

## Towards Paradigm Shift in Higher Education in the MENA Region

Hayat Al-Khatib  
Associate Professor  
Arab Open University - Lebanon  
E-MAIL: hkhatib@aou.edu.lb  
Mobile: 00961 3028901

### Abstract

Higher education in the Middle East and North Africa (MENA) region has not been able to deliver the needed knowledge and technology transfer, to generate productivity and innovation in this part of the world (Arab Economic and Social Summit, 2009; Thomson and Reuters, 2007). Different priorities specific to each MENA country gave rise to different sets of policies and goals (Booz and Company, 2007). However, youth unemployment in the MENA region remained the highest in the world, with the Middle East rating 21% and North Africa rating 25%, out of whom one third are university graduates (World Bank report, 2013).

Evidence from the MENA region supports the proposition that higher education in the region is not providing graduates with the essential skills that are required for successful employment in the current market economy. Failure to generate new knowledge, transfer of key skills to investment, low productivity and lack of innovation are among the primary indicators.

Recent calls have been made to address the problem in higher education and propose reforms to meet the needs of the MENA countries. Factors of impediment to higher education in the MENA region have been identified in relation to research, resource and funding (Foster, Seth, Lokshin and Sajaia, 2013).

The relationship between research in higher education in the MENA region on the one hand and the impact on development and production on the other is not yet recognized (Al-Khatib, 2012). In most Arab countries there is not much awareness of the benefits of grounding education and

specifically higher education in areas of relevance to the immediate civic society, in order to address its national problems and provide solutions that can benefit the country's economy and attract global investment.

Expenditure on research and development in the MENA region is meager, as compared to research budgets of the developed world (Porta, Arcia, MacDonald, Radyakin and Lokshin, 2011). Resolutions from the 2007 Arab Summit, held in Saudi Arabia, urged Arab Countries to increase expenditure on scientific research to 2.5% of gross domestic product (GDP) within the next 10 years.

Resources of public funding for higher education are limited. Higher education enrolment in the MENA region has increased steadily from 20 to 30% across the region between 2000 – 2008 (World Bank report, 2013). However, public resources remain constrained and public expenditure has not increased at the same rate.

The limited capacity of the MENA region, as reflected from its low productivity and competitiveness, has been correlated with limited infrastructure in technological and communication provision, dated education practices and lack of national strategies to identify national concerns and foster an enabling environment.

There is a need to reform the pedagogy associated with education in the MENA region and to shift the perspective to foster a critical approach that is able to underline the needs of the society and to propose a policy that can address its needs, including technical provision and funding.

International involvement in the MENA region, in the form of incentives and research interest in policies and practice, has focused on higher education in an attempt to redress this failure. New perspectives need to be adopted that can identify opportunities and expand existing capacities

through relevant re-routing that can serve economic growth. The region does not lack human and educational resources, but rather channeling them to support national interests and economic development.

The chapter aims to address issues pertaining to the need to shift perspective in higher education in the MENA region, in the light of its growing importance as a developing entity with natural and human resources. The chapter will attempt to identify the role of higher education, in policies and practice, in addressing the needs of the region and transforming its resources, human and physical, to further its economic development.

*Key Words:* MENA region, higher education, provisions, pedagogy, impediments, human capital and growth.

### Introduction:

The Middle East and North Africa (MENA) region comprises of 19 countries that extend over a vast territory and contain significant wealth of oil reserves, accounting for 31 percent of the world oil production (Global Monitoring Report, 2013). The region has geographical and strategic significance as it manages access routes to the Red Sea, Suez Canal, the Gulf and Mediterranean.

Higher education became the focal point of investment in the oil producing countries of the MENA region and improving policies and practices to maximize its benefit became the next milestone for these countries (UNDP, 2002). Population growth in the MENA region has been paralleled with expansion in primary, secondary and tertiary education specifically after independence (UNDP, 1997).

Recent figures from the MENA region indicate that higher education rates have doubled during the period extending from 1960 to 1995. Statistics confirm increase specifically in primary

education, which soared from 61 percent to 98 percent in the region. In addition, female literacy increased in the region following the spread of higher education (World Developing Indicators, 2013).

The region is making considerable effort in order to be able to face contemporary challenges and compete in the vocational market through enhanced performance and productivity (UNESCO, 2002). Higher education is perceived to contribute to broadening intellectual abilities of learners and increasing their skills in modern technological and market orientations.

Most MENA countries look at higher education as a symbol of national achievement, rather than a financial goal (World Bank, 2013). Higher education is interlinked with development on more than one facet. On the one hand, higher education has been perceived to contribute to increasing the value and efficiency of the workforce. At the social level it was found to mould the working class of the poorer sections of society and create lower middle class that is more self sustained and hence less burdensome on the country's economy (KAM, 2008).

Despite the progress made, the region's current education strategies have not been able to fulfill the aspirations of the region on many accounts. Higher education in the MENA region is unable to provide the cognitive, behavioural and social skills needed to promote new ideas and engage in diverse exchanges. Current practices favour a non-egalitarian distribution of human capital spread because of rural, gender and equal opportunity issues (World Developing Indicators, 2013). The spread of predominantly agricultural rural communities, the uneven distribution of wealth, the limited employment opportunities, and the reliance on public resources, have all contributed to the growing frustration on the inability of the education system, and specifically higher education, to make a difference, help integration in global economies, and meet the expectations of contemporary market trends. Limited specialization offering, slow school to

work transition, low quality basic education and training, mismatch between labour supply and demand, inadequate policies, fragmentation, lack of research and narrow technical provisions are amongst the primary factors that have been identified to contribute to this failure (World Bank, 2013).

In addition, the public sector in most MENA countries dominates the labour market and limits the role of private enterprise, and this does not reflect well on diversifying job opportunities and labour market at the local level. Moreover, utilizing oil revenues efficiently to build industries and facilitate integration in global economy is still in its primary stages in oil producing MENA countries.

Another impediment relates to the limited capacity of the MENA region, as reflected from its low productivity and competitiveness. This has been correlated with limited infrastructure in technological and communication provision, the outdated education practices and the lack of national strategies to identify national concerns and foster an enabling environment. Moreover, the region is still unaware of the importance of research for identifying immediate national needs and proposing solutions (Al-Khatib, 2012). In most Arab countries there is not much awareness of the benefits of grounding education and specifically higher education in areas of relevance to the immediate civic society, in order to address its national problems and provide solutions that can benefit the country's economy and attract global investment. In addition, expenditure on research and development in the MENA region is meager, as compared to research budgets of the developed world (Porta, Arcia, MacDonald, Radyakin and Lokshin, 2011). Recent attempts are starting to identify the link in foreseeing weaknesses and proposing research based solutions. Resolutions from the 2007 Arab Summit, held in Saudi Arabia, urged Arab Countries to increase

expenditure on scientific research to 2.5% of gross domestic product (GDP) within the next 10 years.

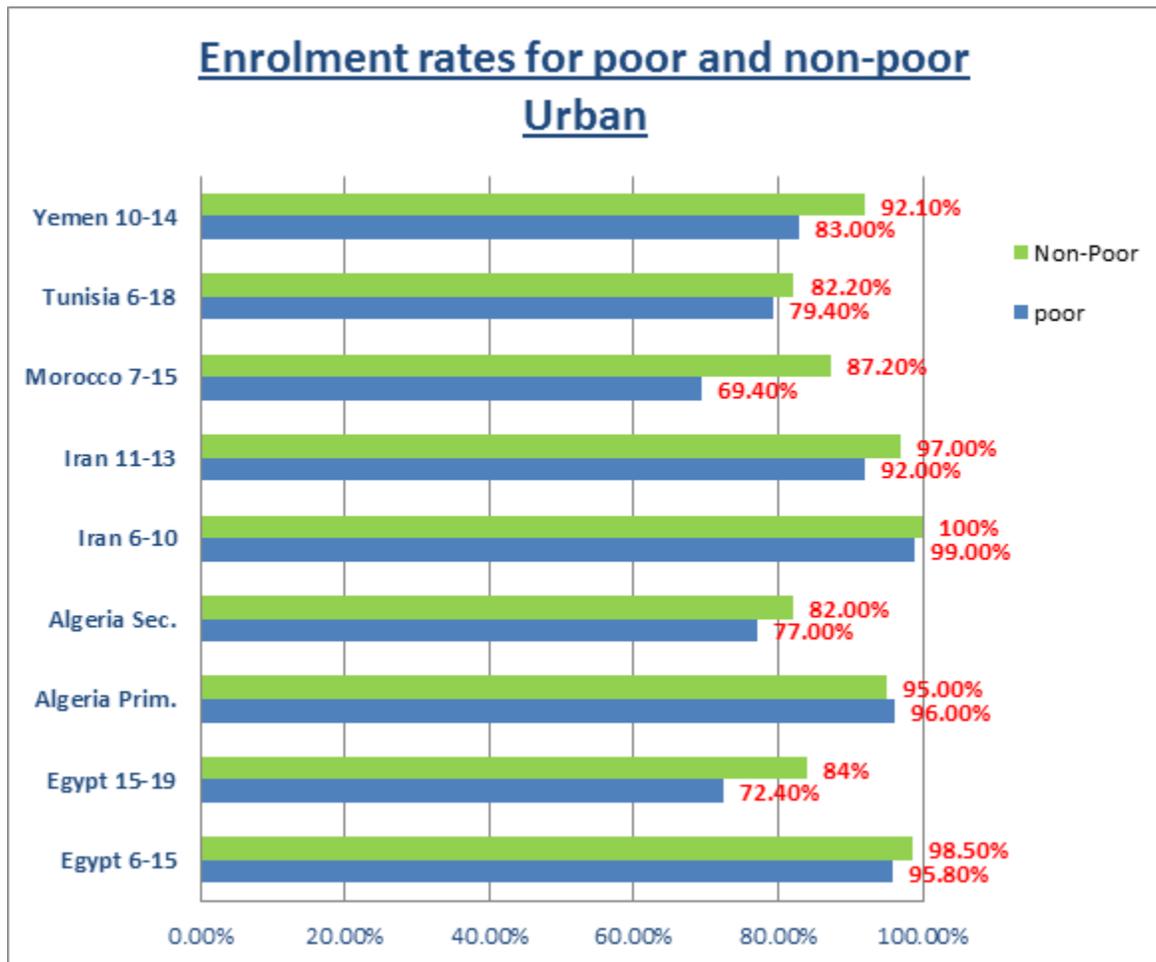
Securing sustainability through funding and resources adds to the problems in the MENA region. On the whole, resources of public funding for higher education in the region are limited. Despite the steady increase in education enrolment in the MENA region from 20 to 30% between 2000 – 2008 (World Bank report, 2013), public resources remained constrained and public expenditure has not increased at the same rate.

For all the above stated reasons, higher education in the Middle East and North Africa (MENA) region has not been able to deliver the needed knowledge and technology transfer, to generate productivity and innovation in this part of the world (Arab Economic and Social Summit, 2009; Thomson and Reuters, 2007). Different priorities specific to each MENA country gave rise to different sets of policies and goals. However, youth unemployment in the MENA region remained the highest in the world, with the Middle East rating 21% and North Africa rating 25%, out of whom one third are university graduates (World Bank report, 2013).

