2013

OER in Saudi Arabia

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POERUP Report

May 2013

Contents

Overview

The **Kingdom of Saudi Arabia** (المملكة العربية السعودية) is located at the crossroads of Europe, Asia, and Africa in the southwest corner of Asia with widespread coastlines on the Arabian Gulf (560 km east) and the Red Sea (1,760 km west). The total population is 29,195,895 people, and 19,838,448 are Saudis, according to the Population Census of 2012.
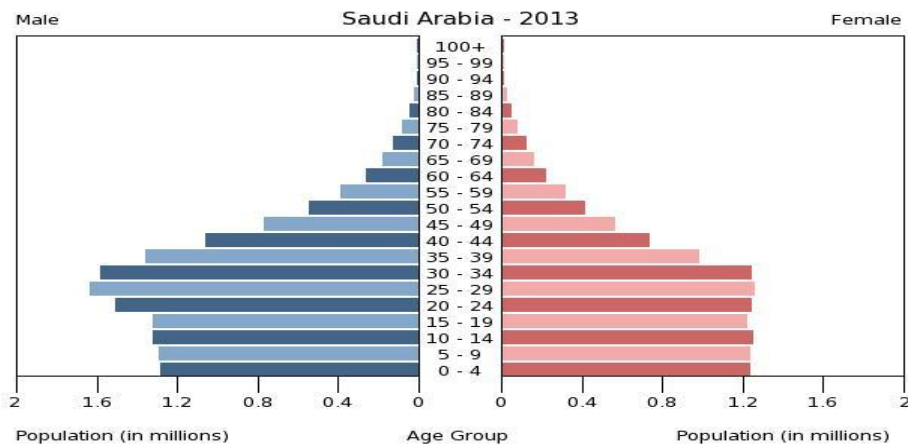

Population Pyramid Graph: Sourced from:
http://www.census.gov/population/international/data/idb/populationPyramid.Region.php?2013|SA|1627519.00|Saud i%20Arabia%20-%202013

The Kingdom of Saudi Arabia is an Arab Muslim state with a royal system where the sons and grandsons of King AbdulAziz al Saud, the founder of Saudi Arabia, hold the power of ruling the country. Riyadh is the capital city located in the central province, while Mecca and Medina, the two holy cities of Islam, are in the western province.

According to the Human Development Index (HDI) in the Human Development Report, Saudi Arabia's HDI value for 2012 is 0.782 which ranked Saudi Arabia 57 out of 187 countries based on three dimensions of human development: healthy life, access to knowledge and a decent standard of living. The HDI for Saudi Arabia increased from 0.575 in 1980 to 0.782 in 2012.

According to the Global Competitiveness Index (GCI) in 2009-2010, Saudi Arabia joined the top 30 countries in the world, ranked 28 among 133 countries involved in the report of the World Economic Forum (The Global Competitiveness Report 2009-2010). This report is based on 12 pillars of competitiveness: Institutions, Infrastructure, Macroeconomic stability, Health and primary education, Higher education and training, Goods market efficiency, Labour market efficiency, Financial market sophistication, Technological readiness, Market size, Business sophistication, and Innovation.
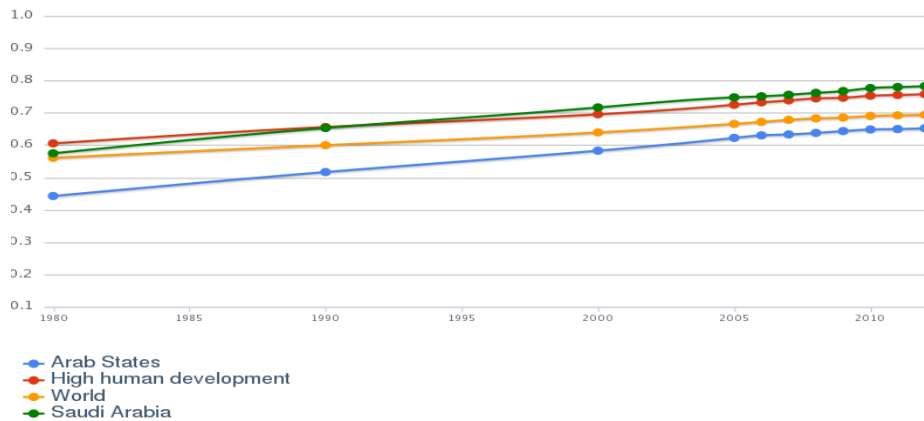
Human Development Index (HDI): 1980-present: Sourced from:
http://hdrstats.undp.org/en/countries/profiles/SAU.html

