

Using the pH Meter

Important: This electrode does not have a thermometer. The temperature is set to 25C, room temperature. **Only solutions at room temperature can be measured with this electrode.** High temperature solutions will ruin the electrode! This electrode cannot be used for pH < 2 or >12. **Stir bars can break the electrode.** Ensure stir bars are under control and not near the tip of the electrode.

1st: Open the hole in the purple band at the top of the electrode while taking measurements, like in diagram at the pH meter. The electrode fill solution should be visible through this hole, covering the hole.

Rinse the electrode well with DI water. **Do not wipe with kimwipe!**

Standardize the electrode before every use by first using the pH 7 buffer followed by the pH 4 and/or 10 buffer(s). Press the “Standardize” button and follow the instructions. Never wipe the end of the electrode. If your solution molarity is very sensitive to DI water, remove excess fluid by gently touching the electrode with a Kim wipe. **Never rub the electrode!**

Check the mV while you are standardizing the electrode. This is **necessary** to ensure the pH electrode is working properly. If mV values are outside of the following ranges let Joy know;

Buffer pH 7: 0 +/- 50 mV

Buffer pH 4: 165-180 higher than pH 7

Buffer pH 10: 165-180 lower than pH 7 (negative value)

During Use: Never let the electrode tip dry! If you walk away, return it to the storage buffer or keep it in your sample. Re-standardize if you use it for more than 30 minutes or 20 samples.

After use: Rinse the electrode with DI water and return to storage buffer. **Ensure that the hole in the purple band at the top of the electrode is closed.**