Evidence from recent world bank reports on the MENA region supports the proposition that higher education in the region is not providing graduates with the essential skills that are required for successful employment in the current market economy. Failure to generate new knowledge, transfer of key skills to investment, low productivity and lack of innovation are among the primary indicators (Foster, Seth, Lokshin and Sajaia, 2013).

Recent calls have been made to address the problem in higher education and propose reforms to meet the needs of the MENA countries. Policy of free education for all was enacted in the region in 1950s and 1960s and was applied to all levels of education from basic to tertiary. Education was regarded in many MENA countries as a right, specifically in the Maghreb countries, Egypt

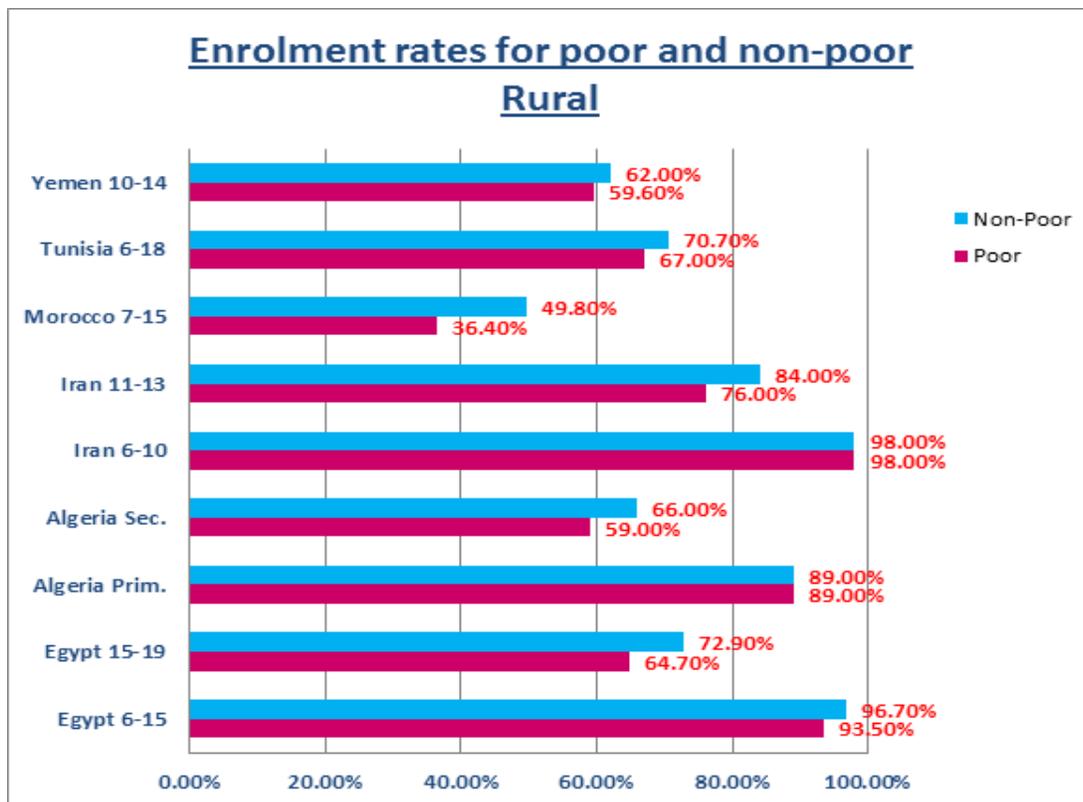
and Syria. However, increasing education inequalities in MENA are revealed through data available on the percentage of enrolment of poor versus non-poor and rural versus urban population in primary and secondary education for the period of 1995-2001 (Thomas, Wang and Fan, 2001). Policies did not always materialize in the practice. Impediments remained in the form of securing resources, divisions between rural and urban, gendered participation ratios and high illiteracy rates.



(Sources: World Bank Various Reports)

There is a need to reform the pedagogy associated with education in the MENA region and to shift the perspective to foster a critical approach that is able to underline the needs of the society

and to propose a policy that can address its needs, including technical provision and funding. International involvement in the MENA region, in the form of incentives and research interest in policies and practice, has focused on higher education in an attempt to redress this failure. New perspectives need to be adopted that can identify opportunities and expand existing capacities through relevant re-routing that can serve economic growth. The region does not lack human and educational resources, but rather channeling them to support national interests and economic development.



(Sources: World Bank Various Reports)

The chapter aims to address issues pertaining to the need to shift perspective in higher education in the MENA region, in the light of its growing importance as a developing entity with natural and human resources. The chapter will attempt to identify the role of higher education, in

policies and practice, in addressing the needs of the region and transforming its resources, human and physical, to further its economic development.

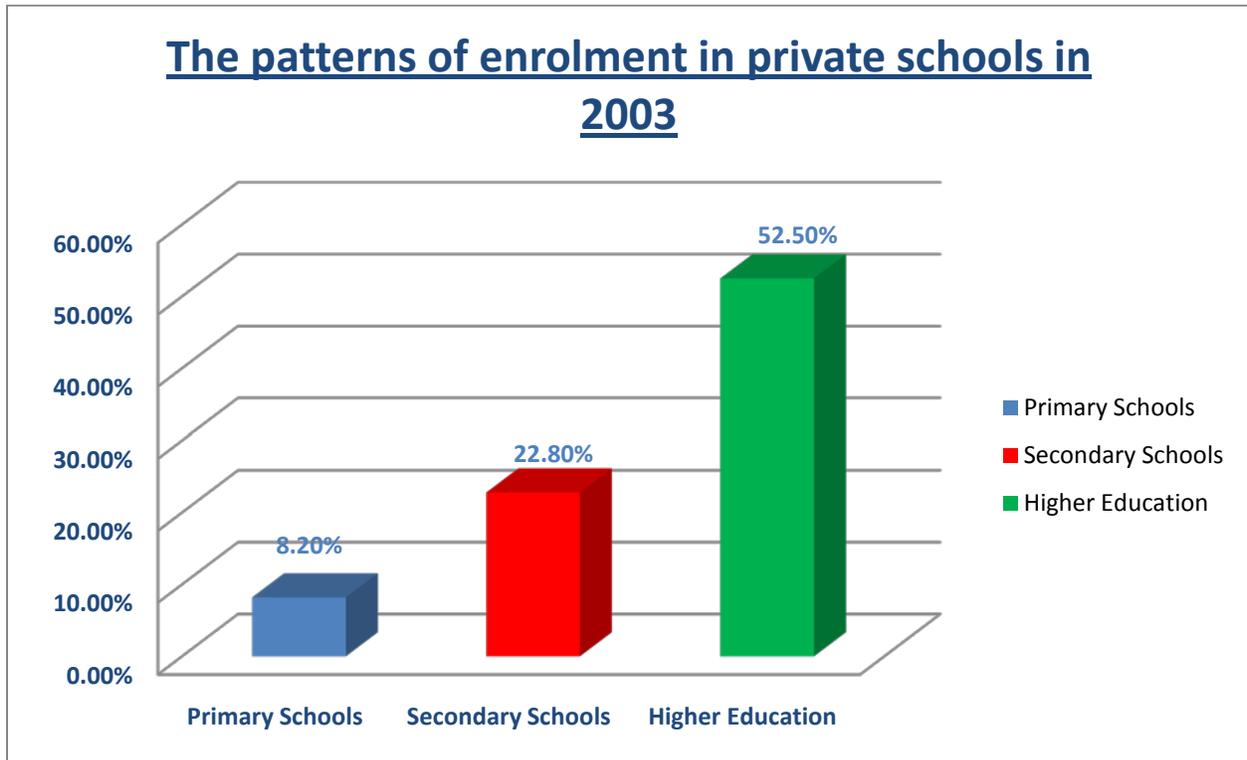
**Infrastructure and changing landscape of higher education in the MENA region**

Economically, the MENA region is mainly divided into oil producing countries such as Kuwait, Saudi Arabia, Iraq and United Arab Emirates and non-oil producing countries such as Tunisia, Egypt, Morocco and Jordan. The division entails different types of infrastructure on the economies of the states in the region and affects national policies and developmental strategies. Oil revenues in the oil exporting countries have been used to accelerate urban growth, economic development and living standards. However, channeling oil revenues to launch industries has not yet materialized despite available funding resources. In non-oil producing countries, efforts concentrated on providing skilled and semi-skilled labour to the oil market in the region. Despite the macro division of the economies of the region, there exists some intra-regional disparities that are reflected in literacy rates to the extent that MENA countries, whether oil producing or not, will need to review their policies and practices in order to invest more in human capital and reduce contemporary challenges and impediments to social and economic development.

Literacy and numeracy are essential as they contribute to developing a work force that is capable of matching the needs of the labour market through adopting new technologies and adapting to new production processes and needs. However, in a general overview, literacy rates are still low in the region as a whole, and higher education suffers from high dropout rates and low achievement scores on international assessment (Abdel Jalil, 2004).

Owing to limited public resources, the region has increasingly relied on the private sector for the provision of education at different levels. The average rate of enrolment in private schools in

MENA (2003 reports) was higher at the basic level than it was in secondary education. The patterns of enrolment in private schools in 2003 was 8.2% in primary schools, 22.8% in secondary schools and 52.5% in higher education.



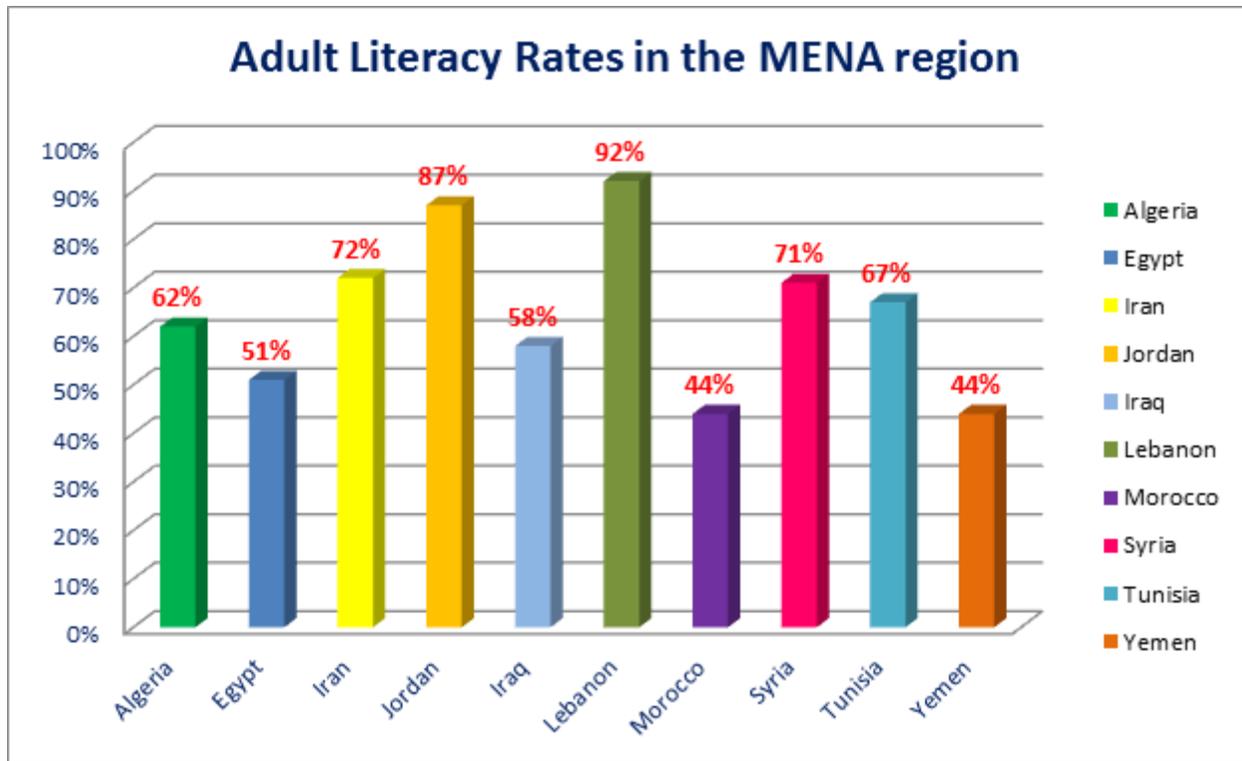
Private education is used as a strategy to mobilize private resources, specifically in higher education. However, this is starting contribute to socially stratifying educational access and increasing the gap between sections of the society.

