

We have a variety of resources available to help you get started. Feel free to visit our website to find out more information on:

Application Notes - <http://www.gamry.com/application-notes/>  
Technical Support - <http://www.gamry.com/service-support/>  
Training Videos - <http://www.youtube.com/gamryinstruments>

## WHAT DOES GAMRY SOFTWARE DO?



### **Gamry Framework™**

Controls your Gamry potentiostat for advanced and flexible data acquisition. Select from standardized experiments that are grouped by research type or use the Sequence Wizard to build complex automated experiments.



### **Echem Analyst™**

Quick and easy data analysis. Open your data files with Echem Analyst to perform specialized analysis algorithms and produce high quality plots. Plots can be customized, overlaid, and scaled, or data can be exported for use in other plotting programs.



### **My Gamry Data™**

The default data folder location for Gamry Framework data files. You will find a shortcut on your desktop after installation. The data folder location can be changed within Gamry Framework by selecting: Options > Path.



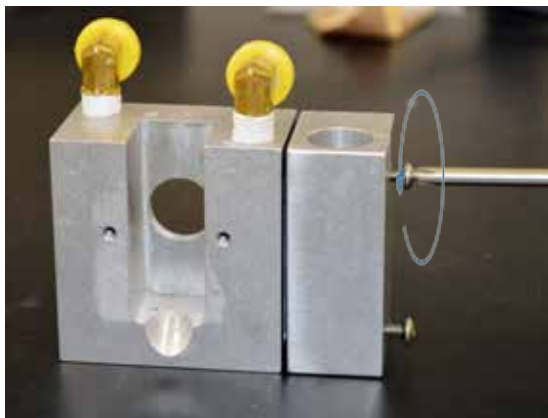
## QUICK-START GUIDE



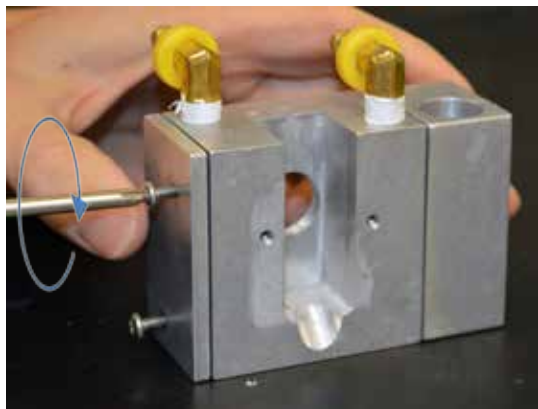
Quick Start Guide

Temperature Controlled QCM Cell

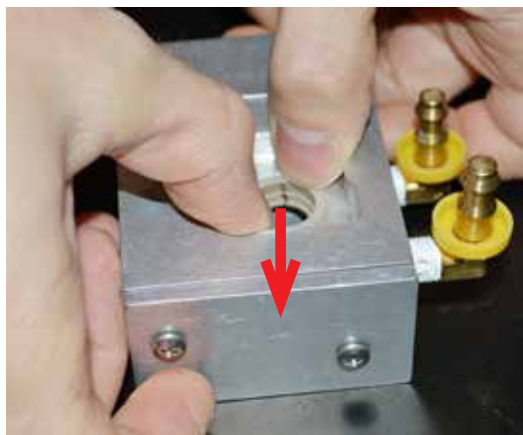
**1** Attach vial-side plate to main block with two long screws. Tighten to snug-fit.



**2** Attach side plate to main block with two short screws. Tighten to snug-fit.



**3** Press PEEK crystal holder into main block.



### Parts list for 990-00400

Part Number	Description	Quantity
971-00043	Main body	1
971-00044	BNC Connector	1
971-00045	Static Cell Module	1
971-00047	PEEK Crystal Holder	1
935-00103	Latex O-ring	1
985-00023	BNC to BNC cable	1
988-00040	Quick Start Guide	1
821-00003	#2 Phillips screwdriver	1
821-00004	#1 Phillips screwdriver	1
955-00009	Tweezers	1
<b>Optional</b>		
971-00050	Flow cell assembly	1



For eQCM flow systems, insert the connection to a peristaltic pump. The connection is a very snug fit.

**i**

Carefully slide the plastic tubing onto the platinum tube. This can be a very snug fit.

You may also connect the plastic tubing to the Pt tube before the assembly is mounted onto the main block (see step 10b).

