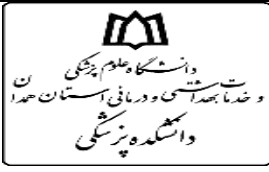


Revision:	Document Code: WI- ML- 2211	Document Title: Standard Operating Procedure (SOP) For Memmert Incubator (Model INB400)	
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1. Objective:

To define the operation, maintenance, and monitoring procedures for the Memmert INB400 incubator, ensuring precise temperature control for microbial cultivation.

2. Scope: This equipment provides a controlled environment with an adjustable temperature range of 20°C to 70°C.

3. Responsibility: The responsibility for implementing this procedure lies with the designated laboratory experts.

4. Operating Procedure:

- **Temperature Setting:** Use the **SET** key to initiate temperature adjustment. Once pressed, rotate the power/control knob to select the desired temperature (Range: Ambient +5°C to 70°C).
- **Display:** The screen indicates current temperature, target settings, time, and the heating element status (indicator light).
- **Operational Requirements:**
 - To ensure optimal thermal stability, the ambient room temperature must not exceed 30°C.
 - Humidity control (up to 40%) can be achieved by placing a water tray/beaker inside the unit.

5. Safety Guidelines:

- **Door Management:** Ensure the door is properly closed at all times. Minimize the duration the door remains open to prevent temperature fluctuations.
- **Sample Placement:** Ensure all samples are placed securely on the provided shelves.
- **Maintenance Safety:** Before cleaning or performing any repairs, the device must be disconnected from the power supply, decontaminated, and allowed to reach room temperature.

6. Maintenance and Cleaning Protocols:

- **Humidity Maintenance:** Maintain a water container (beaker or tray) inside the chamber as required.
- **Routine Cleaning:**
 - Perform a thorough cleaning monthly or immediately following any accidental spill of infectious materials.
 - Use a 10% sodium hypochlorite solution or a professional-grade disinfectant (e.g., Deconex).
 - Use non-abrasive cleaning agents and soft cloths for all internal and external surfaces.
- **Caution:** Avoid contact between cleaning solutions and electrical components. Ensure the interior is completely dry before reconnecting to the power source.
- **Monitoring and Documentation:**
 - Verify internal temperature daily using a calibrated thermometer.
 - Record temperature readings on the designated temperature log/chart twice daily.
 - Maintain updated logs for all maintenance, cleaning, and temperature monitoring activities.
- **Deviation Protocol:** In the event that the incubator temperature falls outside the acceptable range, notify the Technical Manager or Supervisor immediately.

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