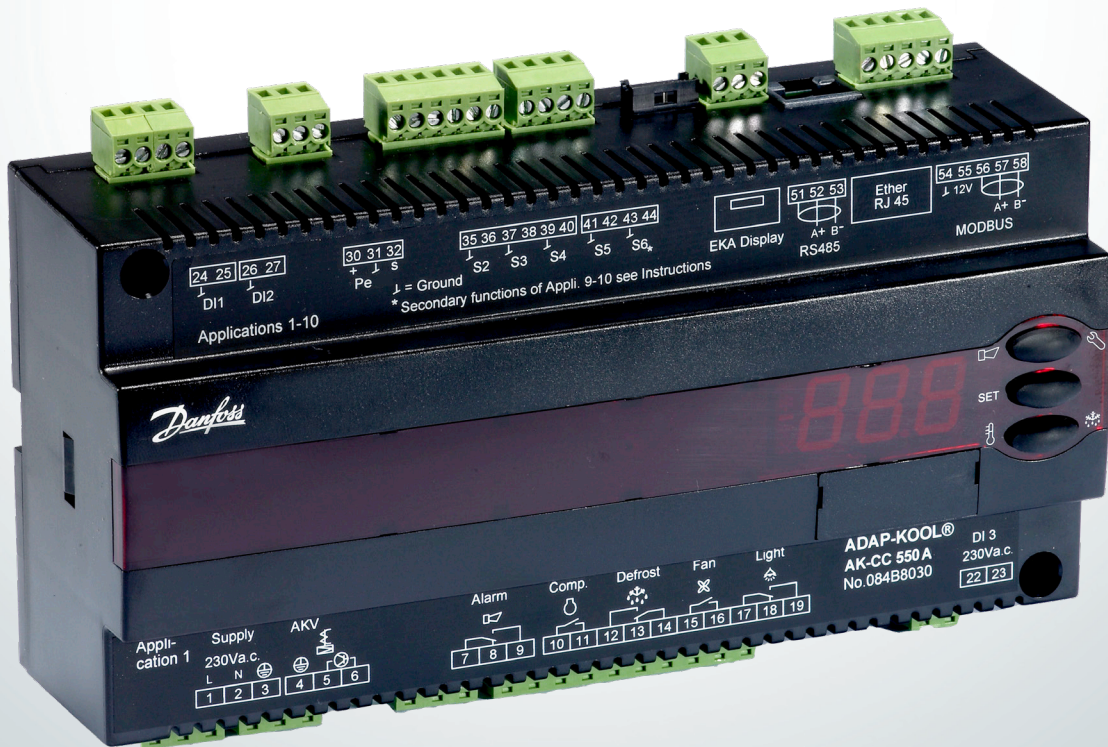


Service Guide

Configuration

AK-CC 550A to AK-SM 800

ADAP-KOOL® Refrigeration Control System



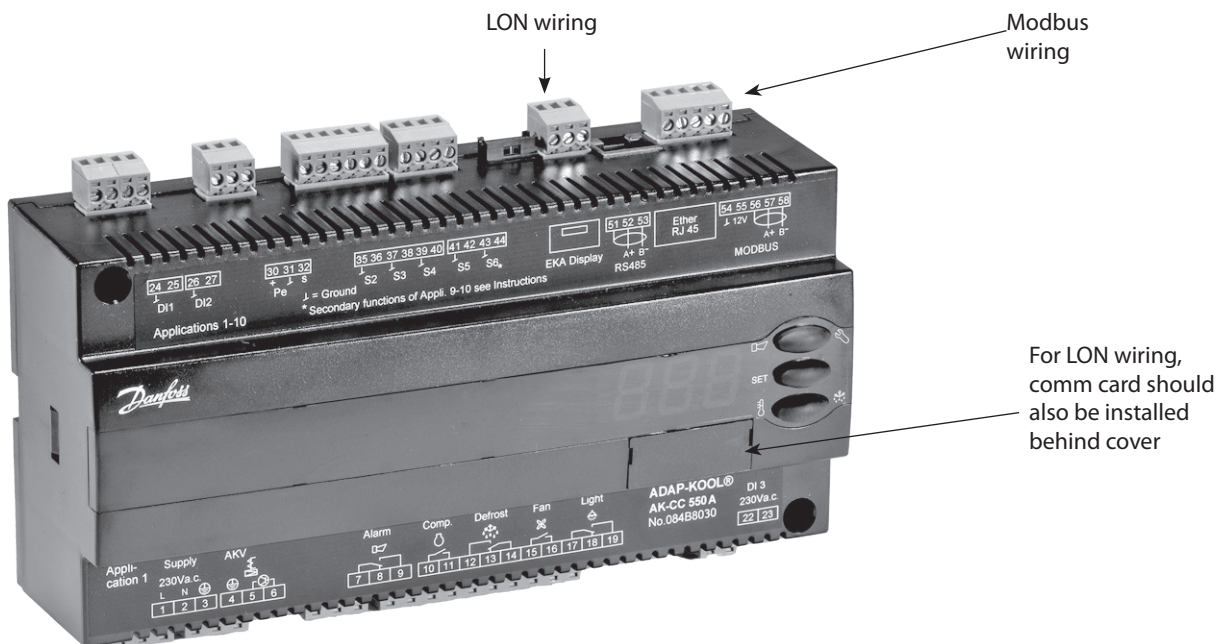
Initial Setup/Checks @ Case Controller

1. Identify type of communication to be used for comm loop to controllers (Modbus or LON). This is determined by plug used for comm wiring at AK-SM 800. See below for example.