In Saudi Arabia, the processes of development in all aspects of life started with the inception of the five-year development plans four decades ago. In 2010, the *9th Development Plan (2010-2014)* was approved with an overall budget nearly SR 1.4 Trillion ($400 billion) to speed up the development process and enhance the Kingdom's position within the global economy to grasp the vision of a knowledge-based economy. Oil revenues help to fund the implementation of these plans as Saudi Arabia is a leading exporter of oil.
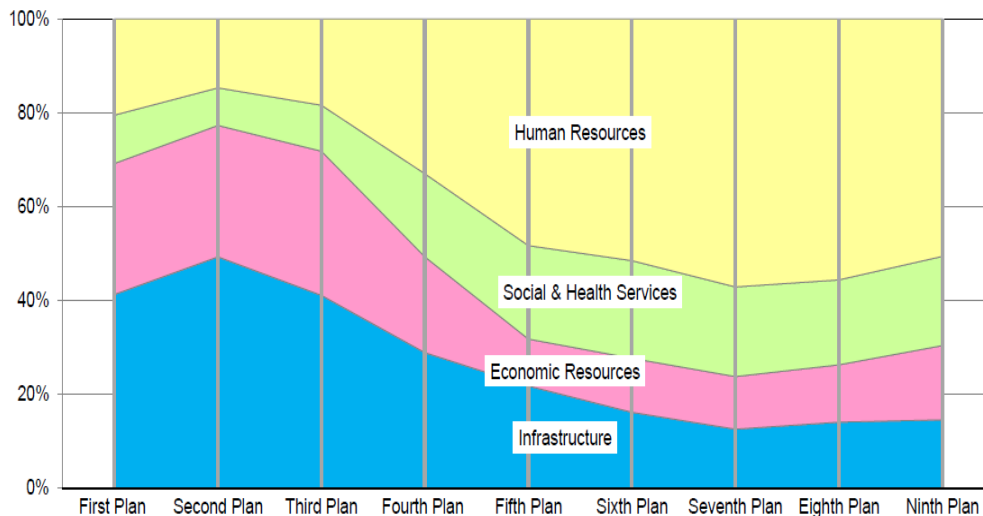
Structure of Government Expenditure 1970-2014: sourced from: http://www.mep.gov.sa/

For Further Information see:

- Central Department of Statistics and Information, http://www.cdsi.gov.sa/
- United Nations Development Programme: International Human Development Indicators, http://hdrstats.undp.org/en/countries/profiles/SAU.html
- Ministry of Economy and Planning, http://www.mep.gov.sa/
- World Economic Forum, http://www.weforum.org/

ICT Infrastructure and Use in Saudi Arabia

The development of the IT sector has gone through several stages since 1926 when King Abdul-Aziz issued the royal decree for the establishment of the Posts, Telegraphs and Telephones (PTT) Directorate. Nowadays, according to UNESCO, Saudi Arabia is already the largest telecommunications market in the Middle East and North Africa (MENA) region:

- In 1926, wireless stations were installed to connect the entire Kingdom with telegraph services.
- In 1934, there were 854 lines of manually-operated telephones only in 5 main cities.
- In 1952, the Ministry of Communications was established.
- 1975, a royal decree was issued for the establishment of the Ministry of Posts, Telegraphs and Telephones (PTT) to be in charge of both sectors of posts and telecommunications.
- In 1984, the first fibre optic network was operated.
- In 1986, King Fahd Satellite Communications City was operated to establish connection with the world.
- In 1995, the mobile phone service began.
- In 1996, the fibre optical cable network and the Very Small Aperture Terminal (VSAT) service started.
- In 1998, a royal decree was issued to establish the Saudi Telecom Company to be in charge of the provision of telecommunications services.
- In 1999, it was the official launching of the internet services.
- In 2001, a royal decree was issued to establish the Communications and Information Technology Commission (CITC) to regulate the affairs of the sector.
- In 2003, a royal decree was issued to change the name of the Ministry of Posts, Telegraphs and Telephones to the Ministry of Communications and Information Technology (MCIT).
- In 2006, the Universal Access and the Universal Service Policy of ICTs was approved by MCIT. To read the document see:
  http://citc.gov.sa/arabic/RulesandSystems/Bylaws/Pages/TheUAUSPolicy.aspx
- In 2007, the *National Communications and Information Technology Plan (NCITP)*, which was prepared and revised by MCIT, was approved.
- In 2007, the Badir Programme for Technology Incubators was established by the King Abdul Aziz City for Science and Technology (KACST). It is a comprehensive national programme that seeks to activate and develop technology business incubators, and it is open to all Saudi entrepreneurs. Its first incubator was launched in 2008 which was *BADIR-ICT* (information and communications technologies). Nowadays there are 4 different incubators and 23 incubated projects (total number was retrieved on 04/05/13).

