

Vaccine Storage Data Logger Specifications & Use

Model: Medi-Log[™]II

HLD Controls MAX MIN Medi-Log 0 TEMPERATURE DATA LO

<u>1. Product Overview:</u> The Medi-Log[™]II is specifically designed to monitor and display fridge storage temperatures. The unit will display the temperature inside the fridge, the minimum & maximum temperatures and the alarm status on the main screen. An audible beeper will sound should the alarm set-points be exceeded. The unit comes already set up with vaccine storage high and low alarm set points as well as Department of Health recording interval requirements. Easy to use free software allows the history to be seen as well as graphing functions.

2. Technical Specifications:

- Temperature measuring range of probe: -40°C ~ +85°C
- Temperature range for display: -30°C ~ +70°C
- Temperature accuracy: Between -20°C ~ +40°C = ±0.5°C (outside of this range accuracy = ± 1.0 °C)
- Probe: Thermocouple on 2 meter cable in glycol bottle.
- Probe: Plug-in & easily replaceable.
- Resolution: 0.1°C
- Alarm default: Low alarm = 2°C / High alarm = 8°C
- Alarm: Audible buzzer and visual on LCD screen.
- Data interface: USB cable (included).
- Data logging record capacity: 16,000 point memory.
- Record interval: Default = 5 minutes (otherwise 1 minute ~ 99 minutes).
- Recording delay: Default=30 minutes (otherwise 0 ~ 6hours).
- Battery: AA sized 3.6V lithium battery (included & easily replaced)
- Battery life expectancy: 2 years at 20°C with 15 minute record time and no alarms (display off after 1 minute if no alarm).
- Mounting: Magnetic or hook & loop fastener.

3. Special Features and Use of Medi-Log II:

- Alarm set-points are automatically set by default to low 2°C and high of 8°C when the unit is first powered (these can be changed if required).
- Main screen shows MIN (minimum) and MAX (maximum) temperatures plus current (ambient) temperature.
- All alarms are shown on main screen.
- Start delay is set at a default of 30 minutes (this can be changed if required, anywhere from 0 to 6 hours).



Figure 1

see figure 1 below.

- Main screen will show MAX & MIN temperatures as well and current ambient temperature.
- Should the probe temperature go outside the set range, the unit will alarm. Alarm will be indicated by: 1. audible beeping, and 2. ALM will be shown on screen with an arrow pointing in the direction of the alarm. Figure 2 below.





- Push and hold the button for 2 seconds to silence the audible alarm when alarming.
- Push button for 1 second to show the alarm set-points.
- Push button for 1 second to show the data logger settings, and number of logs already in memory, also to show the average temperature during the data log. See figure 3 below.





- Push button 1 second to show Time & Date.
- Push button 2 seconds to clear the MIN/MAX & AVG readings (only available if no alarm is in progress).
- Push and hold button for 5 seconds to start or stop the data logging function (does not work if there is or has been an alarm and the unit has not been downloaded).
- Download data using free software, suits Windows computers. Easy to use automatic download, easy setup using preset
- template, includes download history.
- Computer connection is by included USB cable.
- 2 Years Warranty on data logger does not include the probe (1 year warranty on the probe)
- Probe can accept HLP Temp Block as glycol replacement (no spill)

4. Operation Instructions:

- Start Recording:
- Open the data management software and set the parameters if you are changing from the default settings, the data logger remains unstarted.
- Press & hold the control button for 5 seconds until the symbol ▶ lights, the data logger will then start. there is a 30 minute delay on recording so that the data logger can be put in place in the

4. Operation Instructions continued:

vaccine fridge & start recording once the probe reaches the correct temperature.

- The ► symbol will flash until the delay time ends and the data logging starts
- NOTE: Historical data held in the memory will be cleared after setting the parameters. Please ensure you have saved your memory data before restarting the unit.
- Stop Recording:
- In full stop mode, the data logger stops recording automatically when the memory capacity is full. It has stoped recording when the symbol is displayed on the screen.
- To use the control button to stop recording, press & hold the control button for 5 seconds until the ■ symbol shows. Recording will stop.
- To stop recording using the data management software, connect the data logger using the USB cable, open the software, download any stored data & then click on the 'Stop Recording' button on the top right hand side of the screen. The data logger will display the solid symbol, indicating it is stopped.
- To restart the data logger after it has been stopped, set the parameters or accept the default settings through the data management software, then start it again.
- Alarm Status:
- When recording, if the alarms that are set are exceeded (eg if the probe temperature goes below the set low alarm or above the set high alarm), the main screen will display ALM.
- If the temperature is above the high alarm set, the up arrow symbol ↑ will display beside the temperature in 'MAX' on the screen.
- If the temperature is below the low alarm set, the down arrow symbol ↓ will display beside the temperature in 'MIN' on the screen.

