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DHA TELEHEALTH CLINICAL GUIDELINES

FOR VIRTUAL MANAGEMENT OF

INSOMNIA – 24

Version 2

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Health Policies and Standards Department

Health Regulation Sector (2024)

INTRODUCTION

Health Regulation Sector (HRS) forms an integral part of Dubai Health Authority (DHA) and is mandated by DHA Law No. (14) of the year (2021) amending some clauses of law No. (6) of 2018 pertaining to the Dubai Health Authority (DHA), to undertake several functions including but not limited to:

- Developing regulation, policy, standards, guidelines to improve quality and patient safety and promote the growth and development of the health sector;
- Licensure and inspection of health facilities as well as healthcare professionals and ensuring compliance to best practice;
- Managing patient complaints and assuring patient and physician rights are upheld;
- Governing the use of narcotics, controlled and semi-controlled medications;
- Strengthening health tourism and assuring ongoing growth; and
- Assuring management of health informatics, e-health and promoting innovation.

The DHA Telehealth Clinical Guidelines aim to fulfil the following overarching DHA Strategic Priorities (2026):

- Pioneering Human-centered health system to promote trust, safety, quality and care for patients and their families.
- Make Dubai a lighthouse for healthcare governance, integration and regulation.

- Leading global efforts to combat epidemics and infectious diseases and prepare for disasters.
- Pioneering prevention efforts against non-communicable diseases.
- Become a global digital health hub.
- Foster healthcare education, research and innovation.

ACKNOWLEDGMENT

The Health Policy and Standards Department (HPSD) developed this Guideline in collaboration with Subject Matter Experts and would like to acknowledge and thank these health professionals for their dedication toward improving quality and safety of healthcare services in the Emirate of Dubai.

Health Regulation Sector

Dubai Health Authority

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EXECUTIVE SUMMARY

Telehealth is based on Evidence Based Practice (EBP) which is the conscientious, explicit and judicious use of current best evidence in making decisions about the care of the individual patient. It means integrating individual clinical expertise with the best available external clinical evidence and guidelines from systematic research.

EBP is important because it aims to provide the most effective care virtually, with the aim of improving patient outcomes. As health professionals, part of providing a professional service is ensuring that practice is informed by the best available evidence.

Insomnia is the one of the most common medical complaints. It frequently coexists with medical, psychiatric, sleep, or neurological disorders. It may also be associated with acute stress, medication or substance, poor sleep habits, or changes in the sleep environment. The diagnosis of insomnia requires three main components: persistent sleep difficulty, adequate sleep opportunity, and associated daytime dysfunction.

This clinical guideline for the virtual management of Insomnia is presented in the format comprising of clinical history/symptoms, differential diagnosis, investigations and management. Identification of 'Red Flags' or serious conditions associated with the disease is an essential part of this telehealth guideline as it aids the physician to manage patients safely and appropriately by referrals, if indicated during virtual telehealth assessment, to ER, family physicians or specialists for a face to face management.

DEFINITIONS/ABBREVIATIONS

Virtual Clinical Assessment: Is the evaluation of the patient's medical condition virtually via telephone or video call consultations, which may include one or more of the following: patient medical history, physical examination and diagnostic investigations.

Patient: The person who receives the healthcare services or the medical investigation or treatment provided by a DHA licensed healthcare professional.

ABBREVIATIONS

DHA	:	Advanced Sleep-Wake Phase Disorder
EBP	:	Cognitive Behavioral Therapy
ER	:	Dubai Health Authority
DHA	:	Delayed Sleep-Wake Phase Disorder
EBP	:	Evidence Based Practice
ER	:	Emergency Room
HRS	:	Health Regulation Sector

1. BACKGROUND

1.1. Insomnia is described as short-term or chronic, depending on its duration.

1.2. Short-term insomnia — Short-term insomnia, also referred to as adjustment insomnia or acute insomnia, usually lasts a few days or weeks and occurs in response to an identifiable stressor. By definition, symptoms are present for less than three months.

1.3. Stressors can be physical, psychological, social, or interpersonal (e.g., job loss, death of a loved one, divorce, argument). Symptoms usually resolve when the stressor is eliminated or resolved or when the individual adapts to the stressor. Occasionally, sleep problems persist and lead to chronic insomnia. This may occur due to the development of poor sleep habits during the acute insomnia period.

1.4. Chronic insomnia — Insomnia symptoms that occur at least three times per week and persist for at least three months are considered chronic insomnia. In practice, however, most individuals with chronic insomnia report symptoms for many years. Some individuals recall an initial stressful event that triggered insomnia, but others report nearly lifelong symptoms without an identifiable trigger. Night-to-night variability and a waxing and waning course related to psychosocial stressors and psychiatric or medical comorbidities are common.

