Vibrating Tray Feeder
DDW-M-DVT120
Volumetric and Gravimetric

General Information

The DVT120 is an ideal feeder for granules and free flowing bulk materials.

The feeder has the following main components:
A freestanding integrated scale with high resolution strain gauge or digital load cell, a support frame with integrated hopper with the volumes of 90 dm³ (3.18 cuft) or 150 dm³ (5.3 cuft) and a vibrating tray mounted in the frame with electromagnetic vibrating drive.

The tray design provides uniform feed for fragile ingredients due to its vibrating principle of operation which gently discharge material. The electromagnetic vibrating drive features amplitude feedback, ensuring linear feed rate over the entire range.

All modules are fully mounted and internally wired on terminal boxes. The DVT120 can be supplied with integrated control modules.

The gravimetric version includes the MS6 weighing system with strain gauge load cell as well as the digital load System DLS6 and MD6 (for extremely high measurement requirements), featuring a high-resolution digital load cell with serial data transmission with strain gauge load cell with advanced filtering technology.

The unit conforms to CE directives.

Model Specification

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<th>Loss-in-weight feeder</th>
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<td>Weighing system</td>
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<td>Vibrating tray and width (mm)</td>
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<td>Hopper volume (dm³)</td>
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Feeding principle: Vibrating Tray

Drive: Electromagnetic vibrating drive

Adjustment range: 1:80

frequency: 50 Hz

Enclosure protection: IP65

Width of vibrating tray: 120 mm

Mains voltage: 230 V

Control modules

Control and speed modules are offered either mounted onto the feeder (Congrav® CM-E) or are available for mounting in a separate control panel (Congrav® CB-E or Congrav® CB-S).

Controls can communicate directly to most host/PLC systems or to Brabender Technologie Congrav® Operator Interfaces.
Vibrating Tray Feeder
DDW-M-DVT120

Volumetric and Gravimetric

Technical Drawings and Dimensions

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<th>Gravimetric Feeder</th>
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<td>DVT120-90</td>
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<td>DVT120 - 150 dm³</td>
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**Control module CB**
- DDW-MD(S)6-DVT120-90
- DDW-MD(S)6-DVT120-150

**Control module CM**
- DDW-MD(S)6-DVT120-90 CM
- DDW-MD(S)6-DVT120-150 CM

Technical Specification

- **Ambient temperature:** 0°C to +45°C (32°F to 113°F)
- **Humidity of the air:** up to 85% without condensation
- **max. vacuum/pressure:** 3 hPa (3 mbar)
- **Ingredient temperature:** 0°C to +60°C (32°F to 140°F)
- **max. feed rate:** 3000 dm³/h **
- **min. feed rate:** 40 dm³/h **
- **max. bulk density:** 1.5 kg/dm³ *
- **Trough, outlet, hopper, hopper lid:** 1.4301 (304 SS)
- **Non-contact components:** 1.4301 (304 SS) steel galvanized or painted light grey (RAL 7035)
- **90 dm³ (3.18 cuft) hopper or 150 dm³ (5.3 cuft) hopper:** Hopper lid for automatic refilling or manual refilling
- **Vibrating drive:** Diode voltage 157 V, frequency 50 Hz, IP65, Active power 35W, Noise level ≤55 dB
- **Power supply:** AC 230/400 V (110VAC/460VAC)- 50Hz
- **Net weighing range MD6/DLS6:**
  - 263 kg (579.8 lb) with hopper 90 dm³ (3.18 cuft)
  - 256 kg (564.4 lb) with hopper 150 dm³ (5.3 cuft)
- **Net weighing range MS6:**
  - 233 kg (513.7 lb) with hopper 90 dm³ (3.18 cuft)
  - 225 kg (496 lb) with hopper 150 dm³ (5.3 cuft)
- *** other values upon request**
- **** Reference medium: plastic granulate, free-flowing, bulk density 0.5 kg/dm³, grain size 4 mm. For other dosing media, reductions in capacity must be taken into account.

Options and Accessories

- **Flexible inlet and vent connections**
- **Flexible outlet connections**
- **Explosion-proof versions as per directive 2014/34/EU, (ATEX II 2D/- Ex h IIIB T150°C Db/-)***
- **Hygienic Design versions**
- **Filter bag** or JetFilter for vent pipe
- **Cart mounting**
- **Pressure compensation**
- **Higher or lower temperature versions**
- **Cleaning and refill systems upon request**