



المديرية العامة للمؤسسات الصحية الخاصة  
*Directorate General of Private  
Health Establishments*



وزارة الصحة  
*Ministry of Health*

# Steam Therapy Guideline

**November 2022**

<b>Document Title</b>	Steam Therapy Guideline
<b>Document Type</b>	Guideline
<b>Directorate/Institution</b>	Directorate General of Private Health Establishments
<b>Target Group</b>	All Licensed Private Health Establishments
<b>Document Author</b>	Dr. Zakiya Al-Bahri
<b>Designation</b>	Family Physician ,Health & Safety Specialist (DGPHE)
<b>Document Reviewer</b>	Dr Munira Al Hashmi & Dr Hamad Al Adawi
<b>Designation</b>	Head of Quality Control & Patient Safety Department (DGPHE) Consultant (DGPHE)
<b>Release Date</b>	Nov 2022
<b>Review Frequency</b>	3 years

<b>Validated By</b>		<b>Approved By</b>	
<b>Name</b>	Dr Munira Al Hashmi	<b>Name</b>	Dr Muhanna Nasser Al Muslahi
<b>Designation</b>	Head of Quality Control & Patients Safety	<b>Designation</b>	DG of Private Health Establishments
<b>Signature</b>		<b>Signature</b>	
<b>Date</b>	Nov 2022	<b>Date</b>	Nov 2022

## Table of Contents

<b>Acknowledgment</b> .....	4
<b>Acronyms</b> .....	5
<b>Definitions</b> .....	6
<b>Chapter One</b> .....	8
<b>Introduction</b> .....	8
<b>Background:</b> .....	8
<b>Rationale</b> .....	9
<b>Situation analysis</b> .....	10
<b>Scope and Purpose</b> .....	10
<b>Structure</b> .....	11
<b>Methods and Procedures</b> .....	12
<b>Instructions to clients/patients</b> .....	13
<b>Health &amp; Safety rules and restrictions</b> .....	15
<b>Chapter Three</b> .....	18
<b>Requirements</b> .....	18
<b>Requirements of construction for STR</b> .....	18
<b>Requirements of construction for STC (see annex)</b> .....	19
<b>Pre-requisites of human resources</b> .....	20
<b>Responsibilities</b> .....	21
<b>Chapter Four</b> .....	22
<b>Document History and Version Control</b> .....	22
<b>References</b> .....	22
<b>Annex</b> .....	23

## **Acknowledgment**

We would like to acknowledge the efforts that have been done in writing and revising the Complementary Medicine Practice Licensing Guideline, 2018, which has provided us with valuable information in writing this guideline.

We would like to express our deepest appreciation to Dr.Hamad Al-Adawi and Dr.Munira Al-Hashmi for their valuable support, suggestions and revision of my writing.

I could not have undertaken this journey without Ms. Aida Al-Hinai, Senior Staff Nurse and Head of the Inspection Team at the DGPHE, for her great help in inspecting some of the Private Health Establishments which use the Steam Therapy service and formulating the idea in writing this guideline.

## Acronyms

<b>CM</b>	<b>Complementary Medicine</b>
<b>DGPHE</b>	<b>Directorate General of Private Health Establishments</b>
<b>GP</b>	<b>General Practitioner</b>
<b>IPC</b>	<b>Infection Prevention and control</b>
<b>MoH</b>	<b>Ministry of Health</b>
<b>SOPs</b>	<b>standard operating procedures</b>
<b>STC</b>	<b>Steam Therapy Chamber</b>
<b>STR</b>	<b>Steam Therapy Room</b>
<b>STT</b>	<b>Steam Therapy/Treatment</b>

## Definitions

1. **Guideline:** is a technical communication document, which contains operating instructions on a particular topic or subject. It is intended to give assistance to the users to facilitate their job
2. **Standard (SOP):** is a specific expectation of an organization or institute, described in terms of an activity or outcome against which their actions can be measured
3. **Version:** refers to the current status of the document with regards to the number of times the document has been revised.
4. **Cleaning:** is a physical process which removes soil e.g. dust, dirt and organic matter, along with a large proportion of germs. Cleaning with hot water and detergent breaks up grease and dirt on floors and surfaces. Cleaning is also essential prior to disinfection and sterilization of instruments and equipment.
5. **Disinfection:** is the process of eliminating or reducing harmful microorganisms from inanimate objects and surfaces. Where the disinfectant requires dilution this must be carried out in accordance with the manufacturer's instructions using clean potable water. Once diluted the disinfectant must be used in accordance with the manufacturer's instructions
6. **Sterilization:** is the process of killing all microorganisms.
7. **Complementary Medicine:** is defined as diagnostic, therapeutic, preventive and rehabilitative health care systems and practice, and the use of diverse products; plant, animal, metal or otherwise, which does not fall under modern medicine, such as: Ayurveda, kottakkal Arya Vaidya sala, Ayush, Coimbatore, etc.
8. **“Ayurveda”:** is a system of primary health care that originated in India at least several thousand years ago for the prevention, diagnosis, and treatment of human health conditions and disease; the promotion and/or restoration of health; and the support and stimulation of a patient’s inherent self-healing processes through patient education and the use of Ayurveda therapies and therapeutic substances.