Efforts targeting gender parity for basic education in the MENA region have produced encouraging results. The area is in need of more progress in relation to illiteracy in adult cohorts, which remains significant among female adult population. Gender parity rates for higher education are higher than they are for secondary education in most MENA countries.

A closer examination of the countries of the MENA region reveals that at the level of secondary education enrolment, almost all have attained gender parity. Only Djibouti, Iraq, Morocco and

Yemen still have secondary education gender gaps. In Algeria, Bahrain, Jordan, Kuwait, Lebanon, Libya, Tunisia, United Arab Emirates, and west Bank and Gaza, gender gap at secondary levels is smaller than it is at primary levels. Only in Djibouti, Iraq and Yemen is the proportion of male students significantly higher than females. In Algeria, Bahrain, Iran, Jordan, Kuwait, Lebanon, Libya, Oman, Qatar, Saudi Arabia, Tunisia, United Arab emirates and West Bank and Gaza female students outnumber male students. By helping reduce disparities among social tiers within the country's economy, higher education can contribute to social and economic cohesion and the overall goals of nation building in the MENA countries.

Graduates of higher education are expected to move upward in the labour market with increased productivity that can eventually contribute to the country's ability to compete at a larger scale. For this purpose, domestic labour markets and external labour markets should balance human capital provisions with labour demand at local and international levels. Policies need to target this balance in provisions of degree specialization and work opportunities, as well as the required orientation and channeling of school graduates in higher education recruitment. MENA economics remain insulated from international competition as the policies set are unable to produce the skills and training needed for the world markets. The region is yet unable to generate sufficient growth to create enough productive jobs for its growing and increasingly educated population. Personnel trainings, management and planning need to be based on the region's needs to help MENA societies progress towards universal participation.



In the developing world, the Middle East and North Africa region face several impediments.

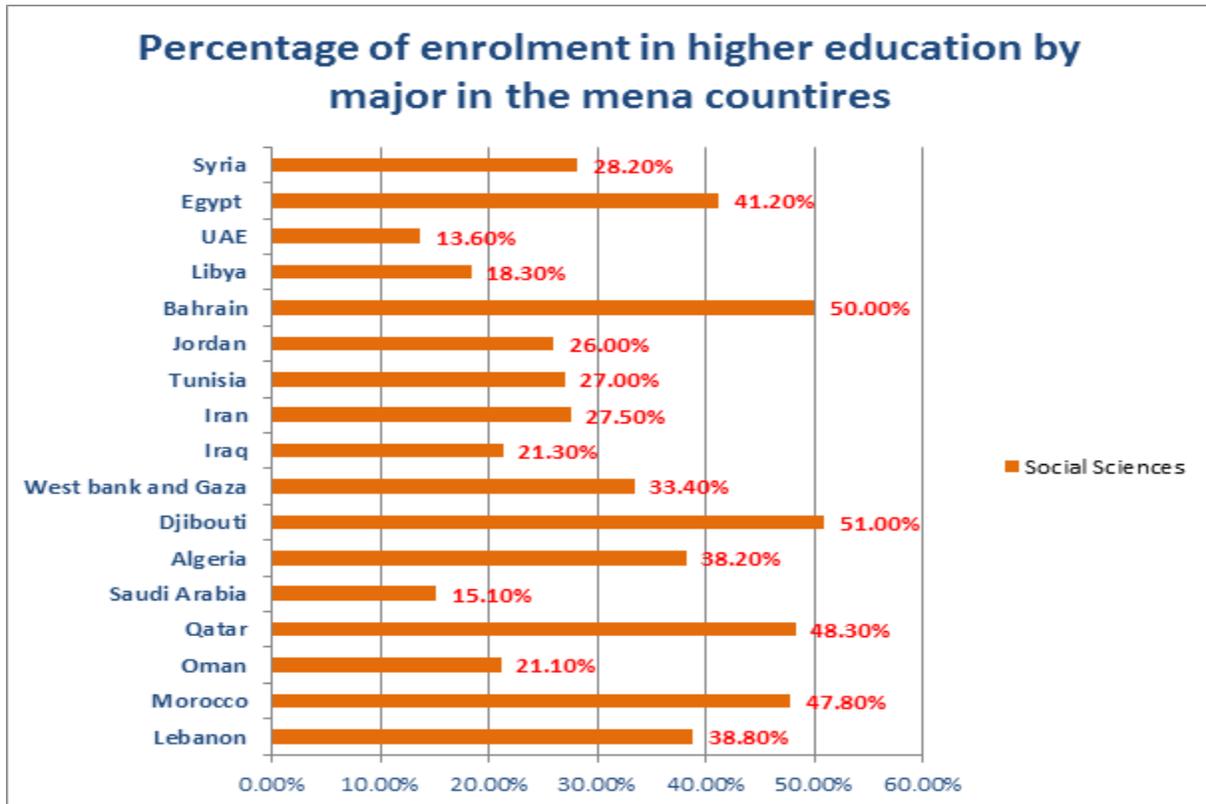
Factors of impediment have been identified in relation to research, resource and funding (Foster, Seth, Lokshin and Sajaia, 2013).

In the MENA region there is a wide gap between what the education system produces and what the region needs in order to achieve its development objectives. Long term planning is meager and higher education students are not guided according to economy requirements and job provisions.

Enrolment ratio in science and engineering in higher education, as compared with enrolment ratios in the humanities and social sciences is one indicator of such observation. Planning different educational specializations need to be decided on the basis of the anticipated industries and the required skills for potential employees.

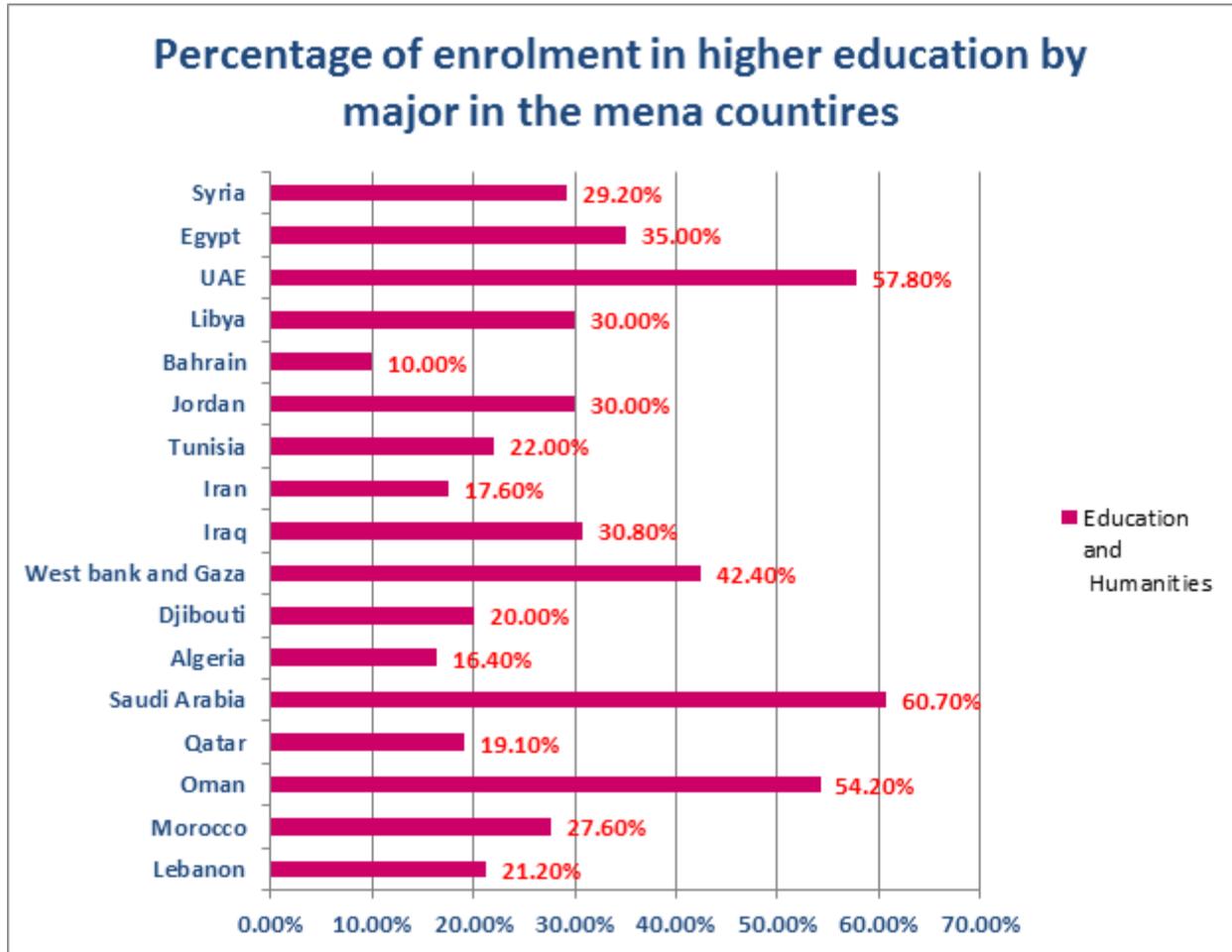
Human capital is not evenly channeled in higher education. The MENA region has a high percentage of university students studying in the fields of humanities and social sciences.