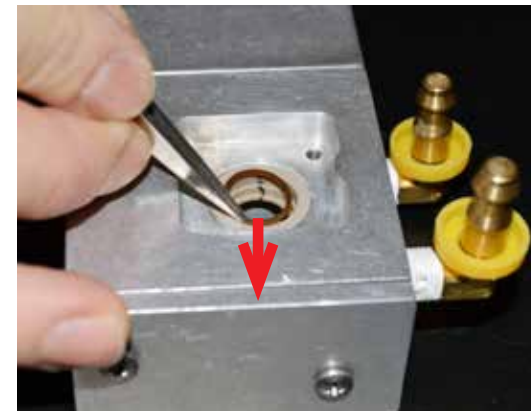


**11** Retest if the quartz crystal is mounted properly as shown in step 8. If it is not, you must remove and readjust the quartz crystal.

**12** Start any optional temperature-control system and optional flow system. Run your experiment.

**4**

Carefully place O-ring into mounted crystal holder.

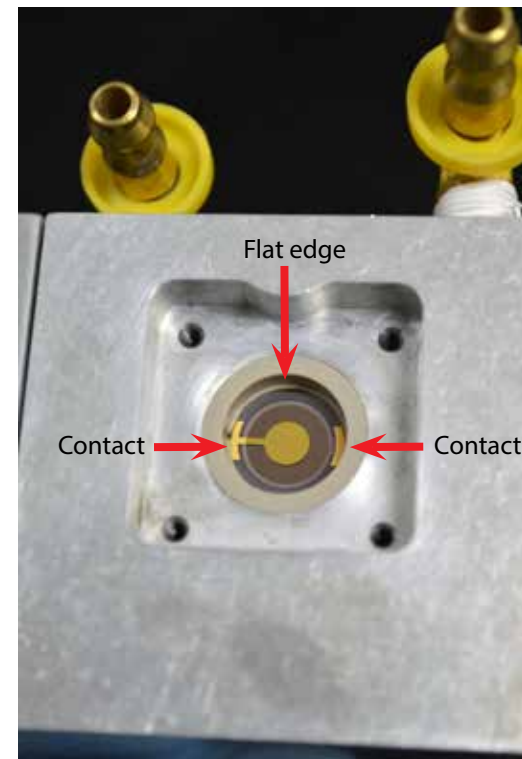


**5**

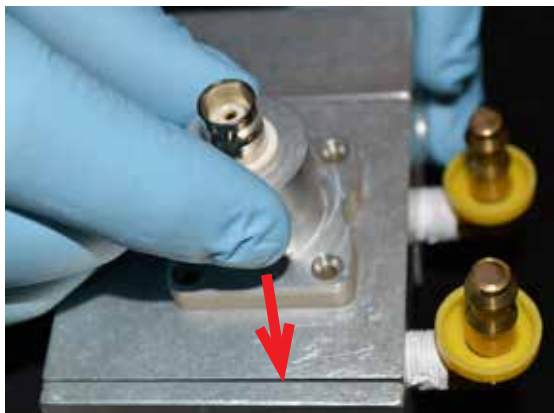
Using tweezers, carefully place quartz crystal into crystal holder.



Note orientation of crystal: The flat edge **MUST** be at the top (12 o'clock position) and the two electrical contacts **MUST** be at the left and right (3 o'clock and 9 o'clock positions).



**6** Press-fit BNC mount into main block, until it is flush with the exterior surface.

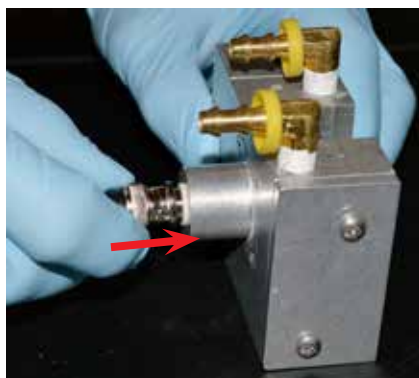


**7** Affix BNC mount to main block with four flat-head screws. Tighten the screws to a snug fit.



**8** Test if the quartz crystal is mounted properly.

**a** Attach BNC cable to BNC mount.



**f** Slide flow cell into main block.



**g** With two thumb-screws, affix capture plate to main block.

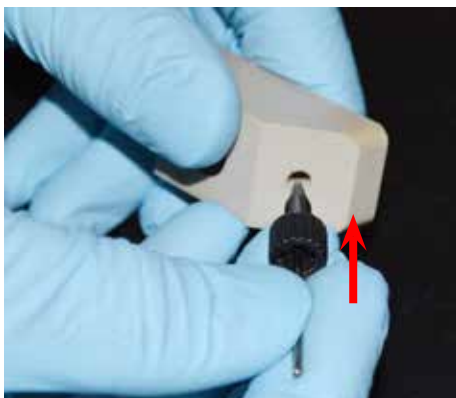


**h** Insert the plastic plug or screw-type reference electrode into the flow module.



For typical QCM flow systems, insert the reference-electrode plug and seal it with an Allen key as shown above. For eQCM flow, see the next page.

