

Analytical HPLC Ultimate 3000 and Vanquish Instrument Shutdown Guide

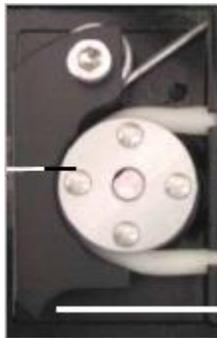
To maximize the lifetime of the HPLC components this procedure should be used whenever the system will be shut down for one week (seven days) or longer. Observe all safety messages and precautionary statements presented in the Operating Manual of the individual modules.

Note: For column storage, please refer to the column manual for long term storage of the installed column. For example, for an Acclaim 120 Reverse Phase (RS):

1. If the column will not be used for a week or more, flush the column with 10 column volumes of a solvent to deionized water mobile phase such as 70:30 Acetonitrile:Water. Plug the column to keep the bed wetted. Do not allow the column to dry out.
2. Then replace the column with a union. If using Viper capillaries be sure to use the Viper union (6040.2304) that was included with your shipkit.



3. Flush the system with a deionized water and methanol, or isopropanol or ethanol (90:10) mixture for 30 minutes at a flow rate of 1mL/min.
4. Remove all solvent bottles to ensure they are made fresh when usage is returned.
5. Thermo Fisher Scientific recommends removing the PharMed tubing from the peristaltic pump. To remove the tubing, slightly press the lever to the right, remove the tubing, and release the lever.
 - a. This will avoid that the tubing remains compressed and does not relax, thus blocking the wash solution



Lift here and pull Pharma tubing out of the peristaltic pump.

6. Remove all samples from the autosampler racks.
7. Empty all waste containers.
8. Turn off the lamps in any UV or RF detectors.

9. For Corona Detectors let the gas run through the detector for an additional 15 minutes, then turn the gas off on the software and then at the source if possible.
10. Turn off all system components from the back of the instrument (or for Vanquish, at the base) and shut down the computer.
11. If planning to ship or move the module to a new location, empty all liquid that remains in the waste line of the rear seal system or outlet of system.

Ensure that the following conditions are met for the system storage:

- Ambient Storage Temperature: -20 C to 45 C
- Ambient Storage Humidity: Maximum 60% relative humidity, non-condensing.

Start Up After Shut Down:

1. Turn on the system and all modules, including the computer.
2. For Corona Detectors, turn the gas back on at the source to ensure it is flowing to the detector. Turn the gas on in the software and ensure it is at an appropriate pressure.
3. Re-install the pharma tubing into the peristaltic pump.
4. Refill all solvent bottles with fresh mixtures. Flush the system with deionized water for 10 minutes at a pressure of at least 200 bar.
 - a. A column (depending on operating specifications) or a restriction capillary could be used to increase the back pressure.
5. Re-connect your column and refer to the column manual for start-up or re-hydration.
6. Turn on any lamps in the UV or RF detectors and allow them to stabilize.
7. The system is ready for operation.