9. **Steam treatment/therapy:** is a technique in which water steam is used for many reasons; some of them are medical in origin by some medical centers such as complementary/ayurvedic medicine. In this technique, warm moist air is introduced in a closed room/chamber.
10. **Steam room/chamber:** is an enclosed space that is heated with steam. Steam rooms/chambers are heated by a generator filled with boiling water. These consist of an enclosure made of an impervious material and steam generating equipment. They are designed to operate at temperatures of up to 50°C regulated by a thermostat with relative humidity of 80 to 100%. They produce a wet humid heat and are intended for indoor use. Usually lasting 5 – 10 minutes' treatment.

## Chapter One

### Introduction

#### **Background:**

Complementary Medicine Establishment, which is a health care facility that consists of a clinic or a group of clinics staffed by either licensed complementary Medicine Practitioner(s), or licensed Physician(s) privileged to practice complementary medicine, provides consultation and/or services on MoH approved Complementary Medicine (CM) Specialties. It does not provide emergency services, which must be referred to a hospital.

Indian Traditional Medicine such as Ayurveda, is one type of CM and its Centre provides services aimed at prevention and treatment of diseases through consultation, prescriptions, lifestyle interventions, detoxification therapies, breathing exercises and meditation. The clinic may also provide services related musculoskeletal manipulation/therapeutic massage and steam therapy.

#### Advantages and Implementation:

1. Steam inhalation, has been used for more than 3500 years, is one of the most recommended therapies worldwide.
2. Steam therapy/treatment, sometimes called hydrotherapy is used mainly by CM Establishments. Steam rooms/chambers create an environment that warms the mucous membrane and encourages deep breathing; help in the early recovery of some respiratory infections.
3. ST helps improving skin health
4. ST alleviates sports injury pains by lowering joint stiffness, relax the muscles, improve blood circulation
5. ST helps easing mental stress by decreasing body's production of cortisol.
6. ST alters moods
7. ST helps increase metabolism and burn more calories.



8. Different forms of hydrotherapy are known to boost immunity, and steam rooms are no exception. Exposing body to warm water stimulates leukocytes, which are cells that fight infection (PubMed Central study).
9. A steam room might significantly improve cardiovascular health. A study (PubMed Central) of older individuals showed that moist heat improved circulation, especially in extremities. Improved circulation can lead to lowered blood pressure and a healthier heart.

On the other hands, there are some disadvantages to this modality of treatment, for instance:

1. Staying in a steam room for more than 15 minutes can lead to dehydration.
2. Steam chambers/rooms can also host other people's germs. The steam isn't hot enough to kill some types of bacteria, and the warmth may even increase the number of bacteria in some occasions.
3. Moreover, continuous steam or hot application damages the texture of mucus and nerve cells. It causes numbness or impaired function of cells.
4. It also reduces the blood supply to the cell, further damaging the cell chemistry. The body's healthy cells have an adverse impact due to external heat for an extended period of time.

Remember that ST doesn't replace any medical advice. It is a supporting treatment method to cure diseases, not a daily routine, nor can it prevent diseases.

### **Rationale**

Previously, ST in CM establishments have not been systematically tracked or studied. However, there is an approved auditing checklist for CM establishments that need to be updated. This guideline is important to ensure ST practices and procedures are implemented and adhered to with the aim of reducing incidents/adverse events, achieving best health outcomes, and preventing future claims/breaches.

### **Situation analysis**

Multiple auditing assessments conducted to these CM establishments have highlighted health care vulnerabilities, with ST singled out as a key area for improvement and action.

### **Scope and Purpose**

This document on the Guidelines for ST rooms/chambers has been developed in order to support the policy decisions and Code of Practice concerning steam room/chamber facilities used by CM establishments and provide a functional guidance to standardize the procedure for managing activities related to ST licensed by the DGPHE. CM Healthcare professionals shall comply at all times with the requirements of Code of Practice for CM Healthcare professionals and MoH policies and guidelines.

