

# Saudi regulations for the accreditation of sleep medicine physicians and technologists

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#### Abstract:

The professional content of sleep medicine has grown significantly over the past few decades, warranting the recognition of sleep medicine as an independent specialty. Because the practice of sleep medicine has expanded in Saudi Arabia over the past few years, a national regulation system to license and ascertain the competence of sleep medicine physicians and technologists has become essential. Recently, the Saudi Commission for Health Specialties formed the National Committee for the Accreditation of Sleep Medicine Practice and developed national accreditation criteria. This paper presents the newly approved Saudi accreditation criteria for sleep medicine physicians and technologists.

#### Key words:

Accreditation, licensing, sleep medicine, sleep technology, technicians, technologists

Over the past three decades, sleep medicine has evolved from a medical and scientific interest into a well-established discipline and medical specialty with a multidisciplinary approach. The professional content of sleep medicine has grown enough to warrant the recognition of sleep medicine as an independent specialty. Sleep medicine was approved as an independent specialty in the US and Germany in 2005, and other countries are making efforts to attain official recognition of sleep medicine.<sup>[1]</sup>

The practice of sleep medicine and the demand for this service are expanding in Saudi Arabia.<sup>[2]</sup> The accreditation of sleep medicine physicians at this stage of growth is of paramount importance to patient care and physician specialization and training. A recent editorial addressed the need for a national licensing system to license sleep medicine physicians and technologists in Saudi Arabia and ascertain the competence of practicing sleep medicine physicians and technologists.<sup>[3]</sup>

Specialty care has been shown to improve outcomes in several settings.<sup>[4]</sup> For example, a number of studies in intensive care units have demonstrated that the management of critically ill patients by qualified critical care medicine specialists reduces mortality rates, length of hospital stay, and health care utilization.<sup>[5-7]</sup> Similar results have been demonstrated in patients with heart failure who were managed by cardiologists rather than internists.<sup>[8]</sup> In a recent study, Parthasarathy and colleagues demonstrated that the accreditation of sleep centers and certification of physicians by the

American Academy of Sleep Medicine (AASM) were associated with better outcomes in patients with obstructive sleep apnea (OSA).<sup>[9]</sup> Moreover, a recent study demonstrated that continuous positive airway pressure (CPAP) adherence was better in OSA patients who had a consultation with a qualified sleep medicine physician before undergoing a diagnostic polysomnography (PSG).<sup>[10]</sup>

The accreditation process aims to ensure that practicing physicians and technologists meet acceptable and safe competence levels. The Saudi accreditation process will assess the credentials of medical and technical staff through an official scientific licensing system. The licensing process is aimed at ensuring that the practicing physician is able to assess, diagnose, and manage the sleep-related disorders listed in the International Classification of Sleep Disorders (ICSD-2).<sup>[11]</sup>

In preparation for this task, the Saudi Commission for Health Specialties (SCHS) formed the National Committee for the Accreditation of Sleep Medicine Practice of Physicians and Technologists. The committee comprised sleep medicine physicians from adults and pediatrics, an academic staff member with a background in technology, and a representative of the SCHS. The committee defined two clear objectives for its duties: Objective 1, the development of accreditation regulations for physicians to be classified as sleep medicine specialists; and Objective 2, the development of accreditation regulations for technicians to be classified as sleep medicine technologists. The members of the

National Committee for the Accreditation of Sleep Medicine Practice reviewed the accreditation processes for sleep medicine physicians and technologists in countries that provide certification in sleep medicine and sleep technology, such as the US and Germany, explored the experiences of the new Sleep Medicine Fellowship Program at King Saud University, and explored the accreditation process in European countries and the Guidelines of the European Sleep Research Society.<sup>[1,2,12-19]</sup> The committee contacted experts in sleep medicine training in different countries to obtain information when needed. The initial draft of the accreditation document was reviewed by local and international experts in sleep medicine, and the committee subsequently assessed their comments and made the necessary modifications. The final draft was reviewed and approved by the National Profession Accreditation Committee on July 4, 2012.