2. SCOPE

1.1. Telehealth services in DHA licensed Health Facilities.

3. PURPOSE

2.1. To support the implementation of Telehealth services for patients with complaints of Insomnia in Dubai Health Authority (DHA) licensed Health Facilities

4. APPLICABILITY

3.1. DHA licensed physicians and health facilities providing Telehealth services.

3.2. Exclusion for Telehealth services are as follows

3.2.1. Emergency cases where immediate intervention or referral is required.

3.2.2. Prescribe Narcotics, Controlled or Semi-Controlled medications.

5. CLINICAL HISTORY

5.1. Patients with insomnia typically complain about difficulty falling asleep and/or staying asleep. Impaired daytime function must also be reported for a diagnosis of an insomnia disorder. In many cases, comorbid psychiatric or medical disorders, medications or substances, or other sleep disorders are also present. However, the presence of comorbid disorders does not exclude the diagnosis and treatment of insomnia.

5.2. Difficulty initiating or maintaining sleep — Patients with insomnia complain of poor sleep quality or insufficient quantity due to difficulty initiating sleep, difficulty maintaining sleep, or waking up too early.

5.2.1. Patients may describe variable sleep, with one or several nights of poor sleep followed by a night of better sleep. Occasionally, patients may report having minimal sleep for several consecutive nights.

5.2.2. Most well-rested adults fall asleep within about 10 to 20 minutes of attempting to sleep and spend less than 30 minutes awake during the night. By contrast, adult patients with insomnia usually report taking 30 minutes or more to fall asleep (for those with sleep initiation difficulties) or spending 30 minutes or more awake during the night (for those with sleep maintenance difficulties). Early morning awakening is defined as termination of sleep at least 30 minutes prior to the desired wake-up time.

5.3. Compromised daytime function — The diagnosis of insomnia disorder requires that sleep difficulties be accompanied by compromised daytime function related to one or more of the following:

5.3.1. Fatigue or malaise

5.3.2. Poor attention or concentration

5.3.3. Social or vocational/educational dysfunction

5.3.4. Mood disturbance or irritability

5.3.5. Daytime sleepiness

5.3.6. Reduced motivation or energy

5.3.7. Increased errors or accidents

5.3.8. Behavioral problems such as hyperactivity, impulsivity or aggression

5.3.9. Ongoing worry about sleep

5.4. Patients with chronic insomnia are often worried that their lack of adequate sleep will result in significant compromise of their ability to function during the day in both social and professional settings. This concern can create a cycle that worsens the insomnia. Specifically, when patients are unable to fall asleep rapidly, they worry about loss of sleep affecting their performance, and this concern increases with time awake and simultaneously decreases the likelihood of falling asleep, while further increasing stress.

5.5. Although severe fatigue is commonly reported by patients with chronic insomnia, actually falling asleep at unwanted or unintended times during the day (i.e., excessive daytime sleepiness) is uncommon and may be a sign of an alternative or comorbid sleep disorder.

6. RED FLAGS

6.1. Sleep attacks - may occur while driving

6.2. Gasping/choking and apnoea during sleep, reported by patient's partner

6.3. Unstable cardiac or pulmonary condition

6.4. Recent cardiovascular accident

6.5. Injury to self or others during sleep

6.6. Frequent sleepwalking

6.7. Excessive daytime sleepiness

6.8. Substance misuse

6.9. Depression and anxiety

7. EVALUATION

7.1. Insomnia is a clinical diagnosis established by history and patient report. The goals of the evaluation are to characterize the nature and severity of the sleep problem and identify contributing factors and comorbidities that may be relevant to successful treatment.

7.2. It is important to consider the patient's age, because average sleep requirement changes with age. Most healthy adults sleep for 7 to 9 hours a night, but this varies. Total sleep time and number of awakenings increase with age.

7.3. A sleep diary is also important in the evaluation of insomnia –

7.4. A sleep diary is a questionnaire completed by the patient each morning to describe the previous night's sleep.

7.5. Refer to APPENDIX 1 for Examples of Patient Complaints and Questions that may suggest Alternative Diagnosis or Contributing Comorbidity.

8. INVESTIGATION

No routine laboratory studies are necessary in the evaluation of chronic insomnia. Selected tests may be indicated based on clinical suspicion of comorbidity, such as echocardiography, thyroid function tests, blood glucose and hemoglobin A1C measurements, blood urea nitrogen and creatinine levels, or iron studies may be performed if heart failure, hyperthyroidism, diabetes mellitus, renal disease, or restless legs syndrome is suspected, respectively.