**c** Slide platinum tube plus plastic fitting into port on flow cell.



**d** Insert Teflon® tube into other fitting.



**e** Insert Teflon tube plus fitting into other port on flow cell.



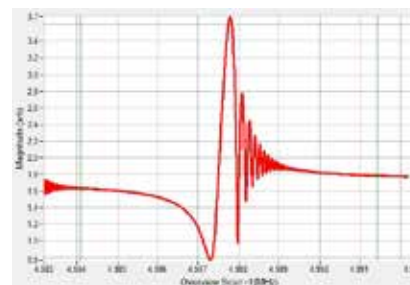
**b** Attach other end of cable to eQCM.

**c** Switch on eQCM, connect eQCM to host computer, and start Gamry Resonator™ software.

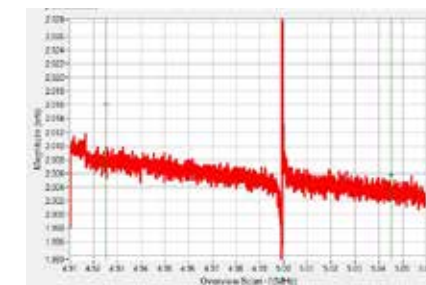
**d** Click the **Single Scan** button to take a scan.



You may need to zoom in to examine the quality of the spectrum.



Good-quality spectrum

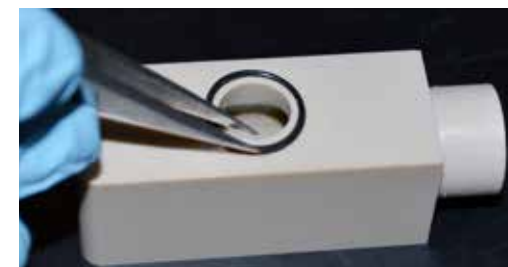


Poor-quality spectrum

**e** If your spectrum is poor, disconnect the eQCM from the main block and remount the quartz crystal according to steps 5 to 8. If your spectrum is good, continue with the assembly.

**9** Attach the static cell.

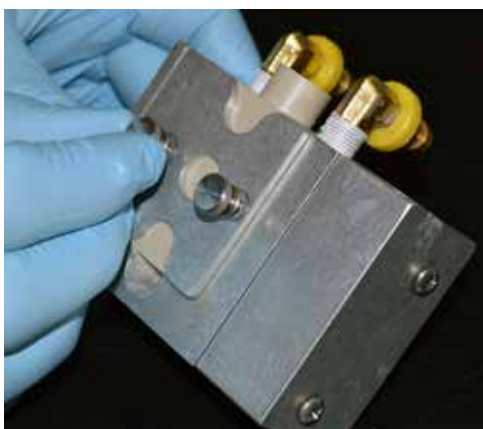
**a** Place the O-ring around the side port of the static cell.



**b** Carefully slide the static cell into the receptacle in the main block.



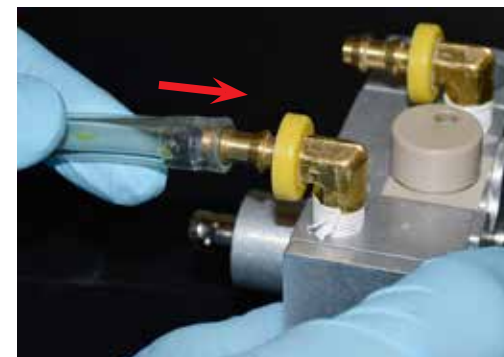
**c** With two thumb-screws, attach the capture plate to the main block.



**d** Slide cap onto top of static cell.

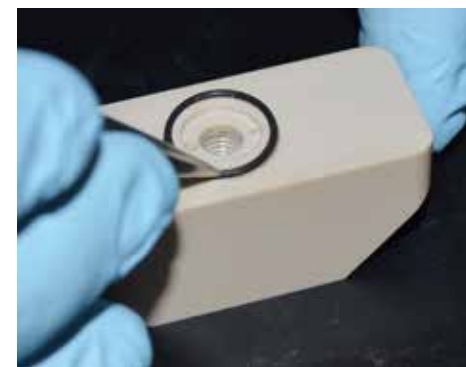


**e** **Optional:** Slide tubing to your temperature-control device onto both brass fittings.



**10** If you have the optional flow cell, assemble flow cell as described here.

**a** Place the O-ring around the side port of the flow cell.



**b** Insert platinum tube into plastic fitting.  
If you wish, you may also connect the plastic tubing to the Pt tube, or you may wait until the plastic fitting is mounted onto the main block.



Carefully slide the static cell into the receptacle in the main block.