### Objective 1

Accreditation requirements for physicians to be classified as sleep medicine physicians [Figure 1]: The committee defines a sleep medicine physician as a medical doctor (MD) who is trained in the subspecialty of sleep medicine and has competence in the clinical assessment, physiological testing, diagnosis, management, and prevention of sleep and circadian rhythm disorders. Sleep physicians are allowed to treat patients with sleep disorders. The disorders managed by sleep medicine physicians include, but are not limited to, sleep-related breathing disorders,

insomnia, hypersomnia, circadian rhythm sleep disorders, parasomnias, and sleep-related movement disorders. The classification (e.g., consultant or specialist) of applicants will depend on the SCHS classification of the applicants based on their primary specialty credentials.

The committee realizes that sleep medicine practice in Saudi Arabia has unique features that need to be considered to develop a successful licensing system tailored to the needs of the country. These features include the following:

- (1) The high demand for physicians specialized in the field of sleep medicine in Saudi Arabia, (2) the diversity of training programs previously available to current sleep medicine physicians, and (3) the lack of a national local training program. Therefore, the committee decided to develop accreditation regulations that will be applied in two phases:

### Phase 1: Until the End of 2014

Physicians with the following credentials will be accredited as sleep medicine physicians:

#### The applicant must be accredited by the SCHS as a MD

Individuals coming from other backgrounds (e.g., dentistry, nursing, allied health, science, social science, and psychology) will not be considered for this track.

In addition to the above requirement, the applicant must fulfill one of the following criteria:

#### Pathway I

Physicians with board certification in sleep medicine from a body accredited by the SCHS, such as the American Board of Health Specialties or an SCHS-accredited local training program.

#### Pathway II

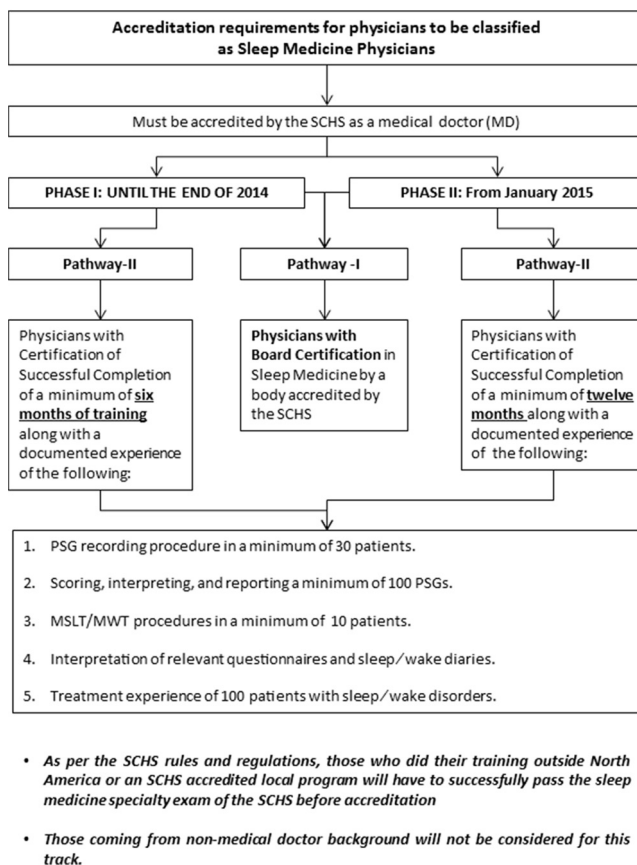
Physicians with certification of the successful completion of a minimum of 6 months of full-time, structured, hands-on clinical training and patient care in a university or medical center accredited by the SCHS. Applicants using this pathway will be required to meet the following criteria (provided that sleep medicine training does not overlap with clinical training in the primary specialty).

The applicant must be accredited by the SCHS as a MD in one of the following medical specialties:

- Pulmonary medicine
- Pediatric pulmonology
- Neurology
- Psychiatry
- Pediatrics
- Otolaryngology
- Family medicine
- Internal medicine.