This document is applicable to all private healthcare institutes in MoH in particular CM establishments.

At the facility level, this guideline is intended to enable administrators, clinical managers, and healthcare professionals to practice ST and develop their own standard operating procedures (SOPs).

At the national level, this document can serve as guidance to policy-makers and auditors responsible for developing and monitoring these activities in various national health programs.

## Structure

This is the first version of this guideline and it consists of several parts. Part one states acronyms and definitions. Part two covers a brief introduction to the guideline including the background of the topic, rationale and situation analysis. Part three covers the scope, purpose and structure of this guideline. Part four covers the requirements and pre-requisites including construction of ST rooms and human resources. Part five explains the procedure with health and safety rules. It also includes instructions for clients/patients. Part six covers the responsibilities. Finally, part seven comprises of the annexes section including document history and version control table, and references.

## Chapter Two

### Methods and Procedures

1. All clients must complete a medical questionnaire before their first use of the steam room to ascertain any contra-indications or potential allergic reactions
2. Ensure that informed consent has been obtained in accordance with the requirements of the Code of Professional Conduct
3. Ensure that thermostat/thermometer is working and the temperature must not exceed 50°C for a steam room with the humidity at around 100 %
4. healthcare staff must comply with IPC guidelines before, during and after the procedure, as follows:
5. Wash hands thoroughly with liquid soap and warm water immediately before the procedure
6. Ensure that a clean field is established.
7. Use only clean and boiled or machine-washed towels at 40-60 degrees
8. Ensure that the ST room/chamber is regularly cleaned with an appropriate anti-bacterial agent, at least at the beginning or end of every working day.
9. Ensure that the client's/patient's body is clean and free of any cuts or wounds
10. Ensure that own health, including personal hygiene, does not endanger the health of a patient in any way. Health staff must do the following:
  - A. Cover all cuts and wounds with a waterproof dressing
  - B. Keep nails short and clean
  - C. Wear suitable clean white coat or overall
  - D. Refrain from smoking, eating or drinking whilst engaged in treatment
  - E. Wear no large, loose or dangling jewelry or rings, nor wear loose clothing or hair that might contaminate the treatment area or the patient's skin

- F. Inform your GP early if you suspect that you are suffering from or have been in contact with an Infectious Notifiable Disease and ensure that your general practitioner knows that you are engaged in the practice of acupuncture
- G. Avoid giving treatment when suffering from an infectious or contagious condition.

Caution persons with disabilities left unattended during a treatment about any movement or fall which might cause them injury

Remain with sick/elderly patients at all times when ST is carried out in order to avoid any risk of burn injury

Ensure that patients are able to call your attention immediately at any time they are left unattended or teach them on how to use the alarm system

### **Instructions to clients/patients**

#### **1. Before steam:**

- A. Do not eat
- B. Drink a lot of water
- C. Take a shower
- D. Remove any metals as they can become very hot in the steam room
- E. It is advisable to remove contact lenses as they can become uncomfortable
- F. Food and drinks are not permitted
- G. Glass/sharp items should not be brought into the steam room or shower areas.
- H. Electronic devices with camera/recording are strictly prohibited

## 2. During steam:

- A. Dress lightly to avoid overheating
- B. Stay protected and sit on a towel to reduce the risk of infection and burning
- C. Limit your time in the steam room; not to exceed 10 minutes. Exposure to high temperature for an extended period of time can result in heat exhaustion, heatstroke, heart attack and, on occasion, death.
- A. Steam for only 10 minutes at a time, even if it may feel relaxing
- B. drink plenty of fluids to replace those lost due to perspiration
- C. If you begin to feel faint, nauseated, or your heart rate begins to speed, you should exit the steam room immediately
- D. Please do not interfere with the thermostat/thermometer
- E. The steam outlet can become hot even though a safety guard has been fitted, please ensure you do not come into close contact with the outlet (located below) as it could cause scalding
- F. Please refrain from using lotions or oils in the steam room
- G. Inappropriate behavior is strictly prohibited. If you witness such behavior, please report it to the administration immediately

## 3. After steam:

- A. relax and Take a cold shower
- B. drink plenty of fluids to replace those lost due to perspiration

