

CryoDoser FleX[®] Liquid Nitrogen Dosing

The CryoDoser FleX[®] Liquid Nitrogen Dosing System is the first doser with the ability to serve every dosing application within one unit. Chart Inc. has designed a brand new dosing system that can be used from the slowest production lines to the fastest. The most efficient dosing system to date, the CryoDoser FleX system is the only liquid nitrogen doser you need. With more standard functions than any other doser offered before, the CryoDoser FleX system is ready to change the market.

Features

- **Compact Size** – enables installation in limited spaces
- **Discrete Dosing** – Pack Premier (2000+ cpm)*
- **SoftDose™ Compatible** – Chart's proven technology for hot fill, powder and granular applications
- **MicroDose™ Standard** – the Pack Premier has a controller function that allows dosing pressure adjustments
- **RemoteDose™ Standard** – monitor, troubleshoot and make adjustments while connected to your VPN**
- **ExacTrack™** – with Electro-Pneumatic Head, supreme accuracy is achieved. Proportionally control the amount the actuator opens and make dosing duration changes in increments of 0.1 ms.
- **Warranty** – four (4) year vacuum warranty; highest in the industry one (1) year controller warranty

* Results achieved at Chart laboratory conditions.

** Access to the internal network is necessary for this function.



CryoDoser FleX
Pack Premier



How it Works

LN₂ is supplied to the CryoDoser FleX unit by a vacuum insulated hose and flows into the dosing head. A sensor detects the speed of the line (encoder compatible); a second sensor detects the presence of a container. When a container is detected, the dosing head opens and dispenses an exact amount of pure LN₂. A PLC (Programmable Logic Controller) is the brains behind integrating the sensors and controls via a touch-screen HMI (Human Machine Interface) display.

Key Benefits

- **Lightweight PET** – reduce the weight of PET for cost and environmental savings
- **Glass to PET Transition** – eliminate glass safety hazards and weight of containers
- **Container Rigidity** – maintain shape even with lighter weight containers
- **Eliminate Paneling** – increase the internal pressure to offset paneling issues
- **Oxygen Reduction** – create an inert environment to preserve product freshness
- **Extend Shelf Life** – minimize oxygen levels
- **Ease of Labeling** – consistent container rigidity creates an efficient labeling process
- **Reduce Nitrogen Consumption** – measurable and repeatable liquid doses
- **Maximize Warehouse Storage Space** – increasing product stackability utilizes less square footage
- **Stabilize Organic Products** – extend shelf life without preservatives

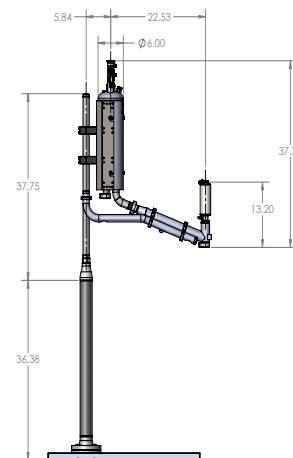


CryoDoser Flex[®] Technical Specifications



Materials	All 316L Stainless Steel
Weight	33 lbs (15 kg)
Body Dimensions	21" H x 6.5" W (533.4 x 165 mm)
Dosing Head Dimensions	DoserEASE = 11" H (279 mm) / EP Head = 7.5" H (190.5 mm)
Arm Reach	12.5" to 20.5" (317.5 to 520.7 mm)
Head Pressure	0.34 psi (0.023 bar)
Nozzles	Ships with 3 Standard Nozzles: 0.020" - 0.100" (0.005" increments) available
System Utilities	Liquid Nitrogen: 3 - 100 psi (125 psi MAWP / 0.2 - 7 bar) Gaseous Nitrogen: 60 - 80 psi (4.1- 5.2 bar) for Purge Electricity: 110 - 240VAC; 50/60Hz, 110W
Steady State Consumption	0.035 gal (0.13 liters) / hour
Vacuum Insulated	Yes
Interchangeable Arms	Yes
Fill Level Adjustment	Yes

CryoDoser Flex[®] Dimensions



Shown with EP Head

Controller Technical Specifications

Model	Pack Premier
PLC Platform	Siemens S7-1200
Display	7" (178 mm) TFT Color LCD Touch Screen
Dose Actuator	DoserEASE or Electro-Pneumatic "EP"
Dose Duration min/max	25 ms to Unlimited
Dose Duration Resolution	0.1 ms
Minimum Dose Volume	0.002 grams/dose
Discrete Dosing cpm (cph) min/max	1 to 2000+* (60 to 150,000)
ExacTrack™	✓
Electronic Dose Targeting	✓
Container Detection	✓
Fixed Delay Mode w/ Step	✓
Repeatability	± 2% of dose
Multiple Languages	✓
MicroDose™ Technology	✓
RemoteDose™ Capable**	✓
SoftDose™ Capable	✓
User Sensor Interface	✓
User Signal Interface	✓
User Ethernet Interface	✓
User USB Interface	✓
Recipe Storage	Unlimited
Liquid Level Control	✓
Liquid Supply Pressure psi (bar)	3 to 100 (125 MAWP) / (0.2 to 7)
Standard Purge	✓
ThermoPurge	Standard
Certifications	UL, CE, IP67, NEMA Type 4

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Your Local Representative



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