

Ext. communication to host system
 A Feeder
 B Weighing system
 C Control Module
 D Operator interface

Each Coperion K-Tron Weigh feeder consists of the components A, B, C and D.

Component A is specified here.

Application

Gravimetric feeding of flakes, chips, pellets and similar bulk materials. The feeder can be equipped with an optional agitator for feeding powders with special characteristics [e.g. powders with very low melting points, powders with wax additives, or powders with very abrasive characteristics].

Design

The belt feeder with drive unit and storage hopper are mounted on a 3-point weighing system. The housing is made of stainless steel. The removable side cover is equipped with a window for observing the material flow. Slide gates at the hopper outlet allow the material flow to be easily adjusted. The easy to clean belt is made of a polyurethane coated polyester. The unit can be easily cleaned by sliding the conveyor out of the housing. For bulk materials which tend to clump, a brush is fixed at the outlet of the belt.

Controller: [see separate data sheets]

The SmartConnex™ control system allows individual or multi-component control. Each feeder has its own control module. Connection between feeders, operator interface and smart I/O is via an industrial network. A variety of protocols is available for connection to the plant's host system.

Hazardous Location Options:

NEC Class II, Div. 2, Groups F & G / Class II, Div. 1, Groups F & G
 Class I, Div. 2, Groups C & D / Class I, Div. 1, Groups C & D
 ATEX 3D/3D [outside/inside]



Sample Feed Rates

The theoretical throughput range is influenced by feeder configuration and material characteristics. The sample feed rates below were tested with a free-flowing material [semolina, bulk density 0.783 kg/dm³].

Attention: Actual feed rates depend on individual material characteristics. For feed rates at the upper or lower limits of the theoretical range, check with a Coperion K-Tron Test Lab.

Gear transmission		20 : 1
Belt speed		0.15 - 9.5 m/min [0.5 - 31.2 ft/min]
Max. feed rate range	dm³/h	0.1 - 1400
	ft³/h	0.004 - 49.4

Feed rates shown are with servo motor and KCM controller (max. motor speed 2000 RPM). For feed rates with DC or AC motors consult factory.

Coperion K-Tron Product Specification Loss-in-Weight Belt Feeder

K-ML-FB130

Configuration

Description	Selection	Remarks	Weight kg [lb]
Vertical agitator	KS: 230/400 VAC 180 W, IP55		17 [37.4]
Cover		4D	2.5 [5.5]
		6D	5.5 [12]
Extension hopper	Adjustable inlet size: max. 70 x 20 mm [2.76 x 0.79 in] min. 20 x 1 mm [0.79 x 0.04 in]	4D - 25 dm ³ [0.9 ft ³] 4D - 50 dm ³ [1.8 ft ³] 6D - 75 dm ³ [2.6 ft ³]	4 [8.8] 6 [13.2] 11 [24.2]
Motor	Servo motor - 800 W, 240 VAC, IP65 KCM-III requires 230 VAC single phase (US split-phase, 3 wire balanced, L1-N-L2)		
Outlet	Vertical outlet Pressure compensation	std: vert. outlet	
Weigh bridge [gross capacity]	30 kg 66 lb 60 kg 132 lb 90 kg 198 lb 120 kg 264 lb	IP65, NEMA 4 Gross weigh bridge capacity = 3 x K-SFT	33 [72.6]

Materials:

Material contact parts: Stainless steel
DIN 1.4404, 1.4435 (AISI 316L)

Belt: polyester weave,
polyurethane coated

Painting: Light gray RAL 7035

Weighing Range:

Gross weighbridge capacity (e.g. 3 x 60 = 180 kg) less total feeder weight and less 10% reserve

Temperature-Limits:

Ambient: 0...40°C [32...104°F]

Material: 0...50°C [32...122°F]

for other material temperatures contact factory

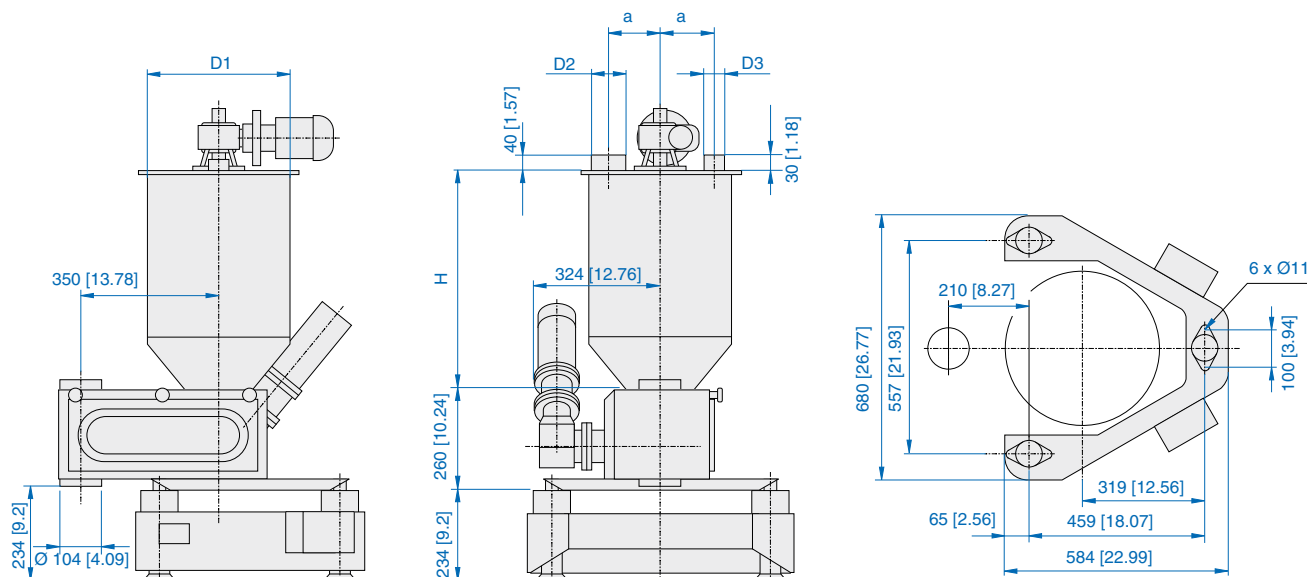
Dimensions mm [in]

Hoppers

	H	D1	D2	D3	a
25 L	375 [14.8]	363 [14.3]	104 [4.1]	54 [2.13]	135 [5.3]
50 L	575 [22.6]	363 [14.3]	104 [4.1]	54 [2.13]	135 [5.3]
75 L	469 [18.5]	597 [23.5]	154 [6.1]	104 [4.1]	220 [8.7]

Options

- 1 Vertical agitator
- 2 Outlet with pressure compensation
- 3 Brush
- 4 Inlet chute for manual refill



Caution: these measurements are for general reference only. Please consult dimensional drawing for exact measurements