

Acclaim HILIC-10 Columns

Quick Start

1. Overview

Thermo Scientific™ Acclaim™ HILIC-10 is a general-purpose silica based HILIC (Hydrophilic Interaction Liquid Chromatography) column for separating highly hydrophilic analytes. It may also be used with normal-phase conditions. It is based on high-purity, spherical, porous silica gel that is covalently modified with a proprietary hydrophilic layer.

2. Main features

- Ability of retaining highly polar molecules that would be un-retained by reversed-phase chromatography
- Unique selectivity, complementary to reversed-phase columns.
- Excellent chemical stability
- Rugged column packing

3. Physical Data

Bonding Chemistry: Proprietary covalently bonded hydrophilic layer
Silica Substrate: Spherical, high-purity

Particle Size (µm)	5	3	1.9
Surface Area (m²/g)	300	300	200
Pore Size (Å)	120	120	175

4. Specifications and Recommended Operational Parameters

Shipping solution:	90% acetonitrile / 10% 100 mM ammonium acetate, pH5
Storage solution:	≥80% (v/v) acetonitrile; ≥10 mM ammonium acetate or 100% acetonitrile
Buffer pH Range:	pH 2 – 8
Temperature Range:	< 60° C

5. Operational Guidelines

- Read the Product Manual (User Guide) carefully before using the column.
 - Always use and store the column in buffered condition.
 - Avoid pressure surge.
 - Always use guard columns for real life samples to protect the analytical column and extend its useful lifetime.
 - Operate the column within its operational limits, such as temperature <60 °C, pH (2 – 8) and flow rate (see Table 1).
 - Chemicals, solvents, and de-ionized water used to prepare mobile phase must be of the highest purity available.
 - Use the column following the direction marked on the column.
- The column should not be exposed to ketones (e.g acetone) or aldehydes using use and storage.

Table 1 – Operating pressure and flow rate specifications

Column Dimension	Particle Size	Maximum Pressure (psi)	Typical Flow Rate (Recommended) (mL/min)
4.6 x 150 mm	3 µm	8500 psi	0.8 – 1.5 mL/min
3.0 x 150 mm	3 µm	8500 psi	0.4 – 0.8 mL/min
2.1 x 150 mm	3 µm	8500 psi	0.2 - 0.4 mL/min
4.6 x 250 mm	5 µm	6000 psi	0.8 – 1.5 mL/min
4.6 x 150 mm	5 µm	6000 psi	0.8 – 1.5 mL/min
2.1 x 150 mm	5 µm	6000 psi	0.2 – 0.4 mL/min
2.1 x 150 mm	1.9 µm	10,000 psi	0.2 – 0.4 mL/min
2.1 x 250 mm	1.9 µm	15,000 psi	0.2 – 0.4 mL/min

Table 2 – Ordering Information

	Particle Size	Column Dimensions	P/N
Analytical	3 µm	4.6 x 150 mm	074257
		3.0 x 150 mm	074258
		2.1 x 150 mm	074259
	5 µm	4.6 x 250 mm	079693
		4.6 x 150 mm	079694
		2.1 x 150 mm	079695
	1.9 µm	2.1 x 150 mm	074260
		2.1 x 250 mm	075709
	Guard package of two cartridges (requires holder P/N 069580)	3 µm	4.6 x 10 mm
3.0 x 10 mm			074261
2.1 x 10 mm			074263