According to NCITP, the long-term vision for ICT in the Kingdom of Saudi Arabia is the following:

> *The transformation into an information society and digital economy so as to increase productivity and provide Communications and IT services for all sectors of the society in all parts of the country and build a solid information industry that becomes a major source of income.*

According to the document of the Universal Access and the Universal Service Policy of ICT, the Government of Saudi Arabia considers access to ICT for all segments of society to be an essential element of its development strategy, and visualises the ICT sector as a driving force for the development of the economy, the enrichment of social and cultural aspects, as well as the overall national development. The vision, objectives, and the mechanisms of the policy, are described in a document, written in both Arabic and English, at: http://citc.gov.sa/arabic/RulesandSystems/Bylaws/Documents/LA_007_A%20The%20Universal%20Access%20and%20Universal%20Service%20Policy.pdf

The *8th and 9th Development Plan* relied on the NCITP to realize the development objectives for the future of the information society, since the NCITP also includes policies and projects needed to develop ICT in different sectors, such as in e-commerce, e-Government, e-learning, and e-health. For the objectives and policies of NCITP, see http://www.mcit.gov.sa/english/NCITP/AboutNCITP/ .

Among 144 countries, Saudi Arabia is in the 31st place on the Network Readiness Index 2013. This rank

> *is driven mainly by a fall in the cost of using ICTs (65th), a strong government effort to expand the amount and quality of available online services (19th), and the creation of an environment in which citizens can increase their participation to support government (22nd). The government's clear vision of the potential of ICTs to modernize and diversify the local economy (7th) has resulted in a fairly well developed ICT infrastructure (36th) that, together with a business-friendly environment (25th) and despite the still-cumbersome process for starting a business (102nd), provides the right ingredients for properly leveraging ICT and obtaining significant positive economic (42nd) and social (18th) impacts. Moving forward, skills development—by improving the quality of the educational system, especially for math and science (37th), and by boosting educational enrolment, especially at tertiary level (70th)—should become a priority. This would expand the local pool of talent and contribute to the transition toward a less resource-dependent and more knowledge-intensive economy (59th)*

> *(The Global Information Technology Report, 2013, p. 28)*

Sourced from:

- E-Government Portal, http://www.saudi.gov.sa/
- Ministry of Communication and Information Technology (MCIT), http://www.mcit.gov.sa/
- Communication and Information Technology Commission (CITC), http://citc.gov.sa/Arabic/Pages/default.aspx
- United Nations Development Programme (UNDP) – Kingdom of Saudi Arabia, http://www.undp.org.sa/
- Global Information Technology Report 2013, http://www.weforum.org/reports/global-information-technology-report-2013
- Badir Program for Technology Incubators, http://www.badir.com.sa/en/

Education in Saudi Arabia

In the early era of Islam, and until formal and organized education started in Saudi Arabia after unification, education was taking place in *Kuttabs* (classes), *Halaqa* (in mosques), and scholars' houses.

The formal and organized system of education in Saudi Arabia started in 1925. Since the beginning, the educational system has been a centralized, gender- segregated, free, and has state financial support. The educational policies in Saudi Arabia are based on a religious belief that education is an obligation for every Muslim, male or female; therefore, attention is given to facilitating the learning process, with a wide spread of schools and other educational institutions in a country of 2,149,690 sq km.

Education is mainly controlled by the Ministry of Education, Ministry of Higher Education, and the Technical and Vocational Training Corporation. Other sectors, such as the Ministry of Defence and Aviation, the National Guards Presidency and the Ministry of the Interior, do provide education for their employees and their children.

General Education

In 1925, the Directorate of Education was established which transformed to the **Ministry of Education (MoE)** in 1953 to develop and supervise general education in the Kingdom. In 1960, the **General Presidency for Girls' Education** was established as an independent authority to manage and supervise girls' education. This presidency became part of the Ministry of Education in 2002.

General education in Saudi Arabia consists of four stages:

- Kindergarten Stage: is not a compulsory for enrolment in Year 1 at the elementary stage, and is mostly provided by the private sector, but there has been an increase participation and interest of public sector since the royal decree 7/B/5388 of 2002

which had directed the MoE to develop a strategic plan and time schedule for gradual growth of this stage throughout the Kingdom.

- Primary Stage: lasts for 6 years and starts at age 6.
- Intermediate Stage: is a three years stage.
- Secondary Stage: is also a three years stage. In the first year, students share a common curriculum. In the next two years, they have to choose between scientific and literary streams.

There are also other general education services:

- Private and International General Education: started in 1938 and plays an important role in providing general education since then. According to government figures, in 2008, the number of students enrolled in private general education was 483.756 students which constituted 10% of the total students in general education in the same year. 41.4% of all students enrolled in private general education were at primary stage.
- Adult Education: started officially in 1954 by establishing the General Directorate of Adult Education and Literacy by the MoE. It admits students with no age limit.
- Special Needs Education: was officially started in 1959 when the first blind institute called AlNoor Institute was established in Riyadh, the capital of Saudi Arabia. In 1962, the MoE launched the Directorate of Special Education to provide education for blind, deaf, and intellectually disabled people. Since its establishment, it had been through different changes in title, objectives, and authorities, before settling down finally under the authority of the MoE, and providing special education for those with special needs, whether they are disabled or talented.

