

## Continuous Loss-in-Weight feeders Model GVF

- Highly accurate ( $\pm 0.5\%$ ) and reliable design
- Vibratory drive is oil free with no wearing parts
- Continuous Loss-in-weight or batch control
- Fully enclosed option
- Dust tight version
- 1:20 control range (95% turn down)
- Grade 316 Stainless Steel contact surfaces



### Application

Continuous Loss-in-Weight feeders can be configured to continuously control the feed of material, measure a feed rate or batch a quantity of material into industrial process.

The sturdy, reliable design makes the flexible wall feeders suitable for the use in the following industries:

- Plastics
- Food
- Chemical
- Stock feeds
- Pharmaceutical

Over volumetric feeding devices, the application of vibratory loss-in-weight feeders ensures improved final product.

### Construction

The standard feeder package consists of:

- Grade 316 Stainless steel contact surfaces
- Powder Coated mild steel support frame
- Conical hopper with high side wall angle
- Two double ended shear beam stainless steel load cell
- Oil free drive with control range 1:20 (95% turn down).
- Power and signal junction box

Optionally can include:

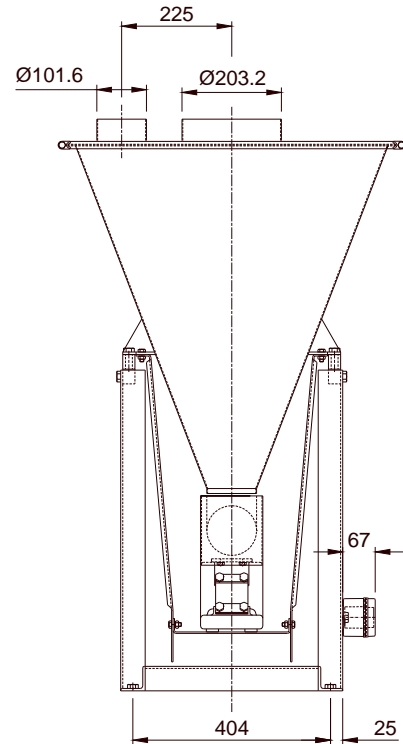
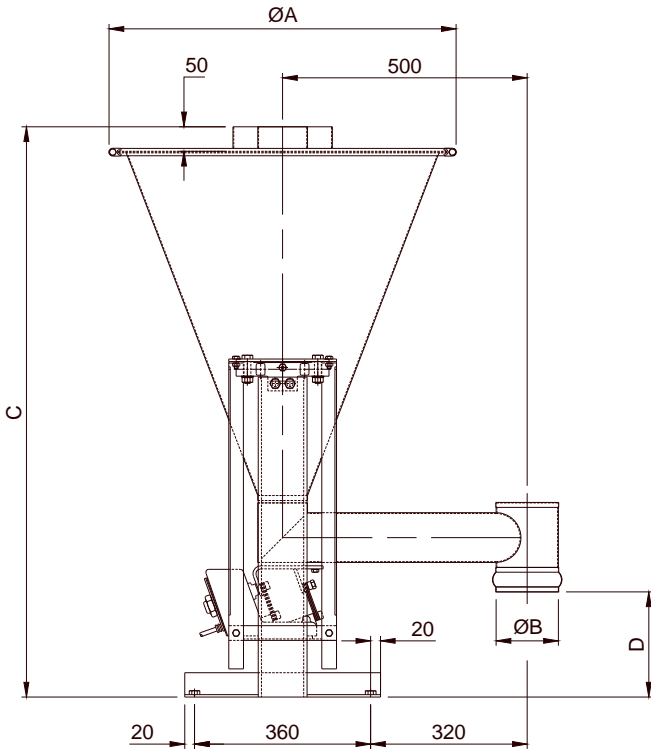
- Gravimetric isolation (flexible connections)
- Re-fill vent or dust sock
- Material extension hoppers
- Re-fill gates and valves
- Special frame configurations for bulk bag unloaders.

### Operating Principle

Continuous Loss-in-weight feeders measure the change in hopper weight with respect to time, this gives a feedrate which can either be measured or internally evaluated via a PID loop to form an output to the feeder drive to maintain a pre-set feedrate. When the hopper weight reaches a pre-programmed lower limit the controller maintains output feedrate, volumetrically, while the refill device fills the hopper to the pre-programmed upper limit – at which point the controller resumes gravimetric control.

Similarly the GVF feeders can also be used with loss-of-weight (or batching) controller to meter a pre-set amount of material into a process.

## Standard Dimensions



Model	Feedrate (ltrs/hr)*	Hopper (ltrs)	Dim A	Dim B	Dim C	Dim D	Wt. (kg)
GVFL50.80	20-400	80 litre	710	76	1165	240	75 kg
GVFL50.200	25-500	200 litre	940	76	1465	240	90 kg
GVFM100.80	50-1000	80 litre	710	127	1165	215	85 kg
GVFM100.200	125-2500	200 litre	940	127	1465	215	100 kg
GVFM100.350	125-2500	350 litre	940	127	1715	215	120 kg
GVFH150.200	150-3000	200 litre	940	203	1465	85	110 kg
GVFH150.350	500-5000	350 litre	940	203	1715	85	130 kg

## Options and Accessories

- Wide variety of pan designs precisely engineered to the materials to be fed
  - Standard Open Pans, *cost effective high capacity feed pan for non-dusty granular material*
  - Tubular design with downspout, *for materials with inherent dust (dust tight applications) for simple connection to downstream equipment.*
  - Pan length extensions, *in 50mm increments to suit plant layout requirements*
  - Quick acting valve on outlet, *for precise batching applications*
  - Pan Materials and construction, *Options include Grade 316 Stainless Steel, Teflon coating, wear liners and heated liners*
- Extension hoppers Stainless Steel, with flexible connections and vent pipe (or filter socks) for automatic refilling.
- Gravimetric re-fill hoppers and gates
- Bulk bag unloading frames and sack unloading systems (manual unloading stations)

Due to our policy of continuous improvement, dimensions and specifications may change without notice. \* maximum theoretical feed rate, based on free flowing material and 100% filling, actual feed rates depend on material and may decrease to 50% of nominal rate. Have all applications and specification reviewed prior to final design and all dimensions certified for installation purposes.