Wiring at AK-SM 850/880



Wiring at AK-CC 550A

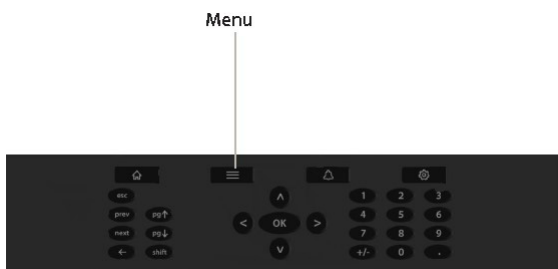


2. With power applied to AK-CC 550A, set parameter o03 (address) and o61 (application). To set:
 - a. Hold top button in for 5 seconds until 'r01' is displayed, then use top/bottom buttons to scroll to each parameter.
 - b. Press middle button on parameter to view value, top/bottom to change to desired value, and middle button again to set.
 - c. Parameter o03 is unique to each controller, and parameter o61 is typically set to '2'.

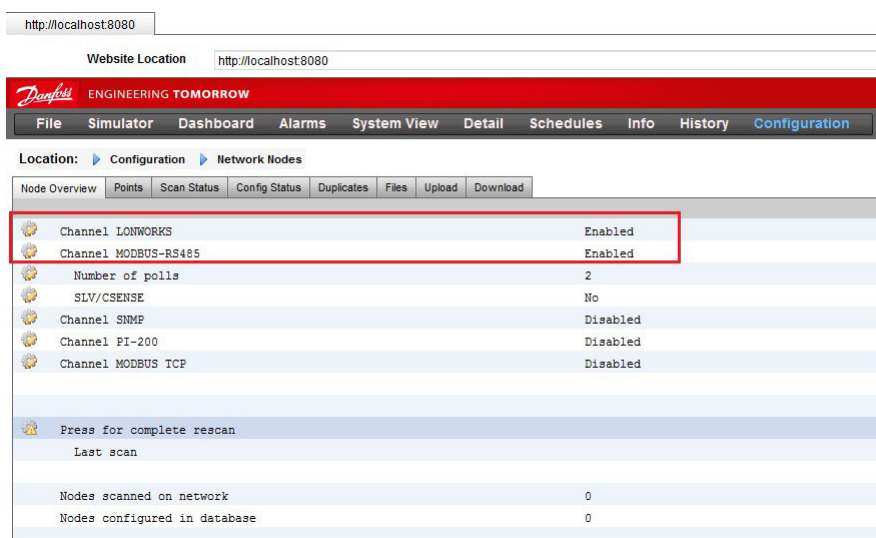
Setup at System Manager

***This section is detailed with the assumption that an existing program is in place including cases and addresses.**

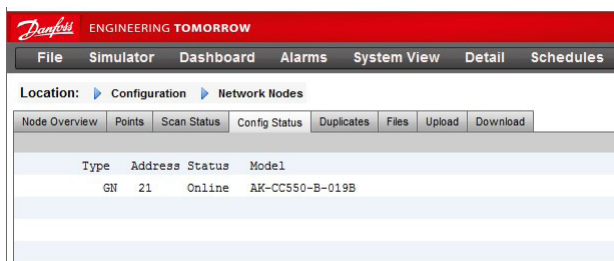
1. At system manager, press Menu button and select '2' for Network Nodes



2. Confirm proper channel (Modbus or LON) is enabled at top of screen. (refer to 1st page for information on how to check which channel you are using if needed). Once confirmed, highlight and select line 'Press for complete rescan'.



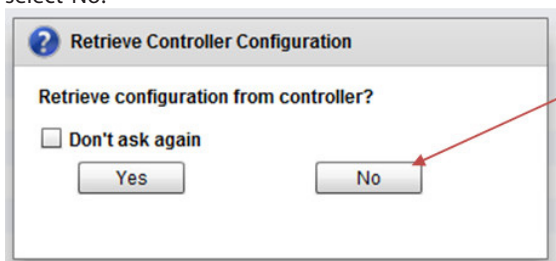
3. Once rescan is complete, navigate to Config Status tab to confirm case controller is online (will need to know address).



