

Mavrik 077B7061

Mavrik 077B7061 Temperature Control Unit Instruction Manual

Exact FIT Replacement for DANFOSS 077B7061

1. INTRODUCTION

This manual provides comprehensive instructions for the safe installation, operation, and maintenance of the Mavrik Exact FIT Temperature Control, model 077B7061. This unit is designed as a direct replacement for DANFOSS 077B7061 temperature control units in cooler applications. Please read these instructions thoroughly before proceeding with installation or operation to ensure proper function and safety.

2. PRODUCT DESCRIPTION AND COMPONENTS

The Mavrik 077B7061 is a cooler control unit engineered to maintain specific temperature ranges. Key features and components include:

- **Temperature Range:** Controls temperatures from 9°F to 36.5°F.
- **Cut-in Temperature:** Activates at 22.5°F.
- **Cut-out Temperature:** Deactivates at 16.5°F.
- **Capillary Tube:** A 36-inch long capillary tube for temperature sensing.
- **Control Dial:** A black dial with settings from 1-9, labeled "Colder" for temperature adjustment.
- **Shaft:** D-stem shaft measuring 0.156 inches (3.98 mm).
- **Mounting:** Designed for mounting with 1.3-inch (33.13 mm) center-to-center holes.
- **Connectors:** Includes two 1/4-inch T-connectors.



Figure 1: Complete Mavrik 077B7061 Temperature Control Kit. This image displays the main control unit with its D-stem shaft, a coiled 36-inch capillary tube, a black temperature adjustment dial marked 'Colder' with settings 1-9, a metal mounting bracket, two screws, and three 1/4-inch T-connectors with white insulators.

3. SAFETY INFORMATION

WARNING: Risk of electric shock. Always disconnect power to the appliance before installing, servicing, or removing this control unit. Failure to do so can result in serious injury or death.

- Ensure all electrical connections are secure and properly insulated.
- Installation should only be performed by qualified personnel familiar with electrical systems and appliance repair.
- Wear appropriate personal protective equipment (PPE) during installation.

4. INSTALLATION INSTRUCTIONS

1. **Disconnect Power:** Locate the main power supply to the appliance (e.g., cooler, refrigerator) and turn it off at the circuit breaker or unplug the unit from the wall outlet. Verify power is off using a voltage tester.
2. **Access Old Control:** Open the appliance access panel to locate the existing temperature control unit.
3. **Document Connections:** Before disconnecting, carefully note or photograph the wiring connections to the old control unit. Pay attention to wire colors and terminal positions.
4. **Remove Old Control:** Disconnect the wires and carefully remove the capillary tube from its sensing location. Unscrew or unclip the old control unit from its mounting.
5. **Mount New Control:** Position the Mavrik 077B7061 control unit in the same location as the old unit. Secure it using the provided mounting bracket and screws, ensuring the 1.3-inch (33.13 mm) center-to-center mounting holes align.

6. **Install Capillary Tube:** Carefully route the new 36-inch capillary tube to the original sensing location within the appliance. Ensure the tube is not kinked or damaged during installation. The tip of the capillary tube is where temperature is sensed.
7. **Wire Connections:** Connect the electrical wires to the new control unit's terminals, matching the configuration documented from the old unit. Use the provided 1/4-inch T-connectors for secure connections if needed. Ensure all connections are tight and properly insulated.
8. **Attach Dial:** Slide the black temperature adjustment dial onto the D-stem shaft of the control unit.
9. **Secure and Test:** Close any access panels. Restore power to the appliance. The unit should now be ready for operation.

5. OPERATION

The Mavrik 077B7061 temperature control unit is operated via its front-mounted dial. The dial features settings from 1 to 9, with 'Colder' indicating a lower temperature setting.

- **Adjusting Temperature:** Rotate the dial clockwise for colder temperatures (higher numbers) and counter-clockwise for warmer temperatures (lower numbers).
- **Initial Setting:** For initial setup, it is recommended to start at a mid-range setting (e.g., 5) and adjust gradually based on the desired cooling performance and actual temperature readings within the appliance.
- **Temperature Fluctuation:** Allow sufficient time for the appliance's internal temperature to stabilize after any adjustment before making further changes.

6. MAINTENANCE

Regular maintenance helps ensure the longevity and optimal performance of your temperature control unit.

- **Cleaning:** Periodically clean the exterior of the control unit and the dial with a soft, dry cloth. Avoid using abrasive cleaners or solvents.
- **Capillary Tube Inspection:** Ensure the capillary tube remains securely in its sensing location and is free from kinks, damage, or corrosion.
- **Electrical Connections:** Annually, with power disconnected, inspect electrical connections for tightness and signs of corrosion.

7. TROUBLESHOOTING

If the appliance is not maintaining the desired temperature, consider the following common issues:

- **No Power:** Check if the appliance is plugged in and if the circuit breaker has tripped.
- **Incorrect Dial Setting:** Ensure the temperature dial is set to the desired cooling level.
- **Capillary Tube Placement:** Verify the capillary tube is correctly positioned in the temperature sensing area and is not dislodged or damaged.
- **Airflow Obstruction:** Ensure there is adequate airflow around the appliance's cooling coils and that vents are not blocked.
- **Door Seals:** Check appliance door seals for leaks, which can lead to temperature fluctuations.

If these steps do not resolve the issue, it is recommended to consult a qualified appliance technician.

8. SPECIFICATIONS

Model Number	077B7061
Brand	Mavrik
Temperature Range	9°F to 36.5°F
Cut-in Temperature	22.5°F
Cut-out Temperature	16.5°F
Capillary Tube Length	36 inches
Shaft Type	D-stem, 0.156" (3.98 mm)
Mounting Hole Centers	1.3" (33.13 mm)
Included Connectors	Two 1/4" T-connectors
Item Weight	4.8 ounces

9. WARRANTY AND SUPPORT

This Mavrik temperature control unit is covered by a manufacturer's warranty. For specific warranty terms and conditions, please refer to the documentation provided with your purchase or contact Mavrik customer support.

For technical assistance or further inquiries, please visit the official Mavrik website or contact their customer service department.