

### STARTUP

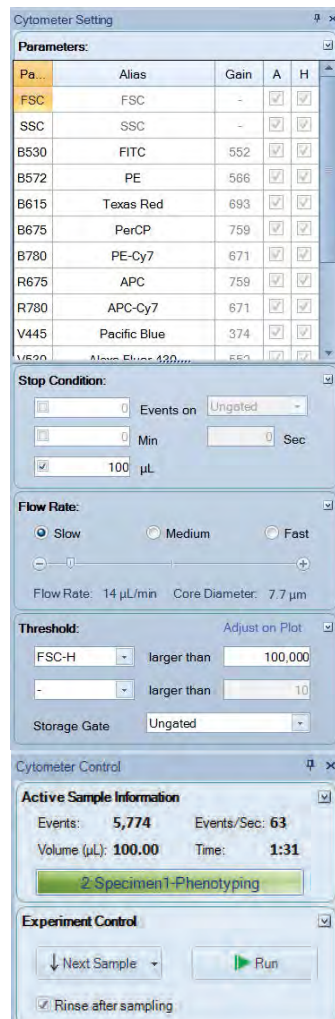
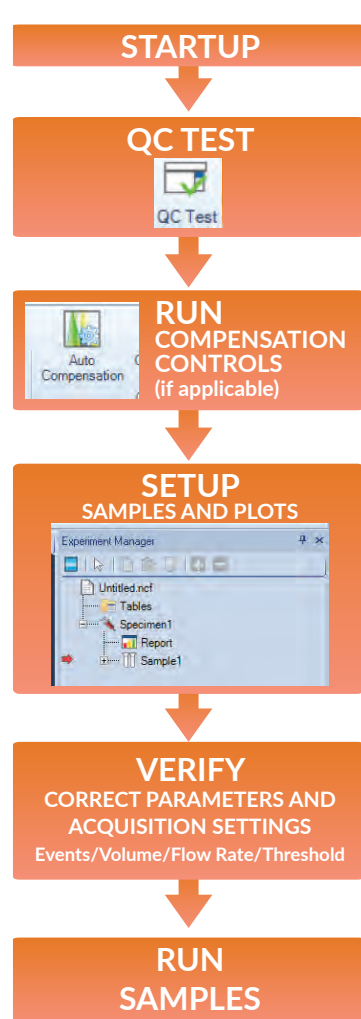
1. Check for adequate levels of the NovoFlow®, NovoRinse®, and NovoClean™ in the fluidic containers. Ensure that each is at least 1/2 full, and preferably empty waste container.
2. Press the power button on the front panel of the flow cytometer to turn on the instrument. Launch the NovoExpress® software on the computer. Startup is automated and takes approximately 6 minutes. Check the instrument status as indicated by the LED indicator on the front panel:
  - Green** = Normal.  
The instrument is ready to use.
  - Orange** = Warning.  
Click on the status bar in the NovoExpress software to review the warning message.
  - Red** = Error.  
Click on the status bar to review the error message.  
Refer to [Section 5: Troubleshooting in the Flow Cytometer Operator's Guide](#).

### QC TEST

1. Add 1 drop of the NovoCyte QC particles to 0.5 mL of dilution buffer (0.4 mL PBS and 0.1 mL NovoRinse solution).
2. On the main menu, click on **Instrument** tab → Under **Operation** Section → Click **QC Test** and follow the software prompts to complete the test.
3. If the QC Test results display Pass or Acceptable, the instrument may be used to acquire data. If any QC Test results display "Fail", refer to [Section 5: Troubleshooting in the Flow Cytometer Operator's Guide](#).