The applicant must submit written testimony from the director of the Sleep Medicine Fellowship Program where training was completed stating the applicant's correct and independent completion of the following:

- i. A full PSG recording procedure in a minimum of 30 patients



**Figure 1:** A flow chart depicting the accreditation requirements for physicians to be classified as sleep medicine physicians

- ii. The scoring, interpretation, and reporting of a minimum of 100 PSGs comprising a spectrum of neurological, cardiorespiratory, and psychiatric disorders in adults and children
- iii. A full Multiple Sleep Latency Test (MSLT)/Maintenance of Wakefulness Test (MWT) procedure in a minimum of 10 patients
- iv. The interpretation of relevant questionnaires and sleep/wake diaries
- v. Experience in treating a minimum of 100 patients with sleep/wake disorders
- vi. As per SCHS rules and regulations, physicians who completed their training outside North America will have to successfully pass the SCHS Sleep Medicine specialty exam before accreditation.<sup>[20]</sup>

During phase I, individuals who do not meet the above criteria but have an extensive record of clinical experience in sleep medicine at a recognized sleep disorder center should submit a detailed synopsis of activity and all supporting documentation to the SCHS to be assessed by the National Committee for the Accreditation of Sleep Medicine Practice.

### Phase 2: After January 2015

Physicians with the following credentials will be accredited as sleep medicine physicians:

#### The applicant must be accredited by the SCHS as a MD

Individuals coming from other backgrounds (e.g., dentistry, nursing, allied health, science, social science, and psychology) will not be considered for this track.

In addition to the above, the applicant should fulfill one of the following criteria:

#### Pathway I

Physicians with board certification in sleep medicine from a body accredited by the SCHS, such as the American Board of Health Specialties or local training programs, provided that the applicant provides proof of 12 months of full-time training in sleep medicine.

#### Pathway II

Physicians with certification of the successful completion of a minimum of 12 months of full-time, structured, hands-on clinical training and patient care in a University or Medical Center accredited by the SCHS. Applicants using this pathway will be required to meet the following criteria:

The applicant must be accredited by the SCHS in one of the following medical specialties:

- Pulmonary medicine
- Pediatric pulmonology
- Neurology
- Psychiatry
- Pediatrics
- Otolaryngology
- Family medicine
- Internal medicine.

The applicant must provide written testimony from the director of the Sleep Medicine Fellowship Program where the

applicant's training was completed stating the correct and independent completion of the following:

- i. A full PSG recording procedure in a minimum of 30 patients
- ii. The scoring, interpretation, and reporting of a minimum of 100 PSGs comprising a spectrum of neurological, cardiorespiratory, and psychiatric disorders in adults and children
- iii. A full MSLT/MWT procedure in a minimum of 10 patients
- iv. The interpretation of relevant questionnaires and sleep/wake diaries
- v. Experience in treating a minimum of 100 patients with sleep/wake disorders
- vi. As per the SCHS rules and regulations, applicants who completed their training outside North America will have to successfully pass the SCHS Sleep Medicine specialty exam before accreditation.<sup>[20]</sup>

### Objective 2

Accreditation requirements to be classified as a sleep medicine technologist [Figure 2]: The committee defines sleep technology as a distinct and separate health profession that is practiced by accredited sleep technologists. A sleep

