

Using DataMate with Vernier LabPro

1. To turn on the calculator, press the **ON** key.
2. To start the DataMate program, press **APPS**, then press **3: DataMate**. You are now at the main screen of the program. On the main screen, a live temperature reading should be displayed for the Temperature Probe in CH1 (in units of °C).
3. The mode should read MODE: TIME GRAPH – 180. To change this, select **1: Setup**. Cursor to **MODE** and select. On mode screen select **2: TimeGraph**.
 - (a) Select **2: ChangeTimeSettings**, then enter the time between samples and the number of samples.
 - (b) To change graph scales, select **3: Advanced**, then **2: ChangeGraphSettings**, then **1: CH#-ProbeType**. Enter values for y -min, y -max, and y -scale.
4. Press **START** to begin collecting temperature data. A live graph of temperature vs. time will be plotted on the calculator screen. The live temperature reading is displayed in the upper-right corner of the graph.
5. Data collection will stop at the time set, or press the **STO▶** key to stop sooner. The graph will expand to fit the screen. As you move the cursor right or left, the time (X) and temperature (Y) values are displayed below the graph. Notice that the probe does not read temperatures instantly; it takes a little time for the probe to respond. Record temperature data.
6. Press **ENTER** to return to the main screen.
7. To save and retrieve data, select **5: Tools** from main screen, then **1: StoreLatestRun** or **2: RetrieveData**. This will retrieve the graph. If you want to view the data, then quit DataMate and select **STAT**, **1: Edit**.