### SOCIAL SCIENCES



(Sources: World Bank Various Reports)

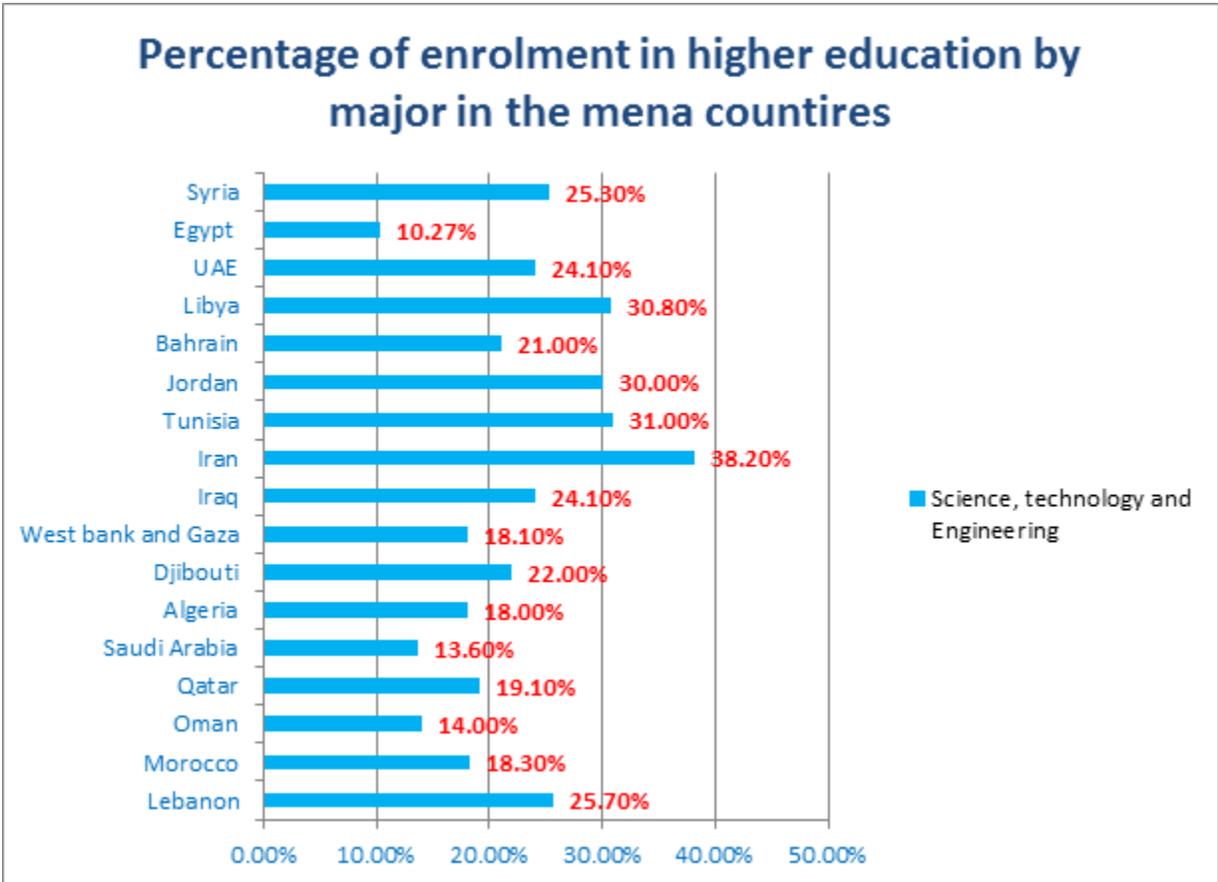
### EDUCATION AND HUMANITIES



(Sources: World Bank Various Reports)

More than 70 percent (two-thirds) of students, in more than one half of MENA countries, are majoring in the fields of humanities, education and social sciences. Higher education students majoring in the humanities and social sciences have followed consistent trends with a policy of absorbing graduates into civil service and government jobs.

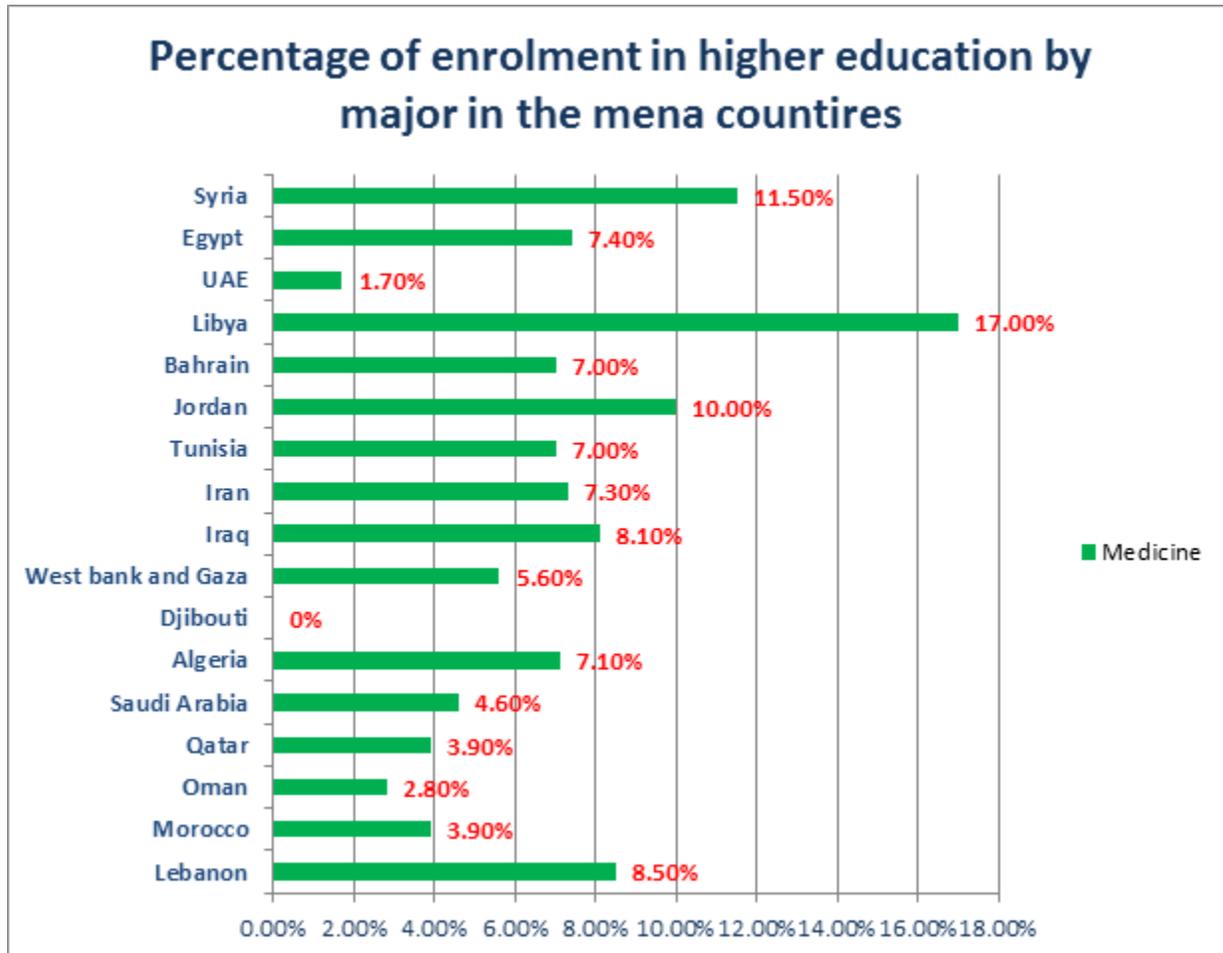
### SCIENCE, TECHNOLOGY AND ENGINEERING



(Sources: World Bank Various Reports)

The modest level of student enrolment in science and technology is partly due to government restrictions on access to these faculties, as in the case of Morocco and Egypt. This is however ill suited for strategic plans and development perspectives that target private initiatives and service sector. Economic growth is perceived to benefit more from scientists and engineers because of the increased importance of technology and science for innovation and development.

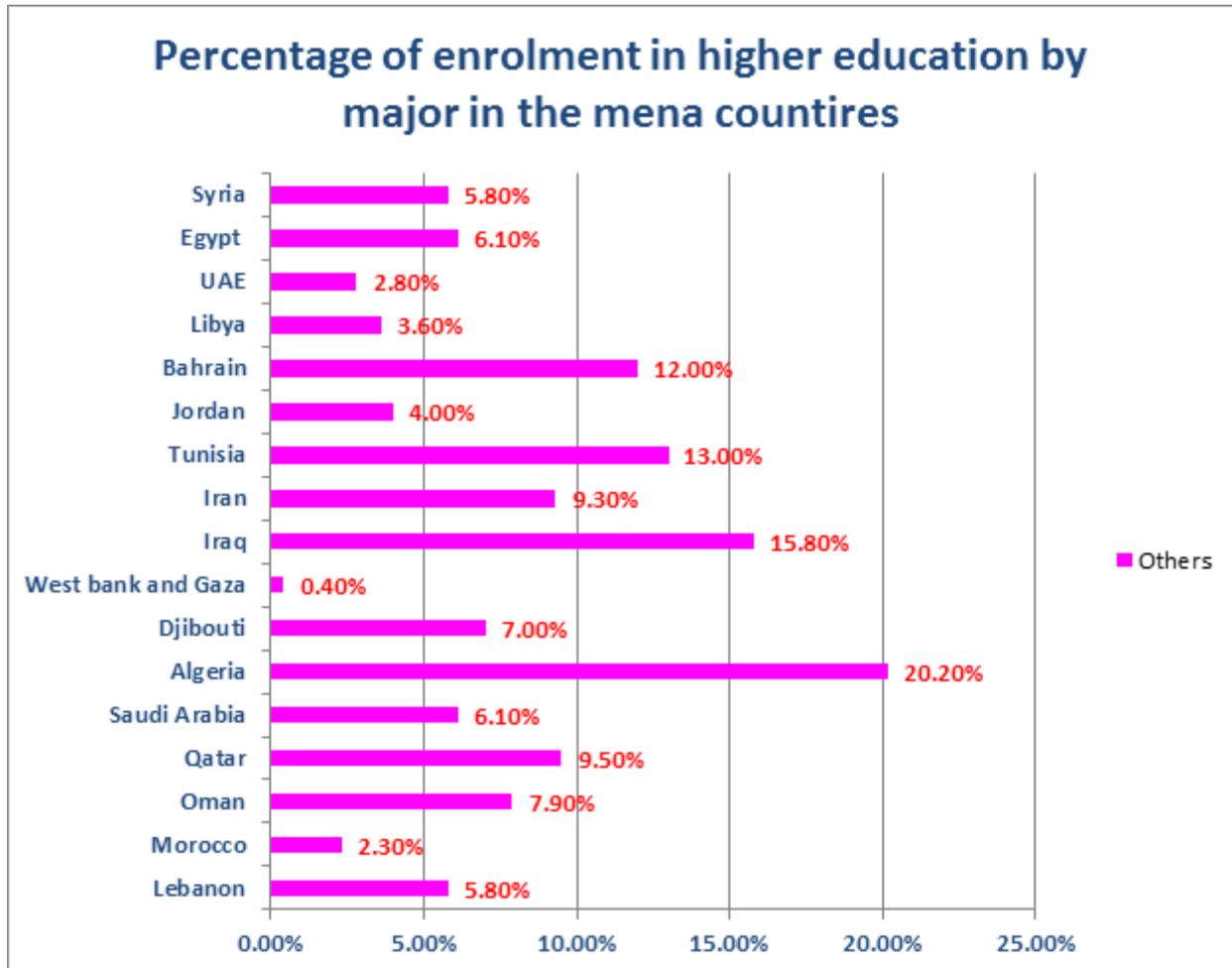
## MEDICINE



(Sources: World Bank Various Reports)

Enrolment figures in medicine are yet less than those in science and technology. The reason may also be related to restrictions on access to these faculties. National policies need to target recruitment in the fields of science, technology and medicine in order to balance graduate supply with market needs.

