



Standard Cartridge Holder and Deashing Holder Instruction Manual

Warranty

Holders received damaged in shipment or defective in workmanship will be replaced if returned within 60 days of the invoice date. No other warranty as to end use, seal life, or performance is made.

Introduction

The Standard Cartridge Holder is a convenient, reusable holder that will accommodate any of Bio-Rad's 30 x 4.6 mm HPLC cartridges. Its function is to connect the cartridge to the HPLC system.

The Deashing Holder accommodates two 30 x 4.6 mm cartridges in series. It is typically used with the Cation H^+ and CO_3^- carbohydrate deashing cartridges.

Installation

The inlet and outlet connections on the holders are zero dead volume connections which use compression type reverse nuts and ferrules for attachment to the HPLC system (see Figure 1). Nuts and ferrules are provided with the holders. To achieve the best results, new connections should be swaged. This is mandatory when replacing cartridge holders manufactured prior to March 1987. If tubing

must be cut, file or grind the tubing end as necessary so that the end cut is perpendicular to the tubing axis, and so that the internal diameter has not been constricted.

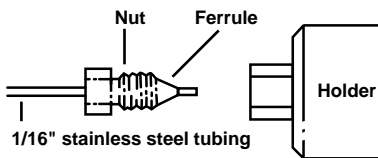


Fig. 1. Connections to the holder.

Use 1/16" 316 stainless steel tubing, 0.010" ID, to connect the holder. See Figure 1. Tighten the assembly of tubing, ferrule, and nut finger-tight. Be sure the tubing end bottoms squarely in the holder fitting. Using a wrench, tighten the nut 3/4 turn past finger-tight. The ferrule will be permanently set against the tubing. The connection only needs to be tight enough to seal, and should not be over-tightened. Repeat this procedure for the other end of the cartridge holder.

Cartridge Installation

Prior to inserting the cartridge, all air should be removed from the tubing. After all air bubbles are removed, the flow rate

should be set at 0.1-0.2 ml/minute while the cartridge is being inserted. To fit the cartridge into the holder, remove one end of the holder. Loosen the other end a few turns. Insert the cartridge into the holder with firm pressure. The cartridge will fit into the holder securely. Fit the free end of the holder onto the cartridge and screw it down. With the Deashing Holder, the center fitting should be placed between the two cartridges in the holder. The holder ends need only be screwed down finger-tight. Further tightening is unnecessary, and may damage the seal or holder. Never use tools to tighten this seal.

Temperature and Pressure Limits

The maximum temperature for the holder is 60 °C. System pressure should not exceed 4,000 psi.

Leakage

If the cartridge holder leaks at less than its rated pressure limit, do not try to force a seal. A leak indicates that the seals are either dirty, scratched, or damaged. If the cartridge holder leaks, the seals should be cleaned or replaced (Catalog number 125-0147).

When using a buffer as mobile phase, rinse the holder's end fittings with water after removing the cartridge. This will prevent salt precipitation which would scratch or damage the seals.

Specifications

Materials in contact with the mobile phase are 316 stainless steel and Kel-F® fluorocarbon.

Ordering Information

Catalog Number	Product Description
125-0131	Standard Cartridge Holder
125-0139	Deashing Holder
125-0028	1/16" Reverse Nuts with Ferrules , Parker type (2 each)
125-0046	1/16" Reverse Nuts with Ferrules , Valco type (2 each)
125-0027	HPLC Connector , 1/16" LDV Reverse Nut Union (1)
125-0040	Stainless Steel Tubing , 1/16" x .010" ID x 3" length, pkg. 5
125-0041	Stainless Steel Tubing , 1/16" x 0.10" ID x 6" length, pkg. 5
125-0147	Seal Replacement Kit
125-0148	Replacement Seals

Kel-F is a registered trademark of the 3M Company.