## **Health & Safety rules and restrictions**

1. Patient's/client's age should not be below 17 year-old
2. Patient safety and Evidence-Based Care in the Practice shall be ensured by the licensed healthcare professional rendering the services
3. Be familiar with and comply with the requirements and provisions of current Health and Safety at Work legislation
4. This places a duty on you to conduct your work in such a way as to ensure, so far as is reasonably practicable, that not only patients and employees but also the public and other visitors are not exposed to risks to their health or safety.
5. Elbow-operated Hand washing facilities must be provided
6. The floor of the equipment should be water-proofed; laid to fall to promote drainage and easily cleaned. It should also be constructed of a non-slip material
7. All floors, passages and stairs shall be properly maintained, and should be kept free from obstruction
8. A thermometer gauge must be present and located on the inside of the unit steam room and outside the steam chamber. The operator must be aware of the temperature the unit is operating at. If this is not fitted the temperature inside, the unit must be checked regularly and in accordance with usage and a log maintained of the temperature recorded.
9. Temperature control and record must remain under the control of the license holder.
10. Every dangerous part of equipment, appliances and machinery must be effectively guarded. The temperature must not exceed 50°C with the humidity at around 100 percent
11. Must have an efficient generator and an air-tight cabin
12. Equipment and machinery should be subject to regular inspection and maintenance where necessary
13. Care should be taken to keep cables as short as possible and routed in such a way as to prevent the risk of tripping

14. There must be a non-verbal alarm system, e.g. a ring bell, linked to a manned reception area for summoning help when users are left unattended. The alarm should continue to sound until it is manually switched to the 'off' position in order to silence it. The user must be made aware of the alert mechanism and how to use it
15. The institute shall have a written policy detailing the action to be taken in the event of the alert mechanism being used. This shall be communicated to all relevant personnel
16. All equipment shall be of sound mechanical construction.
17. The electrical safety, including the adequate earthing and insulation of all equipment, should be examined periodically by Department of Engineering Affairs at MoH. Equipment must be regularly serviced in accordance with the manufacturer's instructions and a record of such services and copies of the report must be kept on the premises for inspection if required.
18. Plan for fire protection, occupant safety and health, and natural hazards mitigation, as well as security for building occupants and assets with a valid Civil Defense License
19. Employ measures to reduce moisture and odor migration to other spaces in accordance with the Department of Engineering Affairs at MoH
20. A clock or timer must be visible in order to monitor time elapsed in the steam room/chamber
21. A notice providing accurate information/client instructions on the safe use of the steam room must be clearly displayed
22. The staff shall provide a procedure (SOPs) whereby all steam rooms are checked on a half hourly basis for cleanliness and for state of health of the user e.g. signs of fainting
23. Glass/sharp items are not permitted in steam room
24. Follow Proper Cleaning and Maintenance Protocols, according to IPC guidelines
25. Prop the steam room door open anytime your facility is closed
26. Spray an antibacterial cleaner on the walls and all seating areas and let sit for several minutes, according to IPC guidelines



27. Scrub down the walls with a brush or firm sponge. Mop or use a scrub brush on the floor using the antibacterial cleaner. Hose down the room to give it a complete rinsing, according to IPC guidelines
28. Leave the door open and the steam generator off upon completion to allow the room to air out
29. A risk assessment must be carried out and documented for this activity to include slipping, tripping, falling, risk of burning, the risk to individuals with pre-existing medical conditions, children and pregnant women and any other hazards associated with the facilities. The risk assessment must be available for inspecting officers at the time of the inspection.
30. Consultation records must be held on the premises and be available for inspection by MoH team as per MoH guidelines
31. The rights, health and safety of persons with disabilities should be maintained
32. Contraindications for ST:
  - A. Pregnancy and children below 17 year- old
  - B. suffer from any of the following:
  - C. fever, migraine attacks, heart disease, circulatory problems, high/low blood pressure, diabetes, kidney disease, Seizures; e.g. epilepsy, any infectious skin diseases/ sores/ wounds, or an illness causing an inability to perspire
  - D. Consumed a meal or alcohol within <two hours.
  - E. Recently exercised. Time should be allowed to enable the body temperature to return to normal.
  - F. Taking any of the following medications: antihistamines, antibiotics, anticoagulants, vasoconstrictors, vasodilators, stimulants, hypnotic or tranquillizer or any other medication which makes the potential user unsure as to the advisability of using the steam room.
  - G. Suffer from any condition whatsoever that makes the user unsure to use steam room

**NOTE: Clients that indicate they suffer from one of the above should be referred to their GP for advice on their suitability to use the facilities.**