## OTHERS



(Sources: World Bank Various Reports)

Economic competitiveness with world markets necessitates human resource development. This can only materialize out of tertiary level of education where student achievement can be set against prescribed national and international standards.

## Provisions for Education in the MENA Region

The MENA region has made huge efforts in the previous decades to improve the status of education. So far, the following conditions have been fulfilled in part or whole

### 1. Education and public employment

In the post-colonial period governments in the MENA region assumed control of education and put forth plans to secure that graduates would find employment in the public sector. Free Education was promoted by most leaders as the cornerstone for nation and capacity building. Enrolment at university level significantly increased in the MENA region after independence. States with highest percentages of university student enrolment include Egypt, Syria, Lebanon and Iraq.

### 2. Compulsory Education

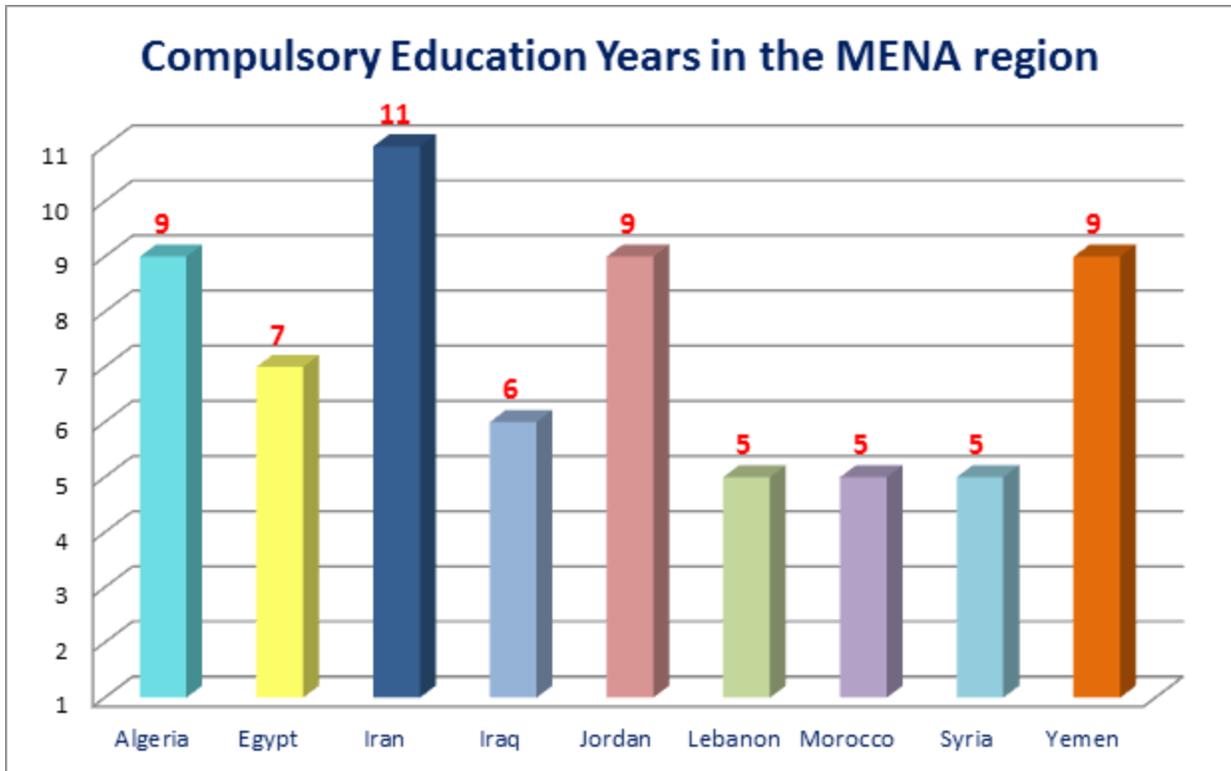
MENA region acknowledges the importance for compulsory education, at least for basic education and makes available free provisions or public education at secondary and tertiary levels (UNDP, 1997; UNESCO, 1998). According to statistics provided by various World Bank reports, Algeria enforces compulsory education for the period of nine years, from the ages of six to fifteen. Egypt implements compulsory education for the period of seven years, from the ages of six to thirteen. Iran applies compulsory education for the period of eleven years, from the ages of six to seventeen. Iraq imposes compulsory education for the period of six years, from the ages of six to twelve. Jordan mandates compulsory education for the period of nine years, from the ages of six to fifteen. Lebanon applies compulsory education for the period of five years, from the ages of six to eleven. Morocco enforces compulsory education for the period of five years, from the ages of seven to twelve. Syria imposes compulsory education for the period of

five years, from the ages of six to eleven. Yemen implements compulsory education for the period of nine years, from the ages of six to fifteen.

Egypt guarantees primary compulsory education for all pupils and the state provides free instruction for all levels. Egyptian law No. 233/1988 mandates eight years of compulsory basic education. Algeria offers the same provision whereby nine years of basic education is compulsory and the state provides free instruction at all levels (1976 Laws on educational reform). In Jordan 1994 law of education and instruction provides for ten years of compulsory and free education. In Lebanon, 1998 law mandates compulsory elementary education. In Morocco, public education is free at all levels and six years of basic education is compulsory. In Syria, according to 1973 Constitution public education is free at all levels and six years of primary education is compulsory. In Tunisia, according to education Reform Law (1991) basic education, defined as nine years, is compulsory.

In Yemen, according to 1992 Education Law, compulsory education targeted nine years of education, however financial constraints reduced enforcing compulsory education to six year.

In Iran, 1989 constitution enforces government provisions for free primary and secondary education for all and targets expanding and diversifying higher education.

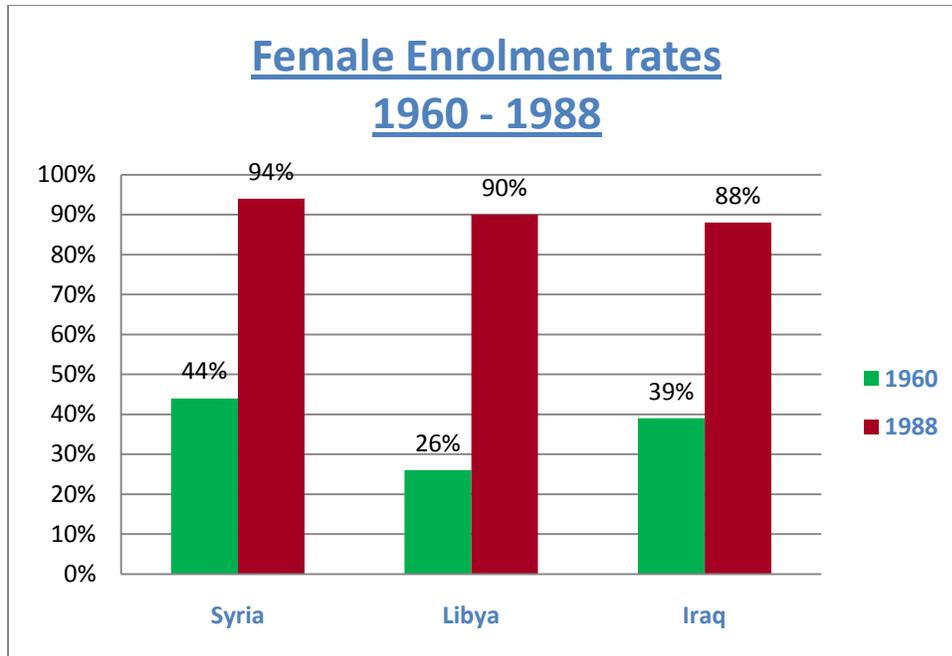


### 3. Female participation

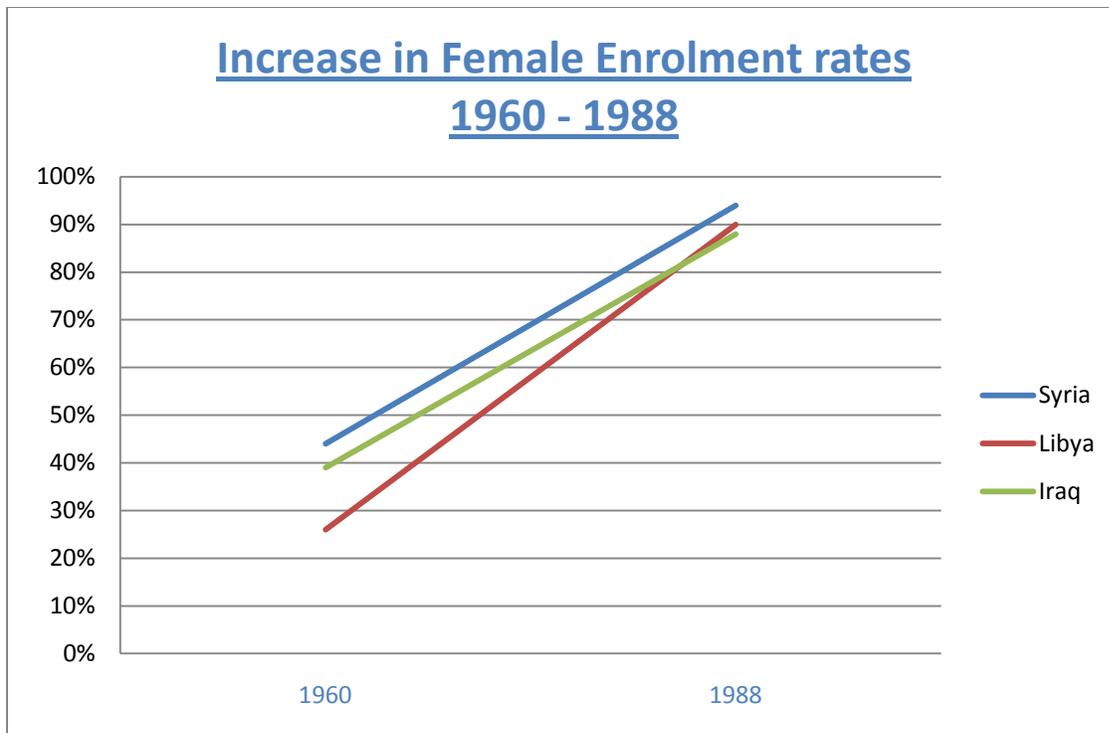
Countries of the MENA region recently focused on encouraging female participation in education. There was noticeable increase in girl enrolment in primary education. The political commitment of governments in the region to reduce gender gap in education progressively for all levels resulted in significant shifts in female enrolment rates.

The Early 1990s witnessed the rise in girl participation in primary education, following the commitment of governments to achieve compulsory education for basic and primary levels.

