration process touches most domains within our company; it stretches to include Enterprise Resource Planning (ERP), Supply Chains, Logistics, Performance Management, Automation, and any other domain which the company management sees necessary to include.

Our long term vision in this regard is the interoperability, with integration blending into all development activities.



# FINANCIAL HIGHLIGHTS

## Income Before Income Tax



## INCOME STATEMENT (HIGHLIGHTS)

(In Million EGP )	30/6/2013	30/6/2014
Revenue	843	908
Expenses	(530)	(666)
Total Income Before Income's Tax	313	243
Corporate Income Tax	-	(1)
Net Income	313	242

## REVENUE ANALYSIS 30 JUNE 2014



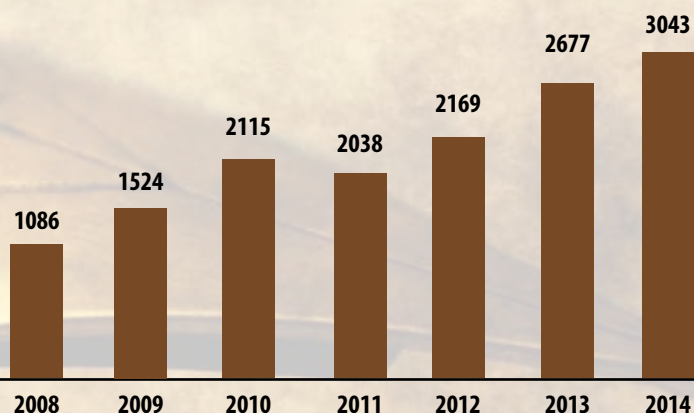


# FINANCIAL HIGHLIGHTS

## A Growth Strategy

The graph shows the development of ECHEM Investment in Companies

Amounts in Million EGP



## BALANCE SHEET (HIGHLIGHTS)

(In Million EGP )	30/6/2013	30/6/2014
<b>Assets</b>		
• Fixed & Long Term Assets	3213	3572
• Cash & Cash Equivalents	81	107
• Accounts Receivable	178	176
• Inventory	4	7
• Other Current Assets	157	281
<b>Total Assets</b>	<b>3633</b>	<b>4143</b>
<b>Liabilities</b>		
• Accounts Payable	29	76
• Accrued Liabilities And Other Payables	505	99
• Current Portion Long Term Debt	53	218
• Short Term Loans	108	114
• Other Current Liabilities	45	83
• Total Non-Current Liabilities	1017	1016
<b>Total Liabilities</b>	<b>1757</b>	<b>1606</b>
<b>Total Shareholders' Equity</b>	<b>1876</b>	<b>2537</b>

## LONG TERM ASSETS

Amounts in Million EGP

