



# Air Resources Board



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**TECHNICAL BULLETIN (002-3, 102-2, 206-1)**

**All API Analyzers  
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## **Issue**

The Teledyne Advanced Pollution Instruments (TAPI) internal data loggers (iDAS) are factory default to record hourly concentration data. The AQSB's Data Management System (DMS) is configured to ingest minute based data for most parameters. The AQSB's CARBLogger (CL) queries minute-based data from instruments that CL monitors. To provide a possible data back-up in the event that CARBLogger goes down, the OSS requires that all site operators set their TAPI instruments to record minute concentration data.

## **Solution**

Field staff should configure their TAPI instrumentation iDAS loggers to store minute data averages for gaseous data, allowing it to function as a backup source of one minute data.

## **Procedure for Configuring the iDAS for One (1) Minute Averages**

1. **WARNING: RECONFIGURING THE iDAS WILL CLEAR ALL RECORDS.** If you need to archive data, download the data from the analyzer prior to reconfiguring the iDAS. The iDAS can be reconfigured via the front panel controls. From the main menu, press the SETUP soft key
2. Press the DAS key to view the iDAS settings.
3. Press the EDIT key to begin editing iDAS settings. The instrument will prompt for a password. Enter 818 and press ENTR to begin editing the iDAS settings.
4. The "Conc" channel is the default hourly average data channel. For all TAPI instruments this channel is pre-configured with the concentration data and on some instruments a diagnostic channel. Press the EDIT soft key to begin editing the channel.
5. Press SET> until the "Report Period" parameter is displayed. Press the EDIT key until the "Report Period Days" field is displayed. Ensure that "Report Period Days"

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is set to 000. Press ENTR to display the "Report Period Time". Set the "Report Period Time" field to "00:01" and select "ENTR".

6. Press SET> until the "number of records" parameter comes up. Press the EDIT key to change this value. To maximize storage of records, use the following procedure:
  - a) The analyzer will prompt you to clear all data. Press YES if you have backed up your data and move on to step b, otherwise press NO and download the data from the analyzer. After downloading, perform steps 1-6 again.
  - b) Set the number of records to all zeroes. The ENTR button will only appear if the number of records is a valid number, and will disappear if the number of records exceeds available memory. Increment the highest digit (leftmost digit, will either be the "tens of thousands" digit or "hundreds of thousands" digit) by one until the ENTR button disappears. Lower the value by one and press ENTR. The value for this digit is now maximized.
  - c) Perform the procedure in step b for next digit to the right. Continue until all values have been maximized. Once the "ones" digit has been completed the maximum number of records will have been selected. Press ENTR to save the value.
7. Press the SET> key until "RS 232 Report" value appears. Set to OFF and press ENTR, or press SET> if already the parameter is already set to OFF.
8. Press the SET> key until "Channel Enabled" value appears. Set to ON and press ENTR, or press SET> if the parameter is already set to ON.
9. Press the SET> key until "Cal Hold" value appears. Set to OFF and press ENTR, or press SET> if the parameter is already set to OFF.
10. The iDAS is now configured to store 1 minute concentration averages. Press EXIT. The analyzer will display "Creating New Data File" and a percentage counter as it resets data storage. Continue pressing EXIT until the sampler returns to the main screen.

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