Rural areas witnessed an increase in girl enrolment in primary schools from sixty to eighty percent by late 1990s.



In Syria, female enrolment rate in compulsory schooling rose from 44 percent to 94 percent in the period following independence, 1960 to 1988. In Libya, there was an increase in female enrolment in compulsory schooling from 26 percent to 90 percent from 1960 to 1988. In Iraq, and during the same interval, girl enrolment rates increased from 39 percent to 88 percent. Female participation in higher education is steadily rising. Female graduates with university degrees started to hold offices in private and public sectors. In addition, female graduates have managed to hold government positions in Tunisia, Iraq, Kuwait and Syria.



However, in the same region, gender gaps remain wide in Yemen, Morocco and Egypt (Heyneman, 1997), with rural areas more affected than urban. In upper Egypt more than 600,000 girls aged from six to ten do not go to school.

In case of availability, education in rural areas is characterized by low quality in terms of resources and available staff. Coupled with socioeconomic difficulties, these constitute the major barrier to basic education in rural areas in the MENA region.

### Impediments to Education in the MENA region

Issues of inclusion and accessibility are at the heart of reforming education in the MENA region. Most MENA countries have not changed their education policies since independence. Therefore, the policies that remain enforced may be outdated and not compatible with the requirements of labour market. Moreover, the financing and delivery procedures have been the same for more than forty years.

Access to education, despite increased enrolment, remains limited to high income groups, residents of urban areas, and boy at the expense of girls. This state of stagnation can explain why the quality of education has not improved much. On the long term, this would cause an increase in the unequal distribution of human capital and hence, diminish the primary role of education as the tool for reducing poverty and enhancing economic growth. The following factors are significant:

### 1. High illiteracy rates

The level of illiteracy in adult population is one of the prominent features of the MENA countries. In 2002, the United Nations Education, Scientific and Cultural Organization reported high illiteracy rates in the Middle East and North Africa region.

According to an Arab League Educational Cultural Organization report (ALESCO, September 2013) illiteracy rates in the Arab world in 2013 totals 97 million adult. To add to the problem, illiteracy has gender stratification in MENA countries. Women vastly outnumbered men in a ratio of nearly 2:1. Figures put more than seventy-five million women as illiterate, and forty-five million man in the MENA area (UNESCO, 2002). In Morocco and Yemen about one-half of the adult population is illiterate (World Bank report, 2003).

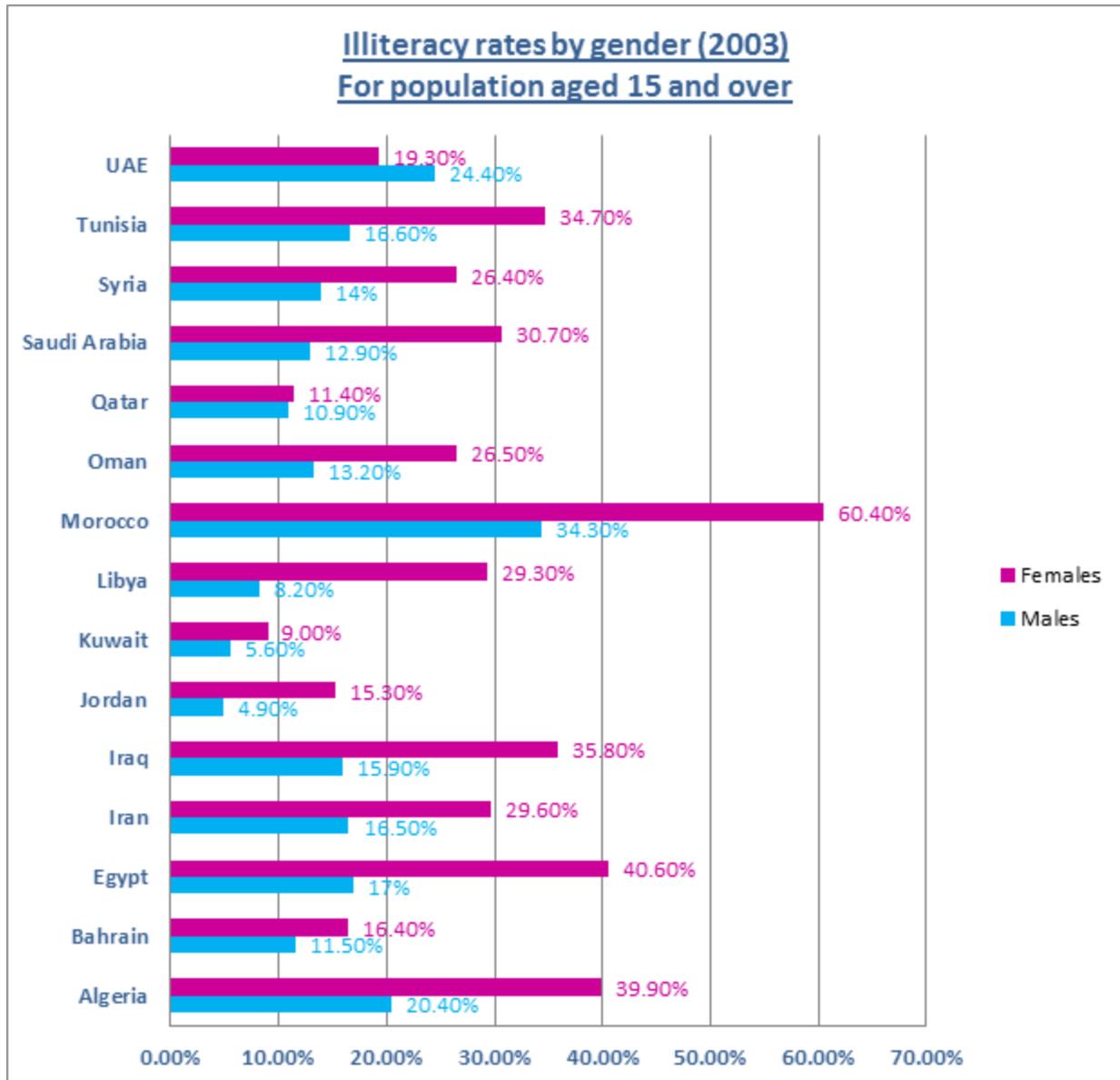
**Illiteracy rates by gender 2003**  
**For population aged 15 and over**

MENA country	Males	Females
Algeria	20.4%	39.9%
Bahrain	11.5%	16.4%
Egypt	17%	40.6%
Iran	16.5%	29.6%
Iraq	15.9%	35.8%
Jordan	4.9%	15.3%
Kuwait	5.6%	9.0%

<b>Libya</b>	8.2%	29.3%
<b>Lebanon</b>	Not Available	Not Available
<b>Djibouti</b>	Not Available	Not Available
<b>Morocco</b>	34.3%	60.4%
<b>Oman</b>	13.2%	26.5%
<b>Qatar</b>	10.9%	11.4%
<b>Saudi Arabia</b>	12.9%	30.7%
<b>Syria</b>	14%	26.4%
<b>Tunisia</b>	16.6%	34.7%
<b>UAE</b>	24.4%	19.3%
<b>Yemen</b>	30.5%	71.5%
<b>West Bank and Gaza</b>	3.3%	12.6%

(Source: World Bank report, 2003).

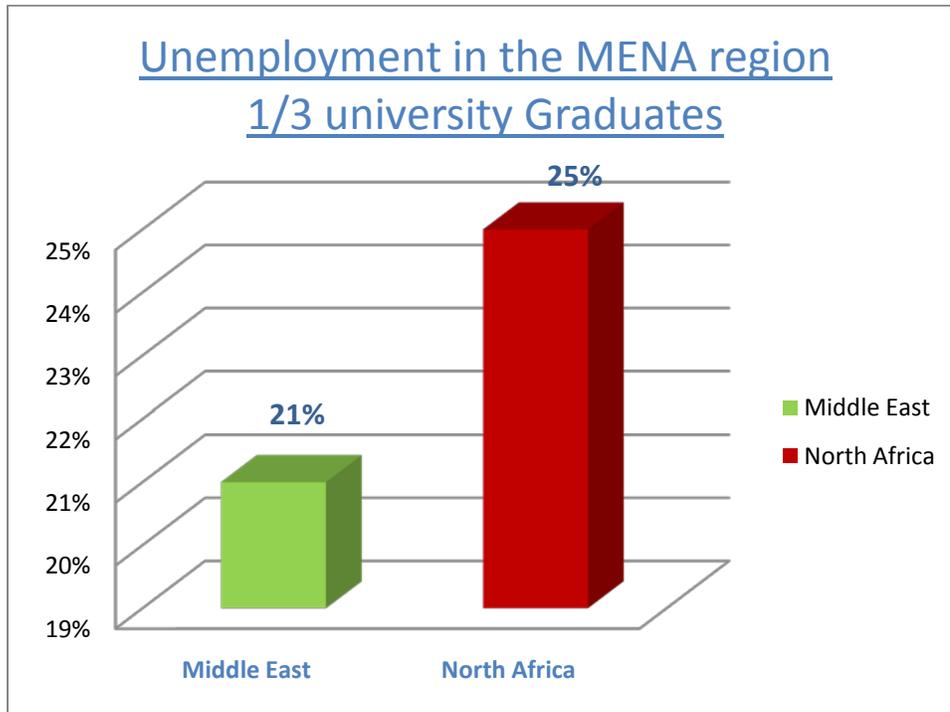
Illiteracy has also geographical features. Rural areas are more affected. Some statistics put literacy rates as high as 10 percent, specifically among female population (World Bank report, 1999). However, despite the alarming figures, national policies that targeted reducing illiteracy resulted in a steady progress and increased literacy levels in MENA countries since 1960s.



## 2. Youth unemployment:

Youth unemployment in the MENA region remains the highest in the world, with the Middle East rating 21% and North Africa rating 25% out of whom one third are university graduates (World Bank Report, 2013). Despite the investment that was made in education in the MENA region, higher education in the Middle East and North Africa region has not been able to deliver the needed knowledge and technology transfer that can contribute to economic growth through

generating productivity and addressing new economic and social needs (Arab Economic and Social Summit, 2009; Thomson and Reuters, 2007).



### 3. Mismatch between supply and demand

Education in the MENA region has not been engaged in evaluative practices to assess labour market needs and incorporate the required skills in the provided curricula. In general, efforts to update and upgrade programmes and modules remain limited. Most lack research foundations that can pinpoint the types of knowledge and skills needed. As a result, there remains a huge mismatch between supply and demand in terms of graduates and market needs.

Education did not appear to have helped graduates gain employment positions regionally. In the absence of studies on the skills provided by the higher education system in the MENA region and those needed by the graduates in the labour market, there will not be a significant change in attempts to link labour supply to the market needs. Evidence supports the proposition that higher

education in the region is not providing graduates with the essential skills that are required for successful employment in the current vocational context.

#### **4. Absence of Quality Control**

Significant absence of independent quality control led to substandard quality in education. The most important areas for regulatory attention are teachers, curriculum and facilities. Some governments in the MENA region are launching independent accreditation boards with authority over aspects of quality control to develop and monitor standards in private education.