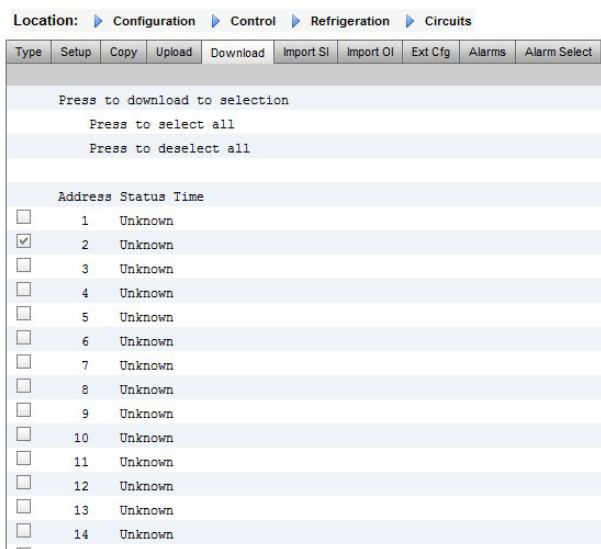
Downloading setpoints to AK-CC 550A

1. In AK-SM 800, navigate to Configuration->Control->Refrigeration->Circuits->Setup->Download.

*If prompted at any point to 'retrieve configuration from device', select 'No'.



2. Select addresses of case controllers to be downloaded, so that check mark appears next to address. Then scroll to top of screen and select 'Press to download to selection'. Controller will timestamp each address after download completes successfully.



Checks for offline AK-CC 550A

1. Wiring
 - a. Comm wiring polarity. LON wiring is not polarity sensitive, but MODBUS wiring is polarity sensitive.
 - b. Is comm loop distance > 1200m? If so, repeater should be added.
 - c. Is there an EOL resistor at end of loop (120 ohms).

2. Case Controller
 - a. If using LON comm, has comm card been installed?
 - b. Does address in AK-CC 550A match address assigned in AK-SM 800?

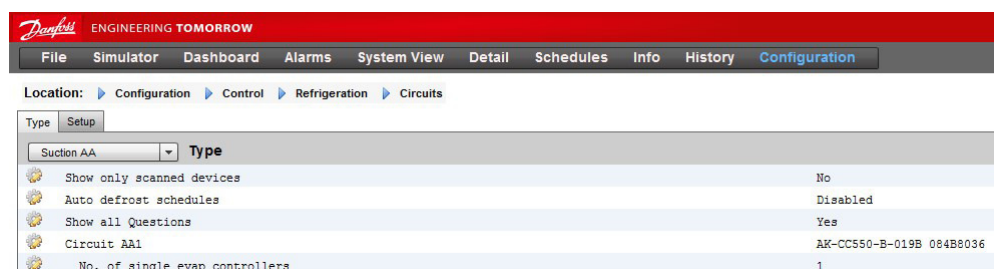
3. System Manager
 - a. Are there >120 case controllers in the program of the system manager? If so, limit has been exceeded. Some controllers will need to be moved to another system manager.
 - b. Check Duplicates tab under Network Nodes to ensure multiple controllers have not been assigned an identical address by mistake.

Other Potential Issues

1. Mismatch. If AK-CC 550A status screen shows 'Mismatch', then controller firmware or application differs from selection in AK-SM 800. To correct:
 - a. Go to Network Nodes-> Scan Status and Locate Address. Note Model listed for address. Model will confirm firmware version and application of device. In example below, '-019' indicates a v1.9 firmware version, and 'B' indicates application 2 (A = 1, B = 2, etc).

Type	Address	Status	Model
GN	21	Online	AK-CC550-B-019B

- b. Go to Configuration->Refrigeration->Circuits. Under 'Type' tab, locate case in list and verify model matches description from Scan Status screen (a). This will also require you to verify selected part # is correct (084B8036 in example below). Part # is printed on case controller.



The screenshot shows the Danfoss software interface. At the top, there is a navigation bar with the following tabs: File, Simulator, Dashboard, Alarms, System View, Detail, Schedules, Info, History, and Configuration. Below the navigation bar, the 'Location' is set to Configuration > Control > Refrigeration > Circuits. The 'Type' tab is selected, and a list of settings is displayed:

Suction AA	Type	
Show only scanned devices		No
Auto defrost schedules		Disabled
Show all Questions		Yes
Circuit AA1		AK-CC550-B-019B 084B8036
No. of single evap controllers		1

- c. If type is not a match, verify whether this is because of part #, application, or firmware.
 - i. For application, verify whether selection in AK-SM 800 is wrong or AK-CC 550A. If in AK-CC 550a, go to case controller and change parameter o61 to correct value. Then rescan. If AK-SM 800 selection is wrong, press +/- key on case controller type and select correct option from list.
 - ii. For part # or firmware, press +/- key on case controller type and select correct option from list.
 - iii. If required part # or firmware is not listed, call or other tech support resource.

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