

MicroClave® Neutral Displacement Connector Use with Power Injectors

The MicroClave family includes the original Neutral Displacement Connector, the MicroClave Clear, and the Antimicrobial MicroClave. The MicroClave is FDA cleared {510(k)100576} as a standalone device and, in connection with pressure rated tubing sets, for use in power injector procedures. The devices will tolerate a maximum of 400 psig or a flow rate of 10 mL/sec of room temperature contrast media (Omnipaque™ 300 Injection, GE Healthcare).

The dead-space of the MicroClave is low (.04 mL), and the fluid path is comprised of a straight rigid cannula with an average flow rate of an 18G needle. This results in a non-turbulent flow pattern that presents minimal restriction and very low internal compliance. Actual infusion pressures required to deliver the desired volume of contrast media are typically far less than the maximum 400 psig. The table below illustrates the typical pressure required to deliver contrast media through a standalone MicroClave. Pressures will increase when used in conjunction with an extension set and will vary depending on the internal diameter and length of that tubing.

Infusion Pressure	Flow Rate
50 psig	>10 mL/sec
95 psig	>12 mL/sec

The MicroClave should be flushed after each use in accordance with facility protocol. The MicroClave does not require change-out or replacement after the pressure infusion procedure and has been tested to tolerate multiple pressure infusion procedures.

If there are further questions or concerns, please visit our website at www.icumed.com or contact the corporate offices at 949-366-2183 or 800-824-7890.

Technical Services
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