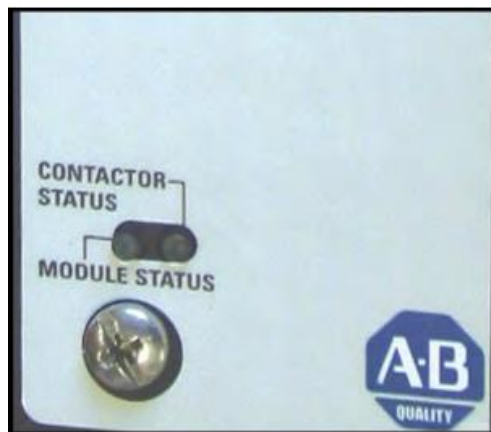


Monitoring and Troubleshooting

Introduction

The IntelliVAC module has two light emitting diodes (LEDs) and relay outputs to indicate the status of the contactor and the IntelliVAC module. The Status Indicator are visible on the front of the module and the relay outputs are accessed on the terminal block of the bottom front of the module.

Figure 18 - IntelliVAC Status Indicators



IMPORTANT This user manual contains information for Series C and Series D IntelliVAC versions. See [Module Status](#) for information about the IntelliVAC series in use.

Module Status

The Module Status is indicated with a Green status indicator if the module is functioning properly and has a valid configuration. If the module powers up with an invalid configuration the status indicator will be Red (flashing once), indicating a Fault condition which will not allow the contactor to close. If the module powers up properly and experiences an undervoltage condition when attempting to close the contactor or while the contactor is closed:

- **Series C** – the status indicator will be Red (Fault). If the contactor does not close properly, a Fault is generated, the status indicator turns Red, and inputs are inhibited until the module power is removed and reapplied.
- **Series D/E** – the status indicator will be yellow (flashing once). If the undervoltage condition is corrected during the selected TDUV interval (as set via DIP switch), then normal operation resumes.

If the processor has an internal fault, the status indicator will be Red, the outputs will be cleared, and the processor must be reset (input power must be cycled). If the reset is successful, the status indicator will be Green and the module will respond to the control inputs. The input command must be toggled before the module will respond to a new command (rising edge triggered).

For Series D/E, the Module Status indicator is also used to indicate various “Warning” conditions related to the contactor performance, see [Table 11 on page 36](#).

The Module Status output relay has a normally open contact. The contact is open during a Fault condition (status indicator red), and closed during a healthy condition (status indicator green). The relay is open for some warning conditions, but closed for less severe issues.

The module states are summarized in [Table 10 on page 35](#) and [Table 11 on page 36](#).

Contactor Status

The Contactor Status is indicated with a yellow status indicator that is off until a CLOSE command is received. The yellow status indicator will stay on if the contactor closes properly, until the contactor is opened. If the processor has an internal fault, the status indicator will be red.

Contactor Status output relay has a normally open contact. The contact is open when the contactor is open (status indicator off), and closed when the contactor has received a close command (for 200 ms) or if it is closed (status indicator on).

IMPORTANT The Contactor will only respond to close command reapplications after the restart delay timer has expired.

The contactor states are summarized in [Table 10 on page 35](#) and [Table 11 on page 36](#).

IMPORTANT The status indicators are red/green types with both sections ON to produce yellow. If viewed from a sharp angle, you may see only green or red. Please view from directly in front of the module to ensure accurate color recognition.

Spare Parts

Spare Parts List

| | |
|---|---------------------------------|
| IntelliVAC (electrically held) Series A ⁽¹⁾ | 1503VC-BMC1- Order 1503VC-BMC4 |
| IntelliVAC (mechanical latch) Series A ⁽¹⁾ | 1503VC-BMC2 - Order 1503VC-BMC4 |
| IntelliVAC (electrically held and mechanical latch) Series B ⁽¹⁾ | 1503VC-BMC3 - Order 1503VC-BMC4 |
| IntelliVAC (electrically held and mechanical latch) Series C and D ⁽¹⁾ | 1503VC-BMC4 - Order 1503VC-BMC4 |
| IntelliVAC (electrically held and mechanical latch) Series E ⁽¹⁾ | 1503VC-BMC5 |
| Internal Fuse: 6.3 A, 250V (Littlefuse 21506.3) | 80174-902-14-R |
| Multi-pole connectors: | |
| 2 pole (module power) | 80174-014-01-R |
| 4 pole (status outputs) | 80174-014-03-R |
| 12 pole (coil and I/O connections) | 80174-014-11-R |

(1) The Series Letter is printed on the large label on the right-hand side of the enclosure, beside the part number.

Optional Equipment

| | |
|-------------------------------------|----------------|
| TDUV Capacitor⁽¹⁾ | |
| 110/120V AC control (1650 µF) | 80158-779-51-R |
| 220/240V AC control (330 µF) | 80158-779-52-R |

(1) Includes mounting bracket and terminal guards.