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Continuing professional development system for health-care professions, Egypt

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Abstract

While the regulatory framework for medical education in Egypt has rapidly evolve, the progress of developing a system for continuing professional development has been slow. In 2018 the government approved legislation establishing a regulatory authority for continuing professional development and added expectations for continuing professional development as a condition of relicensure for physicians in Egypt. The new authority has deployed a provider-accreditation model that sets criteria for educational quality, learning outcomes, independence from industry, and tracking of learners. Only accredited providers can submit continuing professional development accredited activities. Despite regulatory and administrative support there have been several barriers to the implementation of the system including limited availability of funding, lack of suitable training venues and equipment for hands-on training, and resistance from the profession. As of March 2022, 112 continuing professional development providers have achieved accreditation, and deployed 154 accredited continuing professional development activities. The majority of accredited providers were medical associations (64%) and higher education institutions (18%), followed by medical foundations and nongovernmental organizations (13%) and health-care facilities (5%). One electronic learning platform has been accredited. Any entity with commercial interests cannot be accredited as a continuing professional development provider. Funding of continuing professional development activities can be derived from provider budgets, programme registration fees or appropriate sponsors. Funding from industry is limited to unrestricted educational grants. The foundations for an effective continuing professional development system have been established in Egypt with the aim of achieving international recognition.

Introduction

With over 102 million citizens in 2020 and high population growth, Egypt needs and deserves high-quality health care. Figures from 2018 show that Egypt had 40 medical schools, more than 2000 hospitals and 445 000 physicians working in the country, equating to around 7.4 doctors per 10 000 citizens. Egypt hosts hundreds of medical
conferences annually, attracting tens of thousands of international attendees, especially from the Middle East and Africa. Many Egyptian doctors are working successfully worldwide. Nevertheless, progress has been slow in developing a continuing professional development system to support excellence in practice and care.²

Formal credit systems for continuing medical education were first established in 1948 in North America followed by Europe.³,⁴ From 1990 to 2011, several initiatives had sought to establish centres or systems for the accreditation of continuing professional development activities in Egypt.² These initiatives included those of the Egyptian medical syndicate, the Egypt country office of the World Health Organization,⁵ medical scientific associations, the health ministry and several of the country’s medical schools. However, these initiatives have functioned without a national regulatory system, which has been the main challenge of continuing medical education in the country.⁶ None of these efforts were successful since physicians in Egypt had permanent or lifetime licensure so there was no incentive for them to engage in such development. Furthermore, the developing agencies and accreditors had conflicts of interest, while the lack of a national regulatory system meant that agencies sought to accredit themselves and their activities.⁷

In September 2017, the Higher Education Reform Experts in Egypt organized a workshop to discuss the planning, implementation and accreditation of continuing professional development in the health sector. The participants in the workshop included representatives from Egypt’s National Authority for Quality Assurance and Accreditation of Education (the standard-setting body for higher education), the Compulsory Egyptian Medical Training Authority (the authority in charge of continuing professional development accreditation), the relevant sector committees of the Supreme Council of Universities, higher education institutions, the health scientific societies, and the medical and nursing syndicates, as well as selected Egyptian politicians and European experts in the field.⁸ The workshop produced a recommendation that the Egyptian government designates a national licensing authority, requires relicensure and establishes an independent agency to accredit continuing professional development providers. We describe here the design and implementation of Egypt’s continuing professional development system for health-care professionals, which has begun with a focus on physicians before roll-out to other health professionals.

Legislative development
Before the workshop, the regulatory authority in charge of continuing professional development accreditation, the Compulsory Egyptian Medical Training Authority, was established by the Prime Minister’s decree no. 210/2016. Its governing board comprises members from higher education institutions, the health ministry, military and police medical services, and the Egyptian medical syndicate. The objectives of the regulatory authority included oversight of graduate and continuing medical education, including the development of clinical training for medical school graduates; setting standards for the content of professional and specialized medical training; and establishing the foundations for evaluating and re-evaluating doctors at different levels: graduates, postgraduates and lifelong learners.

Recognizing the need to maintain the professional skills of its medical workforce, the Egyptian government introduced legislation in 2018 to establish mandatory minimum thresholds of engagement in continuing professional development as a prerequisite for the renewal of medical licenses. The minimum set threshold was suggested to be around 200 to 250 credits on a 5-year cycle (1 credit = 1 hour of educational activity). This target aligns with a variety of international regulatory systems, including that of the United States of America.