## Chapter Three

### Requirements

#### Requirements of construction for STR

1. Construction necessitates waterproofing and vapor-proofing. walls and ceilings should be covered with water-resistant, non-corrosive materials
2. Sufficient space to allow free movement, safe handling of equipment and performance of procedures; minimum of 3x3 square meters
3. Sufficient space for a clean field for equipment/tools
4. Smooth, water-proof flooring Install a center or linear drain and pre-sloped flooring panels on the floor
5. Smooth water-proof surfaces on treatment couches, chairs and other furniture, which is used for treatment
6. Sufficient clean and suitable storage for all items, so as to avoid, as far as possible, the risk of contamination
7. Smooth, easily cleanable surfaces on tabletops, shelves and all working surfaces
8. Furniture, which is clean and maintained according to MoH policy
9. Adequate artificial lighting, heating and ventilation. Avoid vents or fans within the steam room, but install exhaust in the vicinity of the steam room door
10. STR doors must have a glazed panel to allow safe access and egress by clients and supervising staff
11. The door must have an internal handle to allow the client to exit the room when required
12. It is not allowed to use any tools or devices without being licensed by Department of Engineering Affairs
13. All type of therapeutic remedies, drugs (all forms) or supplements are subjected for approval by Department of Pharmaceutical Affairs & Drugs Control
14. A cool shower area should be provided

15. A rest area for users should be provided. Users should be advised to rest for half an hour after treatment
16. Install a steam generator within 15 meters of the steam room and connect via a copper pipe to a steam head within the steam room. Locate the steam head safely away from any seating position. Never install the steam generator inside the steam room or outdoors in an area that is susceptible to freezing or overheating.
17. Design for energy efficiency with an optimal ceiling height of 244 centimeters or less (if possible)
18. Consider adding a fragrance dispensing system. Pump systems add the fragrance through the steam line and standalone systems atomize the fragrance
19. Plan for regular maintenance to keep equipment in order and maintain healthy air quality levels. American college of Sport Medicine's (ACSM) 2019 states "Facilities that offer steam room shall have a technical monitoring system in place to ensure that these areas are maintained at the proper temperature and humidity level, and that the appropriate warning systems and signage are in place to notify members and users of any risks related to the use of these areas, including subsequent unsafe changes in temperature and humidity".

#### **Requirements of construction for STC (see annex)**

1. Construction of steam chamber necessitates waterproofing and vapor-proofing, impervious surfaces
2. Smooth waterproof surfaces on treatment chairs and other furniture, which is used for treatment
3. The steam generator must be kept outside the chamber
4. The steam generator should have a thermostat/thermometer gauge in order to monitor temperature
5. The pipes that connects the generator to the chamber should be heat-proof
6. The pipe that releases the steam (steam outlet), inside the chamber should be insulated properly

7. The room where the chamber is, should have adequate artificial lighting, heating and ventilation
8. It is not allowed to use any tools or devices without being licensed by Department of Engineering Affairs
9. All type of therapeutic remedies, drugs (all forms) or supplements are subjected for approval by Department of Pharmaceutical Affairs & Drugs Control
10. A cool shower area should be provided
11. A rest area for users should be provided. Users should be advised to rest for half an hour after treatment
12. Plan for regular maintenance to keep equipment in order and maintain healthy air quality levels

#### **Pre-requisites of human resources**

1. CM Technician/Medical Assistant/Nurse with 3 years' experience
2. Accredited Sports Management Steam room training
3. Specific manufacturer training for the facility offered
4. Staff should be trained and competent to carry out all duties and responsibilities in an approved manner.
5. Holders of qualifications or training must be able to demonstrate a sound knowledge and understanding of the basic principles of responsible management of such facilities this will include:
  - A. Health & Safety Risks
  - B. IPC
  - C. Client consultation and Contra-indications
  - D. Emergency Action Plan

## **Responsibilities**

Document writer

QC&PS Section

Health Facility Director

Healthcare Professionals

## Chapter Four

### Document History and Version Control

Document History and Version Control			
Version	Description of Amendment	Author	Review Date
01	Initial Release	Dr Zakiya Al Bahri	Nov 2025
02			

### References

1. Complementary Medicine Practice Licensing Guideline, February 2018
2. Guideline for Document Development, August 2022
3. IPC National Guidelines, Oman, 2020
4. Guideline for Enhanced Environmental Decontamination Program in HealthCare Facilities, Oman, June 2020
5. American College of Sports Medicine(ACSM)-Health/fitness Facility Operating Practice Standard 2/ 4<sup>th</sup> Edition, 2019

**Annex:**



kottakkal Arya Vaida Sala Clinic-Ruwi-Oman