Recording Interval:

The recording interval (or the time between data records taken) may be set in the data management software in 'Log Interval' when setting the parameters. The default is 5 minutes. The interval may be changed to any amount of time from 10 seconds up to 24 hours.

Recording Duration:

Once the recording interval is set, the data management software will automatically calculate the expected stop time & date. This will be shown on the data management software screen in the 'Expected Stop Time' field (eg: 5 minutes = 16000 = 55 days).

Clearing Recorded Data:

- The stored data may be cleared from the memory by downloading, resetting the parameters and restarting the data logger. It is recommended to store the recorded data before restarting the data logger.
- Clock and Calendar:
- Set and adjust the clock time and calendar date through the data management software.
- Probe Sensor Status:
- If there is a fault with the probe or the probe is not correctly plugged in, the data logger will display ERR on the main screen. If NC is seen in the data when downloaded, this indicates there was a fault with the probe.
- LED Indicator and Buzzer:
- When the data is over the upper/lower temperature limit, the red LED indicator will flash once every 15 seconds.
- When the data logger is connected to the computer, the green LED indicator will light normally.
- When changing the running mode to:
 - unstarted mode, buzzer beeps once & LED indicator flashes once
 - started mode, buzzer beeps twice & LED indicator flashes twice
 - stop mode, buzzer beeps 3 times & LED indicator flashes 3 times
 - start delay mode, buzzer beeps 4 times & LED indicator flashes 4 times.
- Start Delay:
- Set the start delay in the data management software when setting parameters. The default is 30 minutes. Press the control button for 5 seconds until the ► symbol flashes. The symbol will be solid (not flashing) when recording starts.
- Temperature Unit:
- One temperature probe is supplied. The display is C/F switchable, °C is the default

- User Information:
- This is set in the data management software (maximum 5 lines).
- Recording and Saving Modes:
- There are two options which may be set in the data management software in the 'Parameter Tab':
 - Record to stop this will record until the memory is full and then stop (recommended) - Cyclic mode - this will record until the memory is full and then start to overwrite the date from the start again (not
 - recommended)
 - Auto Shortening of Record Interval:
- This function can be enabled in the 'full stop mode'. If record interval is longer than 1 minute and over limit data is detected, the next record interval will be automatically shortened to 1 minute. When the data recovers to the normal range, the record interval returns to the set record interval.
- Average Temperature:
- The average temperature value is displayed on the screen and refers to the average of all of the data currently stored.
- Install Temperature Probe:
- Plug the temperature probe into the side of the data logger.
- **Battery Indications:**

Battery Indicator	Capacity
	25 ~ 100%
	10 ~ 25%
	< 10%

- NOTE: Replace the battery ASAP when battery capacity shows that it is equal to or less than 10%.
- Data Management Software:
- The software can analyse data, display data, and graph data. You can query, save, print and export historical data in excel and pdf. It supports Windows XP, Windows 7, Windows 8 & Windows 10 systems. Please refer to the help file for detailed use.
- Default Parameters:
- Running status: unstarted .
- Record interval: 5 minutes
- Start delay time: 30 minutes .
- Data logger I/D: Medi-Log II •
- Stop by control button: disabled
- Temperature unit: °C .
- High alarm: 8°C Low alarm: 2°C •
- Temperature calibration: 0°C •
- Buzzer alarm interval: 3 beeps then 1 minute •
- Auto screen sleep mode: disabled
- Saving mode: record to full stop
- Set clock: current time
- Set user info: Free text space (eg: fridge name or number, location, area, contact number, etc)
- Installing the Battery:





1. Open the battery compartment.

2. Remove the old battery.

3. Put in the new battery.

4. Close the battery compartment. 5. Product Technical Assistance:

Our technical personnel are available and happy to help with any assistance over the phone during normal business hours by calling our Free Call number: 1800 500 160.