9. CAUSES

9.1. Substances and Medications causes:

9.1.1. Non-prescription drugs:

a. Caffeine

b. “Diet pills” (e.g., those including pseudoephedrine, phenylpropanolamine)

c. Nicotine

9.1.2. Prescription drugs:

a. Methylphenidate (Ritalin)

b. Theophylline

c. Albuterol (Ventolin)

d. Quinidine (Cardioquin)

e. Dextroamphetamine (Dexedrine)

f. Pemoline (Cylert)

g. Selective serotonin reuptake inhibitors

9.2. Medical Conditions:

9.2.1. Primary sleep disorders (sleep apnea, periodic limb movement disorder, nocturnal myoclonus, restless legs syndrome)

9.2.2. Pain from any source or cause

9.2.3. Drug or alcohol intoxication or withdrawal

9.2.4. Thyrotoxicosis

9.2.5. Dyspnea from any cause

9.3. Psychologic causes:

9.3.1. Depression

9.3.2. Anxiety

9.3.3. Life stressors

9.3.4. Bedtime worrying

9.3.5. Conditioning (associating the bed with wakefulness)

9.3.6. Mania or hypomania

9.4. Environmental causes:

9.4.1. Bedroom too hot or too cold

9.4.2. Noise

9.4.3. Eating, exercise, caffeine or alcohol use before bedtime

9.4.4. Shift work

9.4.5. Daytime napping

10. MANAGEMENT AND TREATMENT

10.1. Refer to APPENDIX 2 for the Virtual Management of Insomnia Algorithm

10.2. Acute Insomnia

10.2.1. Short-term insomnia (lasting less than one month) is the most common form of insomnia and usually results from psychologic or physiologic stress.

10.2.2. The clinical approach to acute insomnia is twofold:

a. Discuss the role that the stressor is playing in disturbing sleep. This can provide some control or at least acceptance of the sleeplessness.

b. When the insomnia is severe or associated with substantial distress, consider referral for face to face consultation for short-term use of a sedative medication.

10.2.3. These medications are generally effective and well tolerated with short-term use, without excessive risk of next-day or carryover.

10.2.4. Follow-up in two to four weeks is encouraged to reassess additional causes of insomnia, current sleep-related symptoms, anxiety about sleep, and to reinforce good sleep habits. If insomnia is persistent, consider managing the patient for chronic insomnia.

10.3. Chronic Insomnia

Sleep Hygiene Education, cognitive behavioral therapy (CBT) and pharmacotherapy are the main treatment options for chronic insomnia that persists despite appropriate identification and management of precipitating factors.

10.3.1. Sleep Hygiene

Sleep hygiene education consists of a set of instructions regarding environment and lifestyle factors that affect sleep. The Sleep hygiene is not effective as the sole intervention for insomnia but is recommended as an adjunct to other forms of therapy. Instructions for Improvement of Sleep Hygiene:

a. Decrease or eliminate the use of caffeine, especially after noon.

b. Do not use tobacco or alcohol near bedtime.

c. Avoid heavy meals close to bedtime. However, a light snack at bedtime may promote sleep.

d. Avoid vigorous exercise within 3 to 4 hours of bedtime.

e. Establish a regular schedule for going to bed and getting up.

f. Avoid daytime naps.

g. Keep the bedroom at a comfortable temperature and minimize light and noise.

h. Go to bed only when sleepy.

i. If you do not fall asleep in about 15 to 20 minutes, leave the bedroom. Return to bed when you are sleepy.

j. Get up at the same time each day regardless of how much you slept.

10.3.2. Pharmacologic Treatment of Insomnia

Medications or classes of medications that are approved to treat insomnia include benzodiazepines, nonbenzodiazepine hypnotics, melatonin agonists. However, these will require a referral for a face to face consultation.

10.3.3. Cognitive Behavioral Therapy (CBT)

The patient will need to be referred for face to face consultation

11. DIFFERENTIAL DIAGNOSIS

Insomnia should be distinguished clinically from several other common sleep complaints and conditions.

11.1. Short sleep duration — The amount of sleep required to support adequate alertness, performance, and health varies by age and among individuals. While most adults require approximately 7 to 8 hours of sleep per night on average, some otherwise healthy people regularly sleep less than 7 hours per night without the need for catch-up sleep to feel refreshed. Such individuals often report a nearly lifelong and/or familial tendency for short sleep duration. Short sleep duration is distinguished from insomnia by the absence of daytime impairment.

11.2. Chronic sleep insufficiency — Chronic sleep insufficiency or sleep restriction is due to volitional sleep restriction or insufficient opportunity to sleep, whereas insomnia exists despite adequate opportunity and conditions for sleep. People with sleep restriction accumulate sleep debt over time and will rapidly fall asleep if given the opportunity. This distinguishes them from most patients with insomnia, who may feel fatigued during the day, but are typically unable to fall asleep if given a chance to take a nap.