Enrolment in general education institutions increased from 536,409 male/female students in 1969/1970 to 5.04 million in 2009/2010, at an average annual growth rate of 5.8%. The number of public schools increased from 3,098 in 1969/1970 to 33,280 in 2010 (29th Issue of Achievements of Development Plans, 2012).

The Technical and Vocational Training Corporation (TVTC)

This was established in 1980 to join all the training institutions in Saudi Arabia, which were distributed between three governmental authorities, the MoE (industrial, agricultural and commercial secondary schools), the Ministry of Labour and Social Affairs (vocational training centres), and the Ministry of Municipalities and Rural Affairs (assistant institutes).

According to the 29th Issue of Achievements of Development Plans (2012), there are now 36 technical colleges for boys, 9 technical institutes for girls and 98 vocational training centres.

Higher Education

This sector started in 1949 with one college, the **College of Shari'ah and Islamic Studies** in Mecca, which became the **Umm Al-Qura University**. Then, the **King Saud University** in Riyadh opened in 1957, and was followed by five more institutions, opened in 1961, 1963, 1967, 1974, and 1975 respectively. As a consequence, a royal decree was issued in 1975 to establish the **Ministry of Higher Education** (MoHE). Since then, higher education has received huge budget allocations to supervise, plan, and coordinate higher education. The financial allocations for higher education in the latest development plan, the 9th Development Plan, amount to SR 200.2 billion. There are, now, 25 public universities, which are geographically distributed throughout the Kingdom, and connected to the MoHE, but with a high level of independence.

In 1997, the Council of Ministers issued a decree to enable the private sector to establish **non-profit educational institutions** to support the role of the public universities. Now, there are 9 private universities and 21 private colleges.

The number of students enrolled in higher education institutions increased from 571.8 thousand students in 2004, to about 759.9 thousand students in 2008, at an average annual growth rate of 7.4%. Consequently, the number of higher education graduates increased also, at an average annual growth rate of 7.9%. Furthermore, the numbers of postgraduate students increased from 11,335 students in 2004 to 17,855 students in 2008, at an average annual rate of just over 12.0% (*9th Development Plan*, http://www.mep.gov.sa/). Accordingly, Saudi Arabia ranked 72 among 133 countries based on its higher education enrolment, in advance of Brazil and South Africa, and ranked 60 based on the quality of its educational system, in advance of Italy and Portugal (Global Competitiveness Index (GCI), 2009-2010).

King Abdullah Foreign Scholarships Programme (KAFSP)

This is designed to be of great support for public and private sectors of higher education. It is a foreign scholarships programme, through which students are sent to the best universities around the world to continue their studies at the following levels of education: Bachelor degree, Master degree, Doctoral degree, and Medical fellowship. A royal decree was issued in 2005 to launch this programme for a period of five years. At the beginning, a group of male and female students were sent to USA, and then the programme was broadened to include several advanced countries in different fields of specialisations, to fulfil the needs of the labour market in Saudi Arabia. After the completion of the first five years, a renewal of the programme was approved in 2010. The total number of graduates of the programme reached 47000 males and females up to 2013. Recently, a third phase, 5 years more, was approved by King Abdullah.

Sourced from:

- Ministry of Education (MoE), http://www.moe.gov.sa/
- Technical and Vocational Training Corporation (TVTC),
  http://www.tvtc.gov.sa/Arabic/Pages/default.aspx
- Ministry of Higher Education (MoHE), http://www.mohe.gov.sa/
- Ministry of Economy and Planning, http://www.mep.gov.sa/
- Achievements of the Development Plans, Facts & Figures 2012,
  http://www.mep.gov.sa/themes/GoldenCarpet/index.jsp;jsessionid=B5FB647BA3AF
  4FA1AD7D4DF90671A643.beta#1367263315393
- UNESCO, http://www.unesco.org/new/en/education
- UNEVOC, http://www.unevoc.unesco.org/worldtvetdatabase1.php?ct=SAU
- World Economic Forum, http://www.weforum.org/
- King Abdullah Foreign Scholarships programme (KAFSP),
  http://www.mohe.gov.sa/en/aboutus/Institutions/Pages/Emission-of-the-outer.aspx

E-Learning in Saudi Arabia

The Saudi government is constantly raising the budget and allocations of education. These high budgets lead to several online learning initiatives in all sectors of education.