### FLUIDICS MANAGEMENT

1. The software will display a warning message instructing the user to add more reagents when the volumes of NovoFlow, NovoClean, and NovoRinse are less than the set thresholds of 0.9 L, 150 mL, and 150 mL, respectively.
2. To add reagents:
  - 1) Make sure the instrument is Off or in the Ready status.
  - 2) Disconnect the tubing from the container.
  - 3) Bring the container to the sink. Unscrew the cap and add more reagent to the container.
  - 4) Screw the cap back on, reconnect the quick coupler, and return the container back to the fluidics station. Ensure that the tubing is not twisted or kinked.
  - 5) If the instrument was in the Ready status, click **Instrument** tab → Under **Fluidics Maintenance** → Click **Priming** in the software to prime the system before running samples.
3. Similarly, the software will warn the user to empty the waste container when the waste volume exceeds 2.8 L.
  - 1) Follow the steps above to disconnect the waste container from the instrument. Dispose of the contents according to local safety guidelines.
  - 2) Add 300 mL of bleach to the waste container and reconnect the container to the instrument.



### SHUTDOWN

1. Press the power button on the front panel of the flow cytometer. The instrument will automatically perform the shutdown cleaning process and then power off.
2. When completed the LED indicator will turn off.

## QUICK MAINTENANCE GUIDE

### PREVENTIVE MONTHLY MAINTENANCE

#### Clean the SIP (Sample Injection Probe) and the SIP Wash Apparatus

1. Click Instrument → Shut Down on the NovoExpress software.
2. Select Clean sample injection probe option and then click Yes button in the prompted window. The NovoExpress software will guide you to conduct the SIP cleaning procedure.
3. Follow the instructions in the software, remove the sample tube from the tube holder and click OK
4. After clicking the OK button, the sample injection probe will move downward. Prepare a cotton swab or a damp soft cloth with ACEA NovoClean solution (1X) and gently wipe the outer surface of the sample injection probe.
5. Click OK button after cleaning.
6. Please put a tube of filtered DI water or ACEA NovoRinse solution (1X) in the sample holder and click the OK button again. The instrument will shut down automatically.
7. To clean the SIP wash apparatus while the instrument is OFF, prepare a cotton swab soaked with ACEA NovoClean solution (1X). Wipe the SIP wash apparatus' lower surface back and forth until it's clean
8. Prepare a damp cloth soaked with DI water. Wipe the SIP cleaning apparatus back and forth at least five times.
9. Power on the NovoCyte Quanteon instrument and start the NovoExpress software. After the instrument is Ready:
  - Click *Instrument* tab → Under *Fluidics Maintenance* Section → Click *Unclog* to flush the SIP.
  - Click *Instrument* tab → Under *Fluidics Maintenance* Section → Click *Priming* to prime the fluidic system.

Note: Handle the SIP and the SIP wash apparatus carefully when cleaning to avoid damage. Refer to Section 1.1 of *Flow Cytometer Maintenance Guide* for additional information.

### REPLACE FLUIDICS SYSTEM CONSUMABLES

1. The sheath fluid in-line filter is to be replaced every 2 months or when prompted by the NovoExpress® software, whichever comes first. For all other filters (waste and inlet filters, see below), they should be replaced by following the prompts from the NovoExpress software when the maximum accumulated run time has been reached or click *Instrument* tab → Under *Operation* Section → Click *Replace Fluidic System Consumables*. You can see how much time has been accumulated since last filter change by clicking *Instrument* tab → Under *Instrument* Section → Click *Information*. The notification will appear when 176 hours of instrument use has reached.
2. Replace the NovoFlow In-Line Filter as described in the *Flow Cytometer Maintenance Guide* or follow the notification prompt to change all of the filters in the fluidic system listed in the table below.

Fluidic System Consumable Items	Quantity	Catalog Number
NovoFlow® Sheath Fluid In-line Filter	1 EA	2030002
Waste Filter	1 EA	2030003
NovoFlow® Sheath Fluid Inlet Filter	1 EA	2030001
NovoRinse® Solution Inlet Filter	1 EA	2030005
NovoClean™ Solution Inlet Filter	1 EA	2030007