Independent accreditation boards can contain a mix of public and private representatives with a clear and defined scope of authority. There is a need to set directives for educational institutions that include the terms of employment, mandatory teacher qualifications, scale, tenure and termination rights, in addition to regulations which control curricular choices in terms of subjects, sequencing and hours. Ministries of education need to keep record to control quality provisions in private and public institutions and monitor practices and liability.

In Jordan, the growing for-profit school sector is subject to regulations mandating use of national text books, exams and teacher qualification standards.

#### **5. Administrative inadequacy**

Most MENA countries adopt a command and control education management structure of the old school in establishing and maintaining education institutions. Such management practice rarely establish result-based incentives to service providers or create links of accountability to beneficiaries. As a result, administrative corruption is wide-spread in the education sector at most levels, and specifically higher education.

The region requires a new futuristic reform that can encourage performance and open venues for public accountability, if investment in education is to contribute to economic growth, better

income distribution and poverty reduction. There is a need for a paradigm shift from “command and control to “coordinate and evaluate” management styles. Education authorities who are used to having control over all input of education development need to move away from monopoly to partnership. They need to learn to negotiate rather than impose. Administrative inadequacies may also take the form of weak sector management that leads to inefficient use of existing resources. In addition, the absence of clear policies and procedures regarding employment, remuneration and termination standards, limit the system’s prospects for efficient operation. In addition, data on categories of expenditure and actual disbursements sufficient to monitor internal efficiency is absent or tampered with.

#### **6. Low research and knowledge foundation**

Research can help identify the required new knowledge that higher education institutions can offer. According to Franklin (2009) out of the total funding of 2 billion dollars worldwide allocated to scientific research, the “lion’s share” goes to the developed countries. In a *UNDP* report (2002) the MENA region was identified by “low research and development for knowledge creation” (p. 7). The amount spent on research and development is the least among world countries, only matched by sub-Saharan Africa. The MENA region spends less than one tenth of one percent of the world’s research and development expenditure. Educational research in the MENA region is much needed in order to identify national themes that can serve specific areas of development in the region.

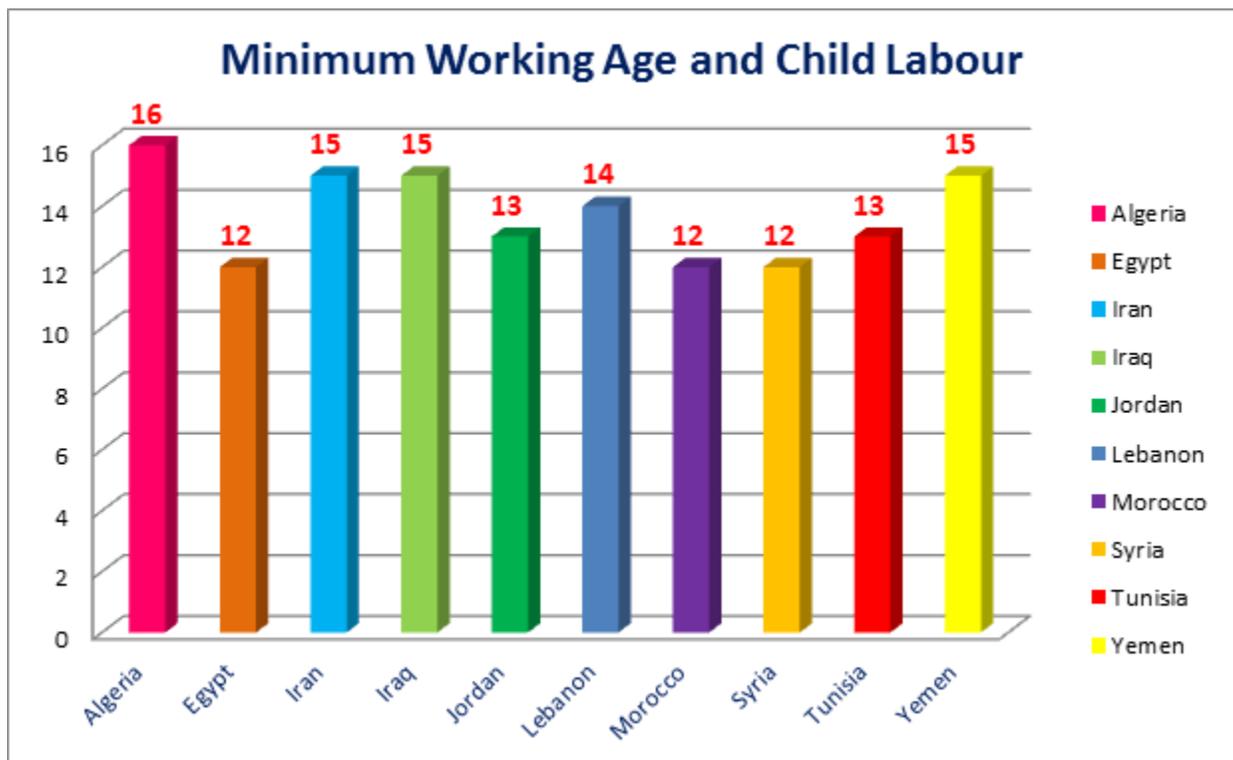
#### **7. Agricultural societies and child labour**

Countries with significant urban population have indicated a significant steady increase in literacy rates. Predominantly rural countries continue to have a remarkably high illiteracy percentage. In rural areas where agricultural work presents direct obstacles to education,

opportunities and costs are weighed unfavourable to child education, specifically in child labour settings.

The poorer rural population of the region relies on child labour in agriculture to contribute to family income and sustenance. Relieving a child labourer to pursue education is not positively viewed in such societies despite compulsory education policies.

Transport and other indirect costs exert additional pressures on poorer societies and result in reluctance to make use of public education provisions. In some areas in the developing world the cost of acquiring books is higher than a family's monthly income (UNISA conference, 2013). Cutting cost of books or finding alternative resources needs to be on the agenda of reforming education in the MENA region.



References: UNESCO (1997). *Statistical Yearbook*. Paris.

UNESCO (1998). *World Education Report*. Paris

## **8. Limited resources and outdated material**

Patterns of education in the MENA region restrict students to one text book per subject in predominantly traditional institutions, at school as well as higher education levels. This implies that learners have one source of information. This approach does not help them develop cognitive skills through comparing perspectives on information, analyzing different viewpoints and formulating independent opinion.

Moreover, in most cases material are outdated and do not target contemporary or national concerns. Therefore, in addition to limited access to higher education, low quality of the unitrack system itself and its reliance on outdated material, the education system is unable to provide the requirements for the development of critical thinking in the MENA societies (UNDP, 2002). In addition, training on digital technologies and professional skills remain inadequate in essence and content, despite being targeted in international funding.

## **9. Rigid teaching and learning methods**

The education system in the MENA region does not encourage the development of cognitive and problem-solving skills. Learners study through memorization and replicated production of material. The applied teaching and learning strategies cause learners to become receiving objects of information and not engage with the learning process. Long term effects of such practices in the education systems can curb independent thinking and action and hence inhibit creativity and innovation. The primary indicators of such failure relate to the inability of the current education system to generate new knowledge, or transfer key skills to investment.

## **10. Lack of access to data**

Information on education policies, practices and problems need to be exchanged to guide a consensus on the needed reforms and unified national strategies. MENA countries do not provide

for public access to information on education. Data on expenditure, learning and labour market are not made available.

Information need to be explicit and available on what is being planned and short and long term effect on curricula and outcome in terms of higher employment opportunities. Such activities need to involve all stake holders of educationists, learners, and the wider community of businesses and families.

Transparency and wider participation should be key goals for the proposed reform plan. Data need to be made available on the extent to which the education system impacts the skills that students need to meet established standards, in all transparency and objectivity. Such control of access to information and data does not help efforts to review effectiveness of practices or propose alternative measures

### **11. Rigid government control**

One of the backlashes of government control of education in the region was the Arabization of education. Students' opportunities to master a secondary foreign language decreased as foreign language offering became limited to secondary levels and not primary stages, e.g. Syria. Other problems associated with government control emerge from attempts to unify diverse education systems, e.g. European style, Islamic, private, public, etc.

In addition, the strictly exam-based system of assessment imposed in the MENA region continue to produce high school graduates who are successful in reproducing memory-based information but are ill-equipped with the skills needed for university level education and future employment.

### **12. Conflict in the region**

Conflicts in the region continue to hamper education and stability. The academic cost of the region's instability is high. In Iraq, according to Strategic Foresight Group Report in 2007, more

than 800,000 children do not attend school, 40% left higher education because of fear of commuting, over 3,000 academics left the country and about 400 academics were assassinated. In Lebanon, statistics relating to 2006 war, identify 33% of civilian deaths to be children, 400,000 were displaced, 40,000 children did not attend school during that year because of the war and 300 schools were destroyed. More recent events in Egypt and Syria produce additional evidence on the effect of war and conflict on displacement of communities and impediments to education.

### Forward looking: the Need for a Paradigm Shift

Reforms in higher education can help introduce notions of social contract to participants and enhance their understanding of commitments and obligations, within social and national network. The education system needs substantial changes and reform to be framed and planned within the requirements of the market needs and the communities of the region, to identify the economic and social needs of the MENA societies and provide appropriate solutions that can contribute to productivity and employability. Based upon the above identified weaknesses and impediments, there is a need to propose paradigm shift aimed at improving education in the MENA region.

Meaningful compulsory education needs to be universal for all children in the MENA region at least in the primary years, regardless of gender, religion, ethnic group or social class. The involvement of the private sector in this proposition is essential on accounts of finding alternative source to public funding and being a major stakeholder able to identify needs and market trends. Private funding can encourage entrepreneurial activities and explore new ways of increasing external grants and contracts. National and regional collaboration is required and the involvement of the private and public sectors to ensure applicability.

The use of modernized teaching strategies, including alternative forms to traditional teaching, can increase access to higher education while providing both qualitative and quantitative enhancement.

Assessment needs to undergo reformation specifically in the basic compulsory education years specified above. Assessment needs to become an evaluative tool for what learners understand as well as can do, rather than a means of denying access to many.

Coherent quality assurance mechanisms of education in the MENA region need to establish criteria of reference to transparent standards and procedures in relation to improving efficiency of current funds, testing curriculum objectives, examination and other assessment, teaching material and classroom teaching practices. The following areas need to be targeted:

### **Research based planning**

In order to be able to adapt to the global open market, governments in the region need to conduct research and encourage the use of statistics and different data analysis tools that aim at uncovering the status of education for both local responsible authorities and international bodies. Such a process can allow for the effective assessment and evaluation of the strength and weakness of education in the region, and prescribe remedial policies and practices. Access to information is another obstacle that needs to be dealt with.

### **Funding and Resources**

Maintaining sustainable financing is another key area that needs to be tackled. In this area, the involvement of private business participation can help find a long term resource, specifically if initial results are encouraging. Budget restructuring may be needed to spend education resources on education goods. The range of options for higher education funding should not be restricted to the public sector. Traditional sources of funding have become insufficient. There is a need to

diversity the revenue base of public education. Fees for specific services such as in-service training or co-financing arrangement may constitute a resource.

