

# DFBK01

## DEFROST BOARD KIT

### INSTALLATION INSTRUCTIONS

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### Attention Installing Personnel

As a professional installer, you have an obligation to know the product better than the customer. This includes all safety precautions and related items.

Prior to actual installation, thoroughly familiarize yourself with this Instruction Manual. Pay special attention to all safety warnings. Often during installation or repair, it is possible to place yourself in a position which is more hazardous than when the unit is in operation.

Remember, it is **your** responsibility to install the product safely and to know it well enough to be able to instruct a customer in its safe use.

Safety is a matter of common sense...a matter of thinking before acting. Most dealers have a list of specific good safety practices...follow them.

The precautions listed in this Installation Manual are intended as supplemental to existing practices. However, if there is a direct conflict between existing practices and the content of this manual, the precautions listed here take precedence.


### Kit Contents


Using the following parts list, ensure that all parts included in this list are present and in an undamaged condition.

DEFROST BOARD KIT COMPONENT		
Part #	Item	Qty.
PCBDM101	Defrost Board	1
TERM-222	1/4" Male Multiplier	2
TERM-163	1/4" Fem, QD, Insul, 22-18	6
B1459807	Wire Nut	2

### DFBK01 HEAT PUMP INSTALLATION INSTRUCTIONS ONLY

Please read and follow these instructions carefully.

**WARNING**



**HIGH VOLTAGE!**  
Disconnect ALL power before servicing or installing this unit. Multiple power sources may be present. Failure to do so may cause property damage, personal injury or death.

3. Remove wires from the existing defrost board and remove board.
4. Install new PCBDM101 defrost board.
5. Install fan wires VT20 to terminals "DF1" and "DF2" on the new board.
6. Install one BK13 wire from the defrost thermostat to "DFT" terminal on new defrost board and install remaining BK13 wire to "R" terminal on the new defrost board.
7. Cut wire terminals from one wire from the high pressure switch and one wire from the low pressure switch. Strip wires and wire nut together using wire nut furnished in the kit.
8. Install double wire terminal furnished with the kit on the "Y" terminal on the new defrost board and install YL1 wire from CC terminal on old board to the double terminal on "Y" terminal on the new defrost board.
9. Cut plug from wiring harness from the unit low voltage terminal board and discard. Strip wires and attach wire terminals furnished with the kit.
10. Install the YL wire from the low pressure switch to the double terminal on the "Y" terminal on the new board.
11. Strip YL1 wire from the unit terminal board and the BU wire from the high pressure switch and wire nut together using remaining wire nut.
12. Install remaining double wire terminal on "C" terminal on the new board. Install BK1 wire from CC terminal on old board to "C" terminal on the new board. Install BK1 wire from the unit terminal board to "C" terminal on the new board.
13. Install R24 wire from the unit terminal board to "R" on the new defrost board.
14. Install BU6 wire from the unit terminal board to "W" on the new defrost board.
15. Install OR19 from the unit terminal board to "O" on the new defrost board.
16. Install BK19 wire from the reversing valve solenoid coil to "O" on new defrost board.
17. Install BK20 wire from reversing valve solenoid coil to the low voltage common terminal on the contactor.
18. Turn power on to the indoor and outdoor units and verify operation.
19. After test is complete reinstall control panel cover.


1. Disconnect all power to the unit, both indoor and outdoor.
2. Remove control panel cover from outdoor unit and set aside.




# DFBK01 PACKAGE UNIT INSTALLATION INSTRUCTIONS ONLY

Replacing Part #20214303 Ranco Defrost Board


Please read and follow these instructions carefully.


**WARNING**  
**HIGH VOLTAGE!**  
Disconnect ALL power before servicing or installing this unit. Multiple power sources may be present. Failure to do so may cause property damage, personal injury or death.



1. Disconnect all power to the unit, both indoor and outdoor.
2. Remove control panel cover from outdoor unit and set aside.
3. Remove wires from the existing defrost board and remove board.
4. Install new PCBDM101 defrost board.
5. Install wires removed from "FAN" terminals for condenser fan on "DF1" and "DF2" on new defrost board.
6. Install one wire from defrost thermostat to "DFT" terminal on new defrost board. Install remaining wire from defrost thermostat to either "R" terminal on new defrost board.
7. Install double wire terminal furnished with the kit on the "Y" terminal on the new defrost board and install Gray wire from the contactor coil to the double wire terminal on "Y" on the new defrost board.
8. Install the Yellow wire from the unit low voltage terminal board "Y" to the double wire terminal on "Y" on the new defrost control.
9. Install double wire terminal furnished with the kit on the "C" terminal on the new defrost board and install the Blue wire from the contactor coil to the double wire terminal on "C" on the new defrost board.
10. Install the Black wire from "C" terminal in the unit low voltage terminal board to the double wire terminal on "C" on the new defrost control.
11. Install one wire from the reversing valve solenoid to the "O" terminal on the new defrost control.
12. Install the remaining wire from the reversing valve solenoid to the unit low voltage terminal board "C" terminal.
13. Cut plug from wiring harness from the unit low voltage terminal board and discard. Strip wires and attach wire terminals furnished with the kit.
14. Install Red wire from unit low voltage terminal board to the unused "R" terminal on the new defrost control.
15. Install wire from terminal "W" on the unit low voltage terminal board to the "W2" terminal on the new defrost control.
16. Install Orange wire from unit low voltage terminal board to the unused "O" terminal on the new defrost control.

## Replacing Part #20013701 Heatcraft Defrost Board

**WARNING**  
**HIGH VOLTAGE!**  
Disconnect ALL power before servicing or installing this unit. Multiple power sources may be present. Failure to do so may cause property damage, personal injury or death.



1. Follow steps 1 thru 6 for replacing the Ranco Defrost Board.
2. Install double wire terminal furnished with the kit on the "Y" terminal on the new defrost board and install Blue wire from the contactor coil to the double wire terminal on "Y" on the new defrost board.
3. Install the Yellow wire from the heater kit terminal board "Y" to the double wire terminal on "Y" on the new defrost control.
4. Install double wire terminal furnished with the kit on the "C" terminal on the new defrost board and install the Gray wire from the cooling switch relay to the double wire terminal on "C" on the new defrost board.
5. Install the Blue wire from the heater kit terminal board "C" to the double wire terminal on "C" on the new defrost control.
6. Install one wire from the reversing valve solenoid to the "O" terminal on the new defrost control.
7. Remove the gray wire from the secondary side of the low voltage transformer and install the double wire terminal furnished with the kit on the transformer. Install gray wire removed from the transformer on the double wire terminal. Install the remaining wire from the reversing valve solenoid to the double wire terminal on the transformer.
8. Install Red wire from the heater kit terminal board "R" to the unused "R" on the new defrost control.
9. Install wire from terminal "W" on the heater kit terminal board to the "W2" on the new defrost control.
10. Install Orange wire from the heater kit terminal board to the unused "O" terminal on the new defrost control.
11. Cut the terminal from the Gray wire from the heater kit terminal board "G" and strip wire. Cut the terminal from the Orange wire going to the cooling switch relay and strip wire. Connect the Gray wire and the Orange wire with a wire nut.

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