

Press enter for 5 seconds to go to **MAIN MENU**. Use +/- keys to navigate. The default password for each level is 0-0-0-0.

MAIN MENU

- Run
- Set Up (leads to submenu)



SET UP MENU (default; range)

- Configure (leads to submenu)
- Calibration (follow on screen instructions)
- Contrast (34; 1-63)
- Brightness (80; 0-100)
- Keypress beep (Off; off-on)
- Passwords (default is 0-0-0-0)
- Done --> Main Menu

CONFIGURE MENU

- Cal Config (leads to submenu, see page 2)
- Temperature (requires additional temperature sensor)
 - Temp Units (C; C or F)
 - Low Temp Alarm (0.0 C; 0.0 C-49.9 C/32 F; 32 F-121.9 F)
 - High Temp Alarm (50.0 C; 0.1 C-125.0 C; 122 F; 32.1 F-257.0 F)
 - Show Temp (not enabled)
- Inputs 1, 2 and 3 (volt free, dry contract relays configured for normally opened or normally closed; default activation is close contact). Inputs can be configured as:
 - Alarm disable
 - Night setback
 - External Alarm
 - Sash High (requires additional component)
 - High/low
 - Temperature (requires additional component)
 - Sash Warning (requires additional component)
- Relay Outputs 1, 2 and 3 (volt free, dry contract relays configured for normally opened or normally closed; default activation for each is contacts close on activation). This menu allows user to choose if relay is normally open or normally closed. To set one of the output relays to activate when the alarm changes state — low air, alarm disable, sash high, high/low, night setback, external alarm and sensor error — user must activate feature and any options through the menu for that function (see below).
- Low Air Relay (default is output 3)
- High Air Relay (default is none)
- Alarm disable relay (default is none)
- Sash high (repeat timer on, 10 minutes; 3-30 minutes)
 - Sash High Relay: (default is none)
- High/low Relay (default is none)
- Night setback (maintain low air)
 - Reduce Low Air (49 fpm; 0-49 fpm)
 - Night Setback Relay (default is none)
- External Alarm (LED off/LED on)
 - Display off/display on
 - External Alarm Relay (default is none)
- Low Temp Relay (default is none)
- High Temp Relay (default is none)
- Protocol (Modbus; Modbus-BACnet)
- Modbus Settings
 - Slave ID (1; 1-247)
 - Baud rate (9,600; 1,200-19,200)
 - Parity type (none; none-even-odd)
- BACnet Settings
 - Device Instance (0000001)
 - Station ID (1; 0-127)
 - Max master (32; 1-127)
 - Baud rate (9,600; 9,600-57,600)
 - Parity type (none; none-even-odd)
- Sensor Error Options
 - Buzzer on/off (default is on)
 - Sensor Err Relay (default is none)
- Sash Warning Timer (5 min; 0-60 min)

For more information on the TEL AFA 1000 in North America, contact Holland Safety Equipment at 847-680-9930 or info@hollandsafety.com

The “Cal Configure” menu contains all the parameter settings that may need to be adjusted to complete a successful calibration. The following list shows the parameters and their functions. The default setting for North American customers is listed in parentheses.

1. **Display Units (fpm):** Face velocity display units – **fpm** or **m/sec**
2. **Low Air Alarm (80 fpm):** Sets the low air alarm velocity value; typically 80% of design velocity. The range for this option is 0-200 fpm.
3. **Low Air Cut Off (off):** When enabled, inhibits the face velocity reading from being displayed below the selected value. For example, Low Air Cut Off enabled and set to 50 fpm (default value), the display will stop reading velocity below 50 fpm. This function is useful in situations where the hood blower is switched off and there is still a flow through the hood either from positive room pressurization or from other influences and the monitor is not required to display velocity. The range for this option is 0-200 fpm.
4. **Warning Air Alarm (90 fpm):** Sets the warning air alarm velocity value, the point at which the amber light illuminates, typically 90% of the design velocity. This value must be greater than the low air alarm point. The warning light does not illuminate before velocity reaches the high air alarm value. A sub-option is **Warning Air Reset (3 fpm):** Sets the reset differential value — this is the value the monitor resets into Air Safe above the Air Fail alarm point on rising airflow. The range for this option is 0-200 fpm.
5. **High Air Alarm (off):** Enables and sets the high air alarm velocity value. Typically not used. If enabled, the default value is 295 fpm. The range is 0-999 fpm.
6. **Lower Air Fluctuations (5%):** This parameter monitors the fluctuations in airflow during the low air (first) calibration point. The monitor samples the airflow for 5 seconds and averages the airflow readings, if any of the fluctuations different from the average by more than the parameter value, the calibration will be stopped and a “Fluctuations too high” message will be shown and the calibration canceled. The range for this option is 0-10%.
7. **High Air Fluctuations (10%):** This parameter monitors the fluctuations in airflow during the high air (second) calibration point. The monitor samples the airflow for 5 seconds and averages the airflow readings, if any of the fluctuations different from the average by more than the parameter value the calibration will be stopped and a “Fluctuations too high” message will be shown and the calibration canceled. The range for this option is 0- 10%.
8. **Low High Diff (50 fpm):** This parameter sets the difference required between airflow samples during calibration. If the high air value entered during the second calibration point is too low, a “Low High Diff too low” message will appear and the calibration will be stopped. The range for this option is 0-88 fpm.
9. **Warning to Alarm Time (5 seconds):** This parameter sets a time delay for the Low Air alarm to activate once the Low Air alarm point has been reached. This is to stop the airflow from dropping in and out of Low Air Alarm if the airflow is turbulent and is close to the low air alarm point value. The range for this option is 0-60 seconds.
10. **Alarm to Warning Time (1 second):** This parameter sets a time delay for the air to reset to Air Safe once the warning air point has been reached. This is to stop the airflow from dropping in and out of Low Air Alarm if the airflow is turbulent and is close to the low air alarm point value. The range for this option is 0-60 seconds.
11. **Show Air Flow (on):** This parameter enables/disables the face velocity reading on the display. When disabled the monitor will show ether “Air Safe” or Air Fail”.
12. **Show Time Line (off):** This parameter enables/disables the time line. When disabled, the velocity bar graph (0-200 fpm) is shown at the top of the display window. When enabled, a time line showing the airflow alarm condition for the previous 60 minutes will be shown at the top of the display window.
13. **Audible Alarm (enabled):** This parameter enables/disables the audible alarm. When disabled the audible alarm will not sound in any alarm condition, but the red LED will blink.
14. **Sensor Difference (10%):** This parameter looks at the actual change on the sensor output between the two calibration points to make sure the sensor sees enough change to allow the calibration. If the monitor does not see enough change, a “Sensor diff too low – Check sensor” message will appear. This parameter is useful to ensure the air hose has been connected. The range for this option is 0-100%.
15. **Sensitivity (100%):** This parameter reduces the scale of the monitor so the change in sensor output has a lesser effect on the change in the airflow display. Reducing the sensitivity will reduce the airflow reading at higher airflows so should only be done in small adjustments, typically 5%. The range for this option is 1-100%.