A new law was passed in 2019 requiring mandatory renewal of medical practice licences every 5 years. This mandate was to be applied to recent medical graduates who passed the Egyptian medical licence examination that was first offered in February 2021. Collection of continuing professional development credits will be obligatory for physicians. Egyptian physicians working abroad must collect continuing professional development points for renewal of their licence to practice there. These physicians can attend accredited continuing professional development activities in Egypt. The aim of the law was to motivate physicians to attend accredited continuing professional development activities.

**Framework**

In February 2018, to fulfil the recommendations of the expert group, the continuing professional development committee was established as an independent body working under the regulatory authority. The committee is responsible for setting the accreditation standards; monitoring continuing professional development activities; auditing and reporting the implementation of these activities to the authority’s governing board; updating its role in response to the needs of the public and
professionals; and benchmarking its activities against global standards. The committee comprises 11 medical education experts drawn from universities, the health ministry and the Egyptian army. The committee started by exploring the different types of accreditation system present in other countries, comparing provider-based and activity-based systems. Because of the expected large number and types of applicants from the health-care professions, the decision was to start as a provider-based accreditation system for health-care professionals, beginning with physicians, that will facilitate handling accredited providers and monitoring their products. This approach is similar to the continuing professional development systems implemented in Europe, Oman, West Bank and Gaza Strip, USA and Sudan. The committee started to accredit online learning activities submitted by either individuals or accredited continuing professional development providers, provided they use an electronic learning (e-learning) platform accredited by the regulatory authority. In general, the continuing professional development system in Egypt follows most of the guidelines of the European Accreditation Council for Continuing Medical Education as a model reference.

Provider standards
The first continuing professional development by-laws in Egypt were published in August 2018. A set of eligibility standards, an application process and review process were established under the regulatory authority.

In July 2019, an education and training foundation, the Egyptian Neonatal Network, became the first accredited continuing professional development provider. Only accredited providers are permitted to submit their activities for accreditation. The eligible providers of continuing professional development can be higher education institutions, medical associations, health professional education and publishing companies, governmental agencies, health-care facilities, medical foundations that conduct education and training, and not-for-profit and nongovernmental organizations (NGOs). Any entity with commercial interests, such as pharmaceutical companies and conference organizing agencies, cannot be accredited as a continuing professional development provider.

In June 2020, the by-laws for accreditation of online learning platforms for continuing professional development were published. The e-learning platform of the medical syndicate was the first to be accredited. The syndicate has provided 15 online
accredited professional development activities in the field of radiology, infection control, cardiology and soft skills, such as leadership, team management and communication skills, for physicians.

To avoid conflicts of interest, the continuing professional development committee does not create its own educational programming and therefore does not accredit its own activities.16

As of March 2022, 112 organizations have achieved initial accreditation: 72 (64%) medical associations, 20 (18%) higher education institutions, 14 (13%) medical foundations or NGOs, 6 (5%) health-care facilities. Their distribution by specialty is shown in Fig. 1. Apart from general providers, the providers cover 17 specialities including four major specialities (internal medicine, surgery, obstetrics and gynaecology, and paediatrics) and 13 sub-specialities. The highest number of speciality providers come from paediatrics. General providers include those that offer activities in different specialities, such as schools of medicine. Some specialities (such as clinical pathology, nephrology and pathology) are not covered by dedicated providers although their activities may be offered by general providers.

Most accredited continuing professional development providers are based in the capital city, Cairo. One Egyptian-accredited provider is based in Beirut, Lebanon. Only four providers belong to the pharmacy sector. Two of them are regional organizations: the Arab Board of Pharmacy Specialities and the Union of Arab Pharmacists. The largest national training centre of the Egyptian health ministry – the Princess Fatma Academy for Continuing Professional Education – was also accredited.

Since the launch of the continuing professional development system in August 2018, 154 accredited continuing professional development activities were delivered, with continuing professional development hours ranging from 1 to 30 hours. By March 2022, the continuing professional development hours provided totalled 1076 hours. The precise number of trainees attending all accredited events is not available at this stage. However, we plan to collect more data about participants as part of an assessment of the continuing professional development system.

By the beginning of 2020, the continuing professional development committee announced the Provider of the Year Award for continuing professional development. The criteria for the award include the number of accredited continuing professional development activities, continuing professional development hours and compliance with...
the continuing professional development by-laws. Award winners receive a certificate, 50% discount on their fees to the regulatory agency for the next year, and promotion on social media. The Egyptian medical syndicate was rewarded twice, for the years 2020 and 2021.19

Activities standards

Needs assessment

Continuing professional development activities must be designed to meet the demonstrated educational needs of physicians, with documentation of the needs assessment. Currently, needs assessment in Egypt is completed by the leaders of governing bodies and clinical departments in schools of medicine and hospitals and scientific committees, which organize the teaching activities based on their perception of the needs of the target audience. We aim for the training needs assessment to be tailored to general physicians and different specialties and directed to the most common diagnoses and prevalent diseases.