E-Learning Initiatives in General Education

The National Centre for Educational Information

This was launched to enable the Ministry of Education to provide the best educational services through reliable, efficient, and effective technology. Among its projects are:

- *Educational Management System (Noor)* Project: <u>*achieved*</u> –
  https://noor.moe.sa/Noor/login.aspx
- *System of Administrative and Financial Affairs* (*FARIS*) Project: <u>*under construction*</u>
- *ENJAZ* Project to build an integrated work environment, a unified, effective, and safe way to automate and manage office-based work through the use of the best technologies in this area and most sophisticated: <u>*under construction*</u>
- *EduMap* System to build a geographical database of existing public and private schools using GPS. This system helps the MoE to achieve appropriate management and maintenance: <u>*achieved*</u>
- *Distance e-Meetings* Project, designed to supply all meetings halls at the MoE as well as the General Directorates of Education throughout the Kingdom with high quality and efficiency equipment to facilitate distance e-meetings: <u>*achieved*</u>
- *Service Directory* Project to develop a comprehensive directory of IT services and mechanisms in the MoE and General Directorates based on the global best practices: <u>*under construction*</u>

- *Networking* Project is considered one of the very important strategic projects through which a large number of sites belong to the MoE and the General Directorates in different regions through IP VPN. It, also, aims at connecting a large number of remote schools, which are not reached by the internet, via satellite VSAT. Moreover, it enables all schools in the Kingdom to be linked to the MoE via the Internet and empowers these schools with network access and use of standard systems such as FARIS, Noor and EduMap: <u>under construction</u>
- *Installation of Computer Labs and Learning Resources Centres* Project contributes to the teaching of computer subjects and develops modern technology: <u>achieved</u>
- *Monitoring and Analysing Events Centre* Project to discover any attempts of system penetration, analyse events, and issue security reports for the MoE: <u>achieved</u>
- *Supplying and Installing Anti-Virus Software* Project: <u>achieved</u>

The National Centre for Educational Information also provides services such as: email, software, technical support, and technical training for all sectors belonging to the MoE.

King Abdullah bin Abdul-Aziz Public Education Development Project (Tatweer)

One of the main goals of Tatweer is to employ ICTs to develop teaching and learning, and provide training and professional development to achieve the mission of the project.

The MoE portal

This provides a list of e-services for employees and parents. As the MoE has a portal, each directorate has a portal http://www.moe.gov.sa/pages/ministryguide.aspx. Also, most of the schools have their own websites.

E-Learning Initiatives in Technical and Vocational Education:

An **E-Learning and Training Resources Centre** (http://www.elearning.edu.sa) has been established by the Technical and Vocational Training Corporation (TVTC) in 2007, to develop an appropriate environment for the integration of ICTs in the training process at the TVTC by providing electronic interactive content and digital resources for both trainer and trainee. Among the services and initiatives provided by this centre are:

- Using Blackboard as a curricular management program for the TVTC.
- Using Respondus Program as the examinations program for the TVTC.
- Using Course Genie to be the training content design program for the TVTC.
- Provide necessary infrastructure and refurbishment of equipment.
- Training programmes on e-learning.
- Digital resources.
- Virtual laboratory for safe and available technical training using Automation Studio.
- E-libraries (Ebrary Project).
- E-learning Gate.

E-Learning Initiatives in Higher Education:

Widespread development plans are being implemented across the Kingdom of Saudi Arabia in all sectors and fields, and higher education represents one of the most important means of developing human resources in Saudi Arabia. Therefore, a lot of e-learning projects and initiatives have been launched, including the following:

- The **National Project Horizons** (*Afaq* in Arabic) was launched in 2005 as a strategic plan for the future of higher education over the following 25 years, to develop a comprehensive plan for higher education. Among its main objectives are to: provide high-speed Internet-based communications network, produce and publish digital information content, and continue infrastructure development to encourage the implementation of e-learning and distance education.
- The **National Centre for e-Learning and Distance Learning** (NCeL) was created in 2006 as a main support of e-learning.
- The MoHE created deanships of information technology at higher education institutions to enhance the movement towards e-learning.
- The establishment of **King Abdullah University for Science and Technology** (KAUST) in 2009, http://www.kaust.edu.sa/.
- The University e-Learning Excellence Award scheme (http://award.elc.edu.sa/en). It includes six different awards: excellence award for digital courses, excellence award for implementing LMS (universities), excellence award for designing digital content (faculty), excellence award for of e-learning training programmes, excellence award for e-learning scientific research, excellence award for innovation in e-learning practices (universities and faculty).
- **International Conference of e-Learning and Distance Education**, as well as the Discussion Panels hosted by the National Centre for E-Learning and Distance Learning. For further details check the following link:
  http://portal.elc.edu.sa/portal/?q=en/events.
- **Tajseer Project**, to support and help higher education institutions to implement the most recent and up to date technologies.
- **Jusur**, an LMS designed by NCeL in order to manage the e-Learning process in the kingdom of Saudi Arabia.
- The **Saudi Centre for Support and Counselling** (SANEED) to provide support and guidance to all beneficiaries of e-learning in higher education. This centre won the 2011 "Best New Call Centre" across all Arab countries.
  http://www.mohe.gov.sa/en/news/Pages/5june_2011.aspx
- **MAKNAZ**, an electronic national repository has been built to facilitate the process of developing, archiving, retrieving, reusing and sharing of learning objects.
- **Saudi Digital Library** (http://portal.sdl.edu.sa/english/), one of the most prominent projects inaugurated by the NCeL. It provides sophisticated information services, as

well as providing digital information resources in various forms, and making it accessible to faculty staff, researchers and students in higher education. It has the largest gathering of e-books in the Arab world.

