

## All-Guard Cartridge Installation Instructions

- 1) Remove the plastic column endstops used for shipping and storing the HPLC column. Insert the Column Coupler for the All-Guard Cartridge Holder at the column inlet and finger tighten the coupler onto the column. For standard port columns, p/n HI-081 is required. For Waters port columns, p/n HI-881 is required. **If you are unsure of the port geometry of your column, please refer to the latest part number/price list at [www.hichrom.co.uk](http://www.hichrom.co.uk) or contact the Hichrom Technical Support Team via [technical@hichrom.co.uk](mailto:technical@hichrom.co.uk).**
- 2) Insert the guard cartridge into the All-Guard holder assembly. Hand tighten the holder lid onto the holder main body. Initially hand tighten, then using a pair of 9/16" wrenches (p/n HI-226) tighten a further ¼ turn to seal the holder lid onto the holder main body (the spanners should grip the holder lid and holder main body). It is recommended that this seal is not disturbed until the guard cartridge reaches the end of its useful life.
- 3) Attach the All-Guard holder to the coupler end that is protruding from the column inlet (previously installed in step 1), and finger tighten.
- 4) Connect the column and guard assembly to the HPLC system using PEEK fingertight fittings (p/n HI-050X). When not in use, insert column endstops (p/n HI-001) at the holder inlet and column outlet to prevent the column from drying out.
- 5) Replace the guard cartridge when pressure starts to increase and/or chromatography deteriorates.
- 6) To remove the guard cartridge, simply detach the holder from the column coupler (leaving the coupler connected to the column inlet), then use a pair of 9/16" wrenches (p/n HI-226) to loosen the holder lid from the holder main body (the wrenches should grip the holder lid and holder main body). Remove the used guard cartridge and dispose of as detailed within Step 7. Reinsert the new guard cartridge, then tighten the holder as detailed by Step 2, reattach the holder to the column as detailed by Step 3 and connect to the HPLC system as detailed by Step 4.
- 7) Used columns and guards should be disposed of in accordance with local regulations, typically similar to those applied to the samples which have been injected onto the column and guard. Further information is detailed on the reverse of the QC test chromatogram supplied with every column.

### Hichrom All-Guard System