Instructional design

To allow broad and mixed models of educational delivery the professional development standards in Egypt are designed towards learning outcomes rather than an educational format. Learning outcomes are not formally specified but are mentioned by the provider when they submit their activities. We plan to set up intended learning outcomes for continuing professional development in general in collaboration with providers. Currently the primary method of teaching being used by the accredited providers is lectures to large audiences; hands-on workshops are also commonly used. Online teaching has been increasing, especially during the coronavirus disease-2019 pandemic. Accredited providers make considerable effort to develop online education programmes and set-up e-educational platforms. The regulatory authority has created inclusive educational design standards to meet the diverse needs of physicians, including those practising in remote areas, and focusing on local health problems and endemic diseases. Delivering professional development activities to those doctors in remote areas could also be achieved by using a mobile simulator training unit, e-learning and online continuing professional development activities.

Evaluation
For now, the accreditation standards do not oblige providers of continuing professional development to evaluate individual learners or activities. Some providers use pre- and post-tests to measure changes in the knowledge and skills of the participants. We anticipate that when the system is more mature the requirements for accreditation will include evaluation of outcome measures, such as physicians’ self-reflection on their performance, patient care or population health.20

Funding and commercial support
Funding for setting up the continuing professional development system has come from government. We do not have more details available at this stage due to changes to the administrative and financial structure of the regulatory authority that are in progress. Funding of continuing professional development activities can be derived from provider budgets, programme registration fees or appropriate sponsors. The regulatory authority’s by-laws state that pharmaceutical companies, device manufacturers and other commercial organizations cannot use funds to promote their products or services in any continuing professional development content.16 Funding from industry is limited to unrestricted educational grants. All funds from a commercial source should be in the form of an educational grant payable to the institution or organization sponsoring the continuing professional development activity, with no stipulations attached, such as selecting faculty, authors, participants, or any matters related to the content. It is acceptable to designate an unrestricted educational grant to a specific event. While there are no detailed regulations on commercial support, the regulatory authority anticipates introducing expectations aligned with the USA’s Accreditation Council for Continuing Medical Education standards for integrity and independence. One challenge to the funding system is that industry bodies pay for the travel and registration of physicians to incentivize and reward their prescribing behaviours. However, in addition to being an unethical practice, the rewards are directed to senior physicians, which deprives others from attending accredited continuing professional development activities.16

Credit standards
The recording of continuing professional development in Egypt uses the credit point-based system. A continuing professional development credit (1 point) equals 1 hour of educational activity. However, a different relationship between time and educational credit may be present in different countries21–24 and this difference should be considered when evaluating credits awarded by international accreditors.
professional development standards classify learning activities into three categories: external, internal and personal credits. Up to now, any categories of credit can be accumulated; there is no requirement for credits within specific categories. External credit sessions are usually presented by external speakers or guests at a hospital and tends to involve larger groups of practitioners. Internal credit refers to a hospital’s own employees and staff with smaller groups. Personal credit involves self-directed learning activities such as reading, medical writing or completing activities that are not from accredited providers. This credit system matches with the practice in Europe and USA. Accredited providers are obliged to retain records of the attendance of its learners for 5 years. Tracking individuals’ continuing professional development performance requires physicians to submit their self-assessment forms and personal development plans to their e-portfolio on the regulatory authority’s website.

In some countries, the continuing professional development system defines the credit point requirements differently for each health-care speciality (physicians, pharmacists, dentists, nurses and allied health professions) and the distribution of its types within each 3-year continuing professional development cycle. However, the system in Egypt has not yet specified the number of credit points for other health-care specialties. The renewal of licences and the continuing professional development cycle will be every 5 years.

In Oman and West Bank and Gaza Strip these credit points or hours are used as one of the criteria for renewal of medical licenses or contracts; for staff promotion and performance appraisals; for applying for higher studies; or for sponsorship to attend international conferences. In Egypt, the continuing professional development system encourages the same practice and recommends its use in universities.