- **Training Programmes Project**, which aims to provide training to faculty members and technical staff in the Saudi universities in the area of e-learning and its applications.

- **QanaTech Project** (http://qanatech.elc.edu.sa/), one of the services of the NCeL, which aims to enrich the Arabic content through a safe educational environment. Members are encouraged to upload Arabic educationally relevant videos, make constructive comments, use the rating system to show appreciation for videos of value, and flag inappropriate videos.

- The MoHE has made over 200 different types of e-services available within different systems (http://www.mohe.gov.sa/en/E-Services/Pages/default.aspx) to help facilitate the National Plan for Communication and Information Technology, for the MoHE's employees, students, applicants King Abdullah Foreign Scholarship Programme, students exchange programme, and government institutions.

For further details and more projects of the MoHE see the following document which is the Ministry of Higher Education's **Plan to Achieve Excellence in Science and Technology**:

http://www.mohe.gov.sa/ar/Ministry/Deputy-Ministry-for-Planning-and-Information-affairs/The-General-Administration-of-Planning/Documents/plans_to_achieve_excellence.pdf

Sourced from:

- The National Centre for Educational Information,
  http://www.moe.gov.sa/itagency/Pages/default.aspx
- King Abdullah bin Abdul-Aziz Public Education Development Project (Tatweer),
  http://www.tatweer.edu.sa/
- E-Learning and Training Resources Centre – TVTC,
  http://www.tvtc.gov.sa/english/departments/departments/elearning/Pages/default.aspx
- MoHE, http://www.mohe.gov.sa/
- The National Centre of e-Learning and Distance Learning (NCeL),
  http://portal.elc.edu.sa/portal/
- ICDE – International Council for Open and Distance Education,
  http://www.icde.org/filestore/Resources/Handbooks/e-LearningAndDistanceEducation.pdf

Open Educational Resources (OER) in Saudi Arabia

Open Access in Saudi Arabia

In the age of the information explosion, Saudi Arabia has positively engaged with the movement of Open Access. As a result, five open access journals from Saudi Arabia are listed in the Directory of Open Access Journals (total number retrieved on 02/05/13), as follows:

1. Annals of Saudi Medicine (http://annsaudimed.net/), published by King Faisal Specialist Hospital and Research Centre.
2. Journal of Family and Community Medicine (http://www.jfcmonline.com/), an official publication of the Saudi Society of Family and Community Medicine published by Medknow, part of Wolters Kluwer Health, one of the largest publishers of peer-reviewed open access academic journals published on behalf of scholarly societies and learned associations.
3. Saudi Dental Journal (http://www.sdj.org.sa/), published by the Saudi Dental Society.
4. Saudi Journal of Anaesthesia (http://www.saudija.org/), an official publication of the Saudi Anaesthetic Association published by Medknow, part of Wolters Kluwer Health; and now in PubMed.
5. Synergies Monde Arabe (http://gerflint.eu/publications/synergies-monde-arabe.html), published by GERFLINT.

In the Registry of Open Access Repositories (ROAR), Saudi Arabia has a list of six repositories (Total number retrieved on 02/05/13) while there are actually five, as one of them (Makhtota) is listed twice, once in Arabic and once in English. On the other hand, in the Directory of Open Access Repositories (OpenDOAR), there is a list of five repositories (Total number retrieved on 02/05/13):

1. KAUST Digital Archive (http://archive.kaust.edu.sa/kaust/) of King Abdullah University of Science and Technology (KAUST).
2. KFUPM ePrints (http://eprints.kfupm.edu.sa/) of King Fahd University of Petroleum & Minerals (KFUPM).
3. King Saud University Repository (http://repository.ksu.edu.sa/jspui/) of King Saud University (KSU).
4. Umm Al-Qura University Reference Repository (http://eref.uqu.edu.sa/) of Umm Al-Qura University (UQU), but this repository is no more accessible, and researches could not find any trace of it or reason for the unavailability. It seems that it has been replaced by UQU digital library (King Abdullah Digital Library https://uqu.edu.sa/lib/digital_library/en) through which one can search, browse, and access full text of UQU Journals Articles (787 articles on 02/05/13), Manuscripts database accessible online (4919 manuscripts on 02/05/13), Saudi and Arabic Dissertations (only titles, abstracts, and table of contents are accessible but readers

can contact the author or the library to get the full text), e-books (only titles, cover, introduction, and index accessible online).

5. Makhtota (Manuscript http://makhtota.ksu.edu.sa/MakhtotaEnglish.aspx) is a database for handwritten books before the printing era. This database has been established by King Saud University (KSU) and it contains more than 11 thousand manuscripts.

