



High-Viscosity Vial and Bottle Filling System

Precision Automation for Pharmaceutical & Life Sciences Manufacturing

About

The MLF160A-HV is an advanced servo-driven Monoblock Filling Machine designed to handle a wide range of liquid viscosities — from low-viscosity pharmaceutical solutions to high-viscosity creams, gels, and suspensions.

Developed and assembled in Ireland, it delivers exceptional dosing precision, hygienic performance, and long-term reliability, ensuring full compliance with GMP and FDA manufacturing standards.

With an output capacity of up to 160 units per minute, the MLF160A-HV offers complete automation for filling, capping, labeling, and cartoning — all within a compact, cleanroom-ready footprint built exclusively for the pharmaceutical and life sciences manufacturing industry.



Technical Specifications

Parameter	Specification
Output Speed	Up to 160 units/min
Filling System	Servo-driven peristaltic pump with closed-loop weighing
Material Contact Parts	316L Stainless Steel
Air Supply	6 bar (clean, dry)
Power Supply	480 V / 50 Hz, 3-phase
Operating Temp.	+10 °C to +40 °C
Machine Weight	1.8 Tonnes
Compliance	GMP / CE / FDA ready

Engineered for Excellence

- **Servo-Controlled Filling Precision** – The Watson-Marlow peristaltic drive ensures stable flow control, exact dosing, and clean product handling – ideal for viscous, sensitive, or sterile fluids.
- **Integrated Weighing & Vision Feedback** – Real-time closed-loop weighing combined with Cognex vision inspection provides 100% fill verification and defect detection, ensuring every product meets quality standards.
- **Automated Format Changeover** – Smart recipe management and servo-driven mechanisms enable rapid, tool-free changeovers across multiple bottle, plunger, and cap formats.
- **CIP/SIP Compatibility** – Fully compliant with clean-in-place (CIP) and steam-in-place (SIP) protocols for efficient sterilization and reduced downtime.
- **PLC-based Control Architecture** – With real-time diagnostics and an intuitive HMI interface, it provides process visualization, batch tracking, and remote monitoring – delivering complete control at the operator level



Why Choose the MLF160A-HV

- **Regulatory Compliance** – Built to meet GMP and FDA expectations for aseptic filling and cleanroom operation.
- **Operational Efficiency** – Fast cycle times, reduced manual handling, and automated recipe management enhance OEE and reduce labor cost.
- **Consistency & Traceability** – Continuous monitoring of critical parameters ensures complete batch integrity and traceable production data.
- **Scalability & Flexibility** – Adaptable for multiple formats and future product variations, supporting long-term manufacturing strategy.