Accreditation process

Organizations in Egypt apply for accreditation using the resources of the regulatory authority’s website and an application form. Organizations that can meet the accreditation standards are awarded a 2-year term. Accredited providers are evaluated during their term and at reaccreditation by the regulatory authority. Methods of evaluation include random attendance at accredited professional development events by a representative of the regulatory authority; reviews of submitted post-event documents; and participants’ feedback on social media and websites. According to the continuing professional development by-laws, the regulatory authority ensures that...
inquiries into or complaints about continuing professional development providers are handled appropriately to be fair to the provider and the complainant. The regulatory authority can initiate its own inquiries. Any violation of by-laws may lead to a penalty to the provider.\textsuperscript{16} Penalties range from being barred from applying for accreditation in the future, financial penalties or even potentially legal action.

Challenges
The system of continuing professional development in Egypt is still in the early stages of development. Despite regulatory and administrative support, the implementation of the system has faced several barriers. While there are several large and sophisticated professional medical societies, opportunities for workplace learning and interprofessional learning are scarce and there are a lack of suitable training venues and equipment for hands-on training. There is no mechanism to fund engagement in continuing professional development without commercial support, and physicians seem reluctant to pay for their own professional development. In focus group discussions during academic and medical society board meetings, senior physicians were especially sceptical of the value of a new continuing professional development system that does not include paid study leave or a travel allowance, and one that restricts funding from the pharmaceutical industry. We plan to assess how different categories of health-care professions perceive the new system.

Allocating time for continuing professional development is the responsibility of the individual physician and is not provided for in standard contracts of work. Many physicians must work extra time to increase their income, which limits their time available for continuing professional development. Every accredited health-care facility must provide a minimum number of internal continuing professional development hours annually as a prerequisite for providing these free of charge to employees, supported by the national health insurance services. We should encourage activities that are conducted inside the workplace, that use different forms of teaching, and that provide allocated, paid time for continuing professional development. Such a development will require improvements in the training infrastructure in health-care facilities and additional support for online education. Mobile training units, delivering workplace training events, should be encouraged to support physicians to attend training
Next steps
The migration of health-care professionals across countries for work makes the mutual recognition of continuing professional development credits between countries essential for them.\textsuperscript{25} The regulatory authority of Egypt is currently working on agreements with global organizations, notably the International Academy for Continuing Professional Development Accreditation,\textsuperscript{26} that will facilitate international recognition of the continuing professional development system in Egypt. Leaders of health-care authorities and organizations, medical societies and policy-makers should facilitate effective learning settings to foster a culture of lifelong learning, which lies at the foundation of continuing professional development.\textsuperscript{27}

While still in its the early stages, the continuing professional development system in Egypt has achieved several milestones, including the establishment of technical and financial by-laws; implementation of a system benchmarked against international standards; recruitment of providers and rejection of unsuitable applicants; the introduction of a system of programme accreditation; and fostering an awareness of a continuing professional development culture in medicine.

Interprofessional continuing professional development, when individuals from many professions learn together, is still rare in Egypt. However, the accreditation of four providers from the pharmacy sector is a positive step towards establishment and extension of continuing professional development to other health professionals. Later in 2022, the Egyptian Health Council\textsuperscript{28} will replace the Compulsory Egyptian Medical Training Authority and will be under the authority of the President of Egypt. All the constituents of the regulatory authority, including its continuing professional development committee, will be transferred to the Egyptian Health Council. This move aims to strengthen, support and stabilize the accreditation system. Because of the large numbers of physicians in the country, the regulatory authority started its work with continuing professional development for physicians. However, the Egyptian Health Council will also control the in-service clinical practice of all health-care professionals. Establishment of an independent body to regulate continuing professional development aims to prevent the issue of different authorities attempting to take over the governance of continuing professional development accreditation in Egypt. The situation differs in some nearby countries and territories, such as Sudan,\textsuperscript{15} and the West Bank and Gaza Strip\textsuperscript{14} where the governing body of continuing professional development accreditation
is working under the health ministry, while in Oman the authority works under the medical and health specialities board, separate from the health ministry.

Conclusions
The foundations for an effective continuing professional development system have been established in Egypt. Because of increasing cross-country mobility of health-care professionals and patients, the need to ensure high quality and safe patient care has been growing. This development requires political and governmental support, which has now been achieved in Egypt, together with the establishment of an independent accreditor. The new regulatory authority has successfully created standards for continuing professional development, an accreditation process and has built up a pool of accredited providers. The public and health-care professionals can anticipate continued evolution in their learning environment to achieve international standards.

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Competing interests:
None declared.

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Fig. 1. **Number of providers of continuing professional development by speciality, Egypt, 2019–2022**

Note: Data are for January 2019 to March 2022. General providers include those that offer activities in different specialities, such as schools of medicine.