Most private sector participation in education provision and finance in the MENA region involves private for profit enterprises. Not-for-profit education institutions are constrained by the lack of facilitating legal, regulatory and accreditation frameworks, particularly for post-compulsory education. To enable the market to move past provision of low quality training, financial opportunities need to be provided to borrow for tuition against future earnings. Most MENA countries devote a large share of their national budgets to education. However, investment and current resources are not used efficiently. Owing to administrative corruption or lack of efficient control, public sector money is sometimes used to pay the salaries of more teachers than those who actually teach. This results in inadequacy in distributing public funding and to ultimately straining public resources.

Higher levels of education have a higher share of private value and should therefore be financed in partnership with families and the private sector. Providing limited, targeted support to spur development may be a more cost effective means to meeting the social demand for higher education than direct public funding and provision. On average, one student in higher education costs as much as ten students in primary education (source). Public sector priorities are set within the available budget. Limited public subsidies need to be made available to enable not-for-profit institutions to compete, based on efficiency and performance standards.

### **Candid Management**

Education management needs to follow transparent and objective plans and answer to accountability. Objectives and strategic paths need to relate in symmetric cohesion. Education plans need to be based on the labour market needs. Involvement of private sector can be an

investment in future labour force that is equipped and knowledgeable, however data should be monitored and open to public scrutiny to curb corruption and ensure sincere outcome. Education development plans need to be based on the specific region's economic environment and national priorities. Plans need to be able to identify, map and implement the needed operations and strategies. Seeking professional advice and assistantship may necessitate resorting to referral services for technical assistance and access to professional consultation and collaboration. Dialogues between ministries and coordinators from the private sector must to be facilitated and included in such plans.

### **Defined standards**

Effective education systems result in students whose academic achievement meets clearly defined standards. Pragmatism is needed to reform education programmes, to phase out and replace dated material and to monitor the overall progress and efficiency of the education system and the students.

Systems must be able to identify the skills needed for market employability and the weaknesses which impede graduates' smooth integration into regional and global markets. Continuous evaluation needs to be conducted on programmes and learning outcomes with a view of introducing what is lacking and incorporating current trends and requirements.

### **Staff selection**

In the MENA region, teachers are not selected for their competence, creativity and teaching performance. In the best cases they are filtered on the basis of their educational record of attainment. Salary scales predominantly do not recognize levels of experience, for the larger cohort. This negatively affects proactive improvement in the quality of teaching. An effective

solution would be to introduce continued appraisal mechanism and a system of penalty and reward to encourage improving the quality of education and teaching performance.

### **Alternative Forms of Education**

Although differences among countries are large, the MENA region is characterized by declining student to teacher ratios and high repetition rates. The problem multiplies with streaming and tracking options that limit flexibility. Demand for places in higher secondary and tertiary education is growing beyond the capacity of available public funds. Considering alternative forms of education delivery particularly at the secondary and tertiary levels deserves attention, e.g. AOU.

If the education programme at primary and intermediate levels succeeds in creating independent learning, distance or open education delivery methods can provide a solution for access to higher levels at much lower costs per student while maintaining high quality standards. In the MENA region there is not much experience with these methods. Partnerships can be formed to exchange experience and knowledge. Policy makers, researchers and practitioners need to collaborate through networks in order to be able to discuss and exchange information that may lead to improving education. Such networks may need to start at the local level to set national themes and project goals and then spread across the region with a focus on capacity building for planning, analysis and management during project implementation.

### **Assessment and evaluation**

Assessment and evaluation need to be a continuous process. Reform measures need to be based on assessment of results at various levels. Input on textbook availability, number and type of trained teachers, absenteeism, development, strategic plans, annual progress reports, etc, are needed to broadly identify the required system changes. Rigorous and regular conscientious

assessments need to be made on what learners are learning at different levels and within specific subject areas, compared with goals and learning outcomes. In addition, in order for a comprehensive review of higher education practices and policies to take place and provide strategies and plans for improvement, learners need to be involved in the reformation. Communities of learners need to be engaged in the reviewing of best experiences, methodologies, technologies, in order to be able to contribute to the holistic analysis of educational problems from the recipients' perspective.

### **Physical and operational provisions**

The MENA region lacks school resources and operational mechanisms that can facilitate fulfilling educational goals. In addition to profit oriented assignment of text books, these are organized in ways that do not consider the students' varying educational capabilities. Making available open or supported educational resources and coordination between curricular objectives, mechanisms used by teachers, and appropriate selection of assessment material can contribute to conveying a functional and manageable educational system.

### **Training and support**

Training and support need to be provided for graduates in the form of supplementary and continuing education programmes. These should not approach learners with the same rigid and theory-based content of the traditional curriculum. Rather the focus of such programmes needs to be reoriented to target applied aspects that are required for different specializations. Despite extensive campaigns by universities and centres that advertise and promote continuing education programmes, the content and material associated with such programmes remain predominantly lacking in the needed skills and orientations.

### **Incentives**

Reforms need to target salary scales to provide incentives for teachers, training and development opportunities. The market and the clients need to have some ways to measure the relative worth of the education service, and then providers may be motivated to take part in funding. Using incentives can change the behavior of educators and providers of the education service in the region.

Resource including financial provisions need to be made to allow for competitive recruitment as well as curriculum and textbook revisions. Moving to incentive-based management of the education system may require establishing monitoring systems and regulatory authorities to ensure transparency and accountability in conducting transactions and affairs and quality in processing and delivering results.

### Conclusion

The paradigm shift in education in the MENA region need to focus on motivating the stakeholders involved as well as improving the process. Policies need to ensure the ultimate provision of significant development impact. Public accountability needs to be a primary concern that can lead to improving trust in the system for the wider community and hence increase support for the proposed reform plans.

Education outcomes need to be directly matched with the labour market demands to avoid wasting human capital in unemployment or under matched offerings. New plans for higher education reforms need to twin-track closing the gap between the supply of graduates and labour market and at the same time attempting a new approach to education reform.

The new approach to education reform has three main foundation requirements:

- 1) Research and technical provision which ensures the right schemes and inputs are in place and are used efficiently.

- 2) Incentives to promote better performance and responsiveness from participants involved in providing educational services.
- 3) Transparency and public accountability to ensure that education, as a public provision, serves the wider public.

The reform strategy need to include continuous stages of evaluation and assessment to monitor the achievement of the set goals and the impediments meriting intervention.

If the above are well formulated and implemented, higher education can move up to face the new challenges and diverse demands they face.

A prospective paradigm shift in education shift should have economic and non-economic outcomes. The immediate impact of investment in education is concerned with human capital accumulation and growth. However, this investment would have an indirect impact on the quality of life, poverty reduction and human development. The correlation has been established earlier in other developing countries, specifically with indices on the spread of education among female population.

The countries of the MENA region got off to a late start in investing in human capital through formal schooling. However, at present almost all countries in the region educate their children, boys and girls, at the primary level and a significant percentage to secondary and tertiary level. Illiteracy rates have been significantly reduced. Most countries in the region are near to achieving gender parity in education.

However, notwithstanding this improvement record the MENA region lags behind East Asia and in some aspects Latin America in terms of the level, quality and distribution of human capital.

The average number of schooling years in the MENA region is below both regions by more than one year. Literacy rates in the region are still low. The problem is especially acute in Yemen,

Morocco, Algeria and Egypt. Moreover, because of the very low levels of initial enrolment of women, female illiteracy is even higher. Oil states, despite their very high average income per capita, seem to provide, on average, lower quality education than most other MENA countries. These differences influence the role of human capital in achieving economic growth and the distribution of its benefits in each country.

There is a need to launch quality assurance mechanisms that can contribute to assessing education process and its effectiveness, in order to monitor the proposed changes or set goals. Such units can involve universities and researchers as well as private businesses and wider community. Access to information needs to be made available to inform the decisions that will be made.

In the MENA region, quality assurance units can be formed in partnership with education research groups and can collaborate with existing networks that have similar goals such as the Arab League Education Culture and Science Organization (ALESCO), the Islamic Education Science and Culture Organization (ISESCO), The United Nations Educational, Scientific and Cultural Organization (UNESCO) and The United Nations' Economic and Social Commission for Western Asia (UN-ESCWA).

### ***References:***

- Akkari Abdel Jalil (2004). Education in the Middle East and North Africa: the current situation and future challenges. *International Education Journal*. Vol 5, no. 2.
- Al-Khatib, H. (2013). "Innovations in Learning and Development", *Journal of Learning for Development JLAD*, Commonwealth of Learning.

Al-Khatib, H. (2012). "The Research Needs of the Civil Society and the Private and Public Sectors in the Letters and the Humanities". *Proceedings of the Fifth Scientific Conference of the Lebanese University and University de Lyon*. Beirut 19-20 October 2012.

Arab Economic and Social Summit. (2009). Kuwait, 19-20 January.

*Capital for the Future, Saving and Investment in an Independent World*. (2013). World Bank series. Global development Horizons.

Emilio Porta, Gustavo Arcia, Kevin MacDonald, Sergiv Radyakin and Micha Lokshin (2011) *Assessing Sector Performance and Inequality in Education*. World Bank series.

Franklin, J. (2009). *What Science Knows and How It Knows It*. New York. Encounter Books.

James Foster, Suman Seth, Michael Lokshin, Zurab Sajaia. (2013) *A Unified Approach to Measuring Poverty and Inequality: Theory and Practice*. World Bank series.

Global Monitoring Report (2013). Joint publication by World Bank and International Monitoring Fund.

Stephen Heyneman. (1997). The quality of Education in the Middle East and North Africa. *International Journal of Educational Development*. Vol. 17, No. 4, pp.449-466.

Tait, A. *Plenary Address*, University of South Africa Conference, 28 September – 3 October 2013.

Thomson Reuters Annual Report (2007).

United Nations Development Programme (UNDP). (1997). *Human Development Report*. New York

United Nations Development Programme (UNDP). (2002). *Arab Human Development Report*. New York.

United Nations Educational, Scientific and Cultural Organization (UNESCO). (2002). *Financing Education Investments and Returns; Analysis of the World Education Indicators*. Institute for statistics.

United Nations Educational, Scientific and Cultural Organization (UNESCO) (1998). *World Education Report*. Paris

World Bank Knowledge Assessment Methodology (KAM) (2008). World Bank series.

World Developing Indicators (2013). World Bank series.

World Bank (1994 A) *Republic of Tunisia: Secondary Education Support Project\_13245* – TUN  
Washington DC.

World Bank (1994 B). *Republic of Yemen: Education Sector Investment Project\_ 12461* – YEM.  
Washington DC.

World Bank (1995). *Hashemite Kingdom of Jordan: Second Human Resources Development Sector  
Investment Project\_13790* – JO Washington DC.

World Bank. (1996). *Arab Republic of Egypt: Education Enhancement Program. 15750* – EGY.  
Washington DC.

World Bank. (1998). *Lebanese Republic: Vocational and Technical Education Project. 17273* – LE.  
Washington DC.

World Bank (1997A). *Democratic and Popular Republic of Algeria: Growth, Employment and Poverty  
Reduction.* Washington DC.

World Bank (1997B). *Quality Education For ALL: Embracing change in the Middle East and North  
Africa.* Marakesh forum, Morocco.