11.3. Delayed sleep-wake phase disorder — Delayed sleep-wake phase disorder (DSWPD) is one of the most common revised diagnoses given to patients referred to sleep specialists for chronic insomnia, especially those with difficulties falling asleep. DSWPD is a circadian sleep-wake rhythm disorder that can be thought of as a pronounced "night owl" circadian preference. The peak prevalence is in adolescence.

11.4. Advanced sleep-wake phase disorder — Patients with difficulty maintaining sleep or early morning awakening associated with insomnia should be differentiated from patients with advanced sleep-wake phase disorder (ASWPD). Patients with ASWPD have a circadian phase that is advanced or shifted earlier relative to the environmental light-dark cycle, such that they tend to fall asleep in the early evening (e.g., by 7:00 PM) and wake up in the early morning hours (e.g., 3:00 to 4:00 AM), even if they have forced themselves to stay awake until the late evening. ASWPD primarily affects older adults.

12. REFERRAL CRITERIA

Consider referral to a Family physician or sleep medicine physician for a face to face consultation:

12.1. Suspicion of a comorbidity as the cause of insomnia.

12.2. Insomnia that requires medical treatment

12.3. Patients with insomnia report profound daytime sleepiness or symptoms of:

12.3.1. Sleep apnea

12.3.2. Periodic limb movements

12.3.3. Narcolepsy

12.3.4. Sleep attacks - may occur while driving

12.3.5. Gasping/choking and apnoea during sleep, reported by patient's partner

12.3.6. Unstable cardiac or pulmonary condition

12.3.7. Recent cardiovascular accident

12.3.8. Injury to self or others during sleep

12.3.9. Frequent sleepwalking

12.3.10. Excessive daytime sleepiness

12.3.11. Substance misuse

12.3.12. Depression and anxiety

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APPENDICES

APPENDIX 1 – CHRONIC INSOMNIA: EXAMPLES OF PATIENT COMPLAINTS AND QUESTIONS THAT MAY SUGGEST ALTERNATIVE DIAGNOSIS OR CONTRIBUTING COMORBIDITY.

Insomnia Symptoms	Patient Complaint(s)	Follow-up Question(s)	Possible alternative diagnosis or comorbidity (if yes)	Next Steps
Sleep onset difficulty	I can't fall asleep at night. I can lie in bed for hours and not fall asleep.	Do your legs bother you when you are sitting or lying down?	Restless leg syndrome	Check iron stores, consider pharmacotherapy for restless legs syndrome, dopamine agonists, gabapentinoids)
		When you are on vacation, do you tend to stay up late and sleep late? Do you consider yourself a "night owl"? If you go to bed later, do you fall asleep more easily? Do you have trouble waking up in the morning?	Delayed sleep-wake phase disorder	Sleep log and/or actigraphy for review of sleep-wake patterns on weekdays and weekends

Sleep maintenance difficulty, daytime sleepiness	I often wake up in the middle of the night. I can't keep my eyes open during the day, even though I am getting enough sleep.	Do you snore loudly? Does your partner witness pauses in your breathing while you sleep?	Sleep apnea	Polysomnography or home sleep apnea testing
		Are you a restless sleeper? Have you been told you have limb movements or muscle twitches during sleep?	Periodic limb movements	Polysomnography
Early morning awakening	I wake up too early in the morning and can't get back to sleep.	Do you nod off in the early morning or have to force yourself to stay awake for evening activities?	Advanced sleep-wake phase disorder	Sleep log and/or actigraphy for review of sleep-wake patterns on weekdays and weekends
		Do you feel down, depressed or hopeless? Have you lost interest or pleasure in doing things?	Depression	Evaluate for depression; concomitant treatment for both disorders is often necessary to hasten recovery and increase the likelihood of sustained response

Decreased sleep quality	I try to get enough sleep, but I can't keep my eyes open during the day. I sometimes nod off at work or when I'm driving	Do you have family, social, or job obligations that prevent you from getting enough sleep on a regular basis? Do you depend on an alarm to wake up in the morning? Do you catch up on sleep on the weekends?	Insufficient sleep	Emphasize sleep hygiene and lifestyle changes to promote adequate sleep
	I can't seem to sleep for more than six hours per night, but I'm not tired during the day.	Have you always seemed to need less sleep than other people your age?	Short sleep duration	Educate about range of normal sleep need, revise expectations on sleep quantity

*Although early morning awakening is a common symptom of depression, any insomnia complaint should trigger an evaluation for depression and anxiety, as they are frequently comorbid with insomnia.

APPENDIX 2 – VIRTUAL MANAGEMENT OF INSOMNIA ALGORITHM