OpenCourseWare Consortium

King Fahd University of Petroleum and Minerals (KFUPM) has joined the leading universities in the Middle East as a member of the OpenCourseWare Consortium, as well as Alfaisal University, a private institution, in 2009 (http://ocw.mit.edu/about/media-coverage/press-releases/mideast/). KFUPM provide two online platforms; the first to publish courses which are not meant for giving credits, degrees, or certificates, and the second to openly share instructional content. On the other hand, Alfaisal University launched the MIT OpenCourseWare mirror website and was the first educational institution to host MIT OpenCourseWare materials in the Kingdom of Saudi Arabia and the wider region (http://www.youtube.com/watch?v=3EHL7OrcWt0). Although there is an evidence of the initiative from MIT and Alfaisal University, the link to this mirror website is not functioning anymore.

Open Access Journals

In addition, King Abdulaziz City for Science and Technology (KACST is an independent scientific organization linked directly to the Prime Minister, it is the Saudi Arabian national science agency and its national laboratories) with its partner, Springer, launched six international scientific journals since 2011 on six different technologies (Water, Oil and Gas, Petrochemicals, Nanotechnology and Biotechnology, Energy). These Journals are the first 100% Open Access scientific journals on these topics, which are both free to read and free to submit. These journals are:

1. Applied Water Science, http://link.springer.com/journal/13201
2. Journal of Petroleum Exploration and Production Technology, http://link.springer.com/journal/13202
3. Applied Petrochemical Research, http://link.springer.com/journal/13203
4. Applied Nanoscience, http://link.springer.com/journal/13204
5. 3 Biotech, http://link.springer.com/journal/13205
6. Materials for Renewable and Sustainable Energy, http://link.springer.com/journal/40243

Beside the international scientific journals, there are other publications of KACST http://www.kacst.edu.sa/en/about/publications/Pages/default.aspx which have open access:

- Sciences and Technology Magazine, http://stm.kacst.edu.sa/
- International Nature Magazine: Arabic Version, http://www.kacst.edu.sa/ar/about/publications/Pages/nature.aspx
- Journal of Science and Technology for Teens, http://www.kacst.edu.sa/en/about/publications/Pages/teen-Journal.aspx
- Books, http://www.kacst.edu.sa/en/about/publications/Pages/books.aspx
- Booklets, http://www.kacst.edu.sa/ar/about/publications/Pages/booklets.aspx
- Annual Report, http://www.kacst.edu.sa/en/about/publications/Pages/annualreports.aspx
- KACST News Bulletin, http://www.kacst.edu.sa/ar/about/publications/Pages/newsbulletin.aspx
- Patent Publications, http://www.kacst.edu.sa/ar/about/publications/Pages/patentpublications.aspx
- Environmental Publications, http://www.kacst.edu.sa/ar/about/publications/pages/environmentalpublications.aspx
- Other Publications, http://www.kacst.edu.sa/en/about/publications/Pages/other.aspx

E-libraries

All higher education institutions in Saudi Arabia have e-Libraries services which provide access for their faculty, researchers, and students, to a wide range of data bases, scientific journals, e-books, and dissertations by subscription, while the Saudi Digital Library is for all faculty, researchers, and students of higher education irrespective as to their institution.

OER at Ministry of Education

The Ministry of Education (MoE) offers a wide range of open educational resources to help the employees of the ministry in professional development. It is scattered everywhere on different sites of the directorates and commissions of the MoE.

Open Access in the Health Sector

In the health sector, some specialist hospitals and medical cities have their own publications (magazines, booklets, journals, articles, and manuals) with open access or links to international OERs. For examples see the links for King Faisal Specialist Hospital & Research Centre, King Fahd Specialist Hospital, and Prince Salman Centre for Kidney Diseases:

- http://www.kfshrc.edu.sa/
- http://www.kfsh.med.sa/KFSH_Website/Publication.aspx
- http://www.kfsh.med.sa/KFSH_Website/KFSHDefault.aspx?DT=T&V=1341
- http://www.pskc.gov.sa/index.php/ar/2013-01-10-12-55-34/2013-01-10-13-19-46

Moreover, the Ministry of Health Portal provides an Open Data Platform (http://www.moh.gov.sa/en/Ministry/OpenData/Pages/default.aspx) to enable public to use the data available. The data is available in PDF, XML and XSL formats, as well as graph and chart forms. The MoH portal also affords open educational content to all (http://www.moh.gov.sa/en/HealthAwareness/EducationalContent/Pages/default.aspx).

In general, every governmental sector in Saudi Arabia provides kind of open access data, publications, or educational resources in its specific field.