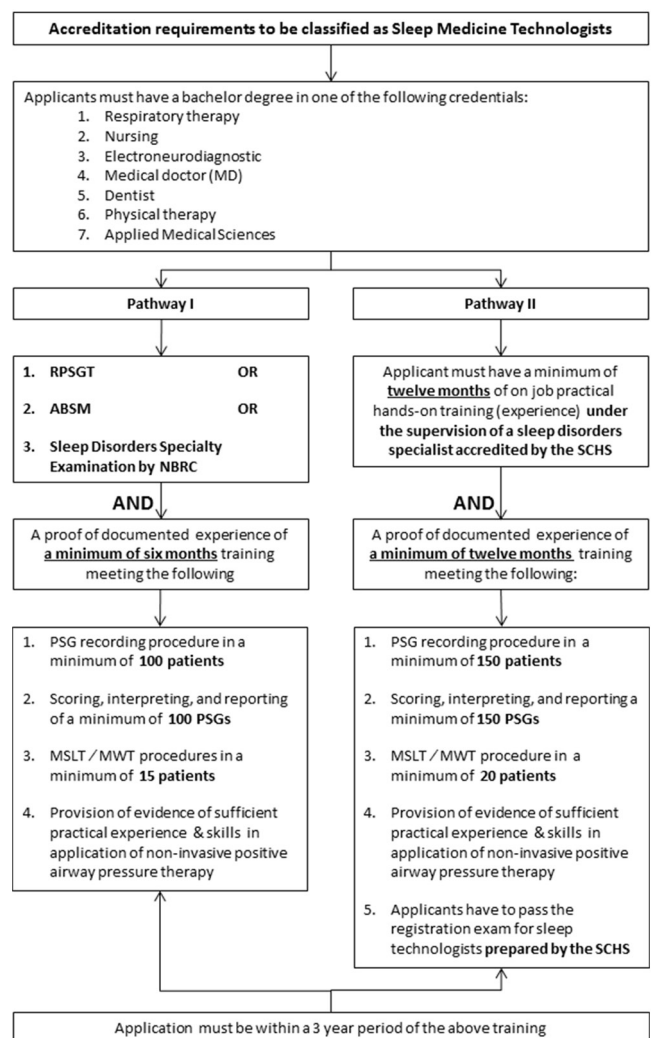


Figure 2: A flow chart depicting the accreditation requirements for classification as a sleep medicine technologist

technologist is defined as a trained person who has competence in the following:

- Neuro-cardiopulmonary monitoring
  - Monitoring devices, artifact recognition, and different diagnostic protocols
  - The scoring of different sleep signals and recordings in accordance with internationally accepted scoring criteria
  - The classification of sleep disorders according to the ICSD-2<sup>[11]</sup>
  - The different assessment questionnaires used in sleep disorder centers
  - Positive airway pressure therapy.
1. Applicants must have a bachelor degree in one of the following areas:
    - 2.1 Respiratory care
    - 2.2 Nursing
    - 2.3 Electroneurodiagnostics
    - 2.4 Medicine (MD)
    - 2.5 Dentistry
    - 2.6 Physical therapy
    - 2.7 Applied medical sciences.
  2. Applicants with the above credentials have two pathways for accreditation:

#### Pathway I

Applicants must be certified by one of the following:

- i. The RPSGT (Board of Registered Polysomnographic Technologists), <http://www.brpt.org>
- ii. The American Board of Sleep Medicine's (ABSM) Sleep Technologist Registry,<sup>[21]</sup> <http://www.absm.org/resources/candidatehandbook.pdf>
- iii. The Sleep Disorders Specialty Examination of the National Board for Respiratory Care, <http://www.nbrc.org/Examinations/SDS/tabid/92/Default.aspx>.

The applicants should provide a statement from the medical director of their sleep disorders center stating that the applicant has completed a minimum of 6 months of practical hands-on training (experience) on the job under the supervision of a sleep disorders physician accredited by the SCHS and a full-time sleep technologist accredited by the SCHC. Applications must be submitted within 3 years of the above training. The applicant will be required to provide a written statement from the head of their sleep disorders center stating the correct completion of the following:

- Full PSG recordings in a minimum of 100 patients
- The independent reading of a minimum of 100 PSGs according to the AASM scoring rules,<sup>[22]</sup> including the scoring of arousals, respiratory events, and periodic limb movements, the identification of common arrhythmias, and the recognition of other sleep events and parasomnia
- The independent completion of a full MSLT/MWT procedure in a minimum of 15 patients
- Sufficient practical experience with the techniques used in non-invasive positive airway pressure therapy.

#### Pathway II

Applicants should provide a statement from the medical director of their Sleep Disorders Center stating that the applicant has had a minimum of 12 months of practical

hands-on training (experience) on the job under the supervision of a sleep disorders physician accredited by the SCHS and a full-time sleep technologist accredited by the SCHC. Applications must be submitted within 3 years of the above training. The applicant will be required to provide a written statement from the head of their sleep disorders center stating the correct completion of the following:

- Full PSG recordings in a minimum of 150 patients
- The independent reading of a minimum of 150 PSGs according to the AASM scoring rules, including the scoring of arousals, respiratory events, and periodic limb movements, and the recognition of other sleep events and parasomnia
- The independent completion of a full MSLT/MWT procedure in a minimum of 20 patients
- Sufficient practical experience with the techniques used in non-invasive positive airway pressure therapy.

Applicants are required to pass the registration exam for sleep technologists prepared by the SCHS.

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