Sourced from:

- Directory of Open Access Journal (DOAJ), http://www.doaj.org
- Registry of Open Access Repositories (ROAR), http://roar.eprints.org/
- The Directory of Open Access Repositories – OpenDOAR, http://www.opendoar.org/
- Umm Al-Qura University https://uqu.edu.sa/
- King Fahd University of Petroleum and Minerals – KFUPM Open Courseware, http://ocw.kfupm.edu.sa/
- King Fahd University of Petroleum and Minerals – KFUPM Open Coursefile, http://ocf.kfupm.edu.sa/
- Alfaisal University, http://news.alfaisal.edu/alfaisal-university-first-educational-institution-to-host-mit-opencourseware-mirror-website-in-the-kingdom-and-the-region-2/
- King Abdulaziz City for Science and Technology (KACST), http://www.kacst.edu.sa/
- The Ministry of Education (MoE), http://www.moe.gov.sa/
- The Ministry of Health (MoH), http://www.moh.gov.sa/

Copyright in Saudi Arabia

The first version of Saudi Copyright Law was issued in 1989. Then it was superseded by another version of Saudi Copyright Law which was issued by a royal decree in 2003. It protects all kinds of intellectual work and the author's right is protected along his life time and 50 years after his death. In 2004, the Implementing Regulations of Copyright Law was issued.

A **Printing and Publishing Law** was issued by a royal decree in 2000, while the **Implementing Regulations of Copyright Law** was issued by the Minister of Culture and Information in 2004 and amended in 2005.

Three authorities protect and govern intellectual property rights in Saudi Arabia: the Ministry of Commerce and Industry for trademarks, the Ministry of Culture and Information for copyright, and King Abdul-Aziz City for Science and Technology for patents.

Saudi Arabia is a member of: the World Intellectual Property Organization (WIPO), the Universal Copyright Convention, the Berne Convention for the Protection of Literary and

Artistic Works, the Islamic Educational, Scientific and Cultural Organization (ISESCO), the Arab League Educational, Cultural and Scientific Organization (ALECSO) which all adapts with most of the modem copyright rules and principles.

Private bodies also contribute to stimulate Copyright and Intellectual Property in Saudi Arabia as well as in the Arab World. These include:

- Abu-Ghazaleh Intellectual Property (AGIP), http://www.agip.com/?lang=en
- Arab Society for Intellectual Property (ASIP), http://www.aspip.org/default.aspx?lang=en
- Saba & Co. Intellectual Property, http://www.sabaip.com/index.aspx

At the level of open access educational resources in Saudi Arabia, there are no specific policies. The databases or the journals usually indicate that the content is subject to the national copyright laws. In some cases, there are Terms and Conditions of Use for the e-content including copyright issues, and publishing policies as in the MoE (http://www.moe.gov.sa/Pages/Terms.aspx), and King Saud University (http://com.ksau-hs.edu.sa/library/index.php?option=com_content&view=article&id=117%3Acopyright-policy&catid=38%3Alibrary-policies&Itemid=151&lang=en and its Electronic Publishing Policy, http://ksu.edu.sa/Pages/Policy.aspx) Journal of Family and Community Medicine (http://www.jfcmonline.com/contributors.asp) which also refers to the national copyright laws. Moreover, there is usually a notice warning the users from using the content for commercial purposes. Other open access journals with international publishers as Medknow are subject to the policies of the publisher.

KFUPM Open Courseware and Open Coursefile platforms clearly state the terms of use of the course material available on the two sites. It is stated that the course material is

> *the property of the University. The visitors of the site are licensed to use the material, as it is or in a derived form, for non-commercial purposes only. All material must be attributed to the author of the material. To use the material otherwise, explicit permission must be obtained from the copyright holder. (http://ocw.kfupm.edu.sa/Term.aspx)*

The Ministry of Culture and Information has a document of the regulations that govern the e-publishing activity including the educational content. To download the document check the following link:
http://www.info.gov.sa/Files/file_%D8%A7%D9%84%D9%84%D8%A6%D8%AD%D8%A9%D8%A7%D9%84%D8%AA%D9%86%D9%81%D9%8A%D8%B0%D9%8A%D8%A9%D9%84%D9%86%D8%B4%D8%A7%D8%B7%D8%A7%D9%84%D9%86%D8%B4%D8%B1%D8%A7%D9%84%D8%A7%D9%84%D9%83%D8%AA%D8%B1%D9%88%D9%86%D9%8A.doc

Sourced from:

- The World Intellectual Property Organization (WIPO),
  http://www.wipo.int/portal/index.html.en
- UNESCO – World Anti-Piracy Observatory, Saudi Arabia,
  http://www.unesco.org/culture/pdf/saudiarabia_cp_en
- Arab League Educational, Cultural and Scientific Organization (ALECSO),
  http://www.alecso.org.tn/
- The Islamic Educational, Scientific and Cultural Organization (ISESCO),
  http://www.isesco.org.ma/
- KFUPM Open Courseware, http://ocw.kfupm.edu.sa/Term.aspx
- KFUPM Open Coursefile, http://ocf.kfupm.edu.sa/Term.aspx
- Ministry of Culture and Information, http://www.info.gov.sa/home.aspx