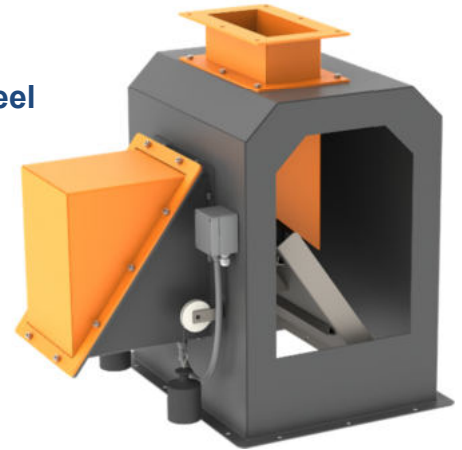


► ImpactWeigh

- Impact scale for free-flowing and abrasive bulk materials
- Weighing in vertical process cycles
- For flow rates from 5 to 400 m³/h
- Robust housing made of mild or stainless steel
- Separate product and measuring chamber
- Weighing mechanics completely made of stainless steel
- With static adjustment device (optional)



DESCRIPTION:

The impact scale ImpactWeigh records the quantities during the fall of the bulk material through the scale. Therefore, the ImpactWeigh is particularly suitable for weighing of free-flowing bulk materials which are homogeneous in bulk density and grain size.

The scales of the ImpactWeigh series consist of a stable housing, the impact plate with a special mounting system and the measuring chamber. The separation of product and measuring chamber secures the weighing system and allows also the use in dustproof and Ex zones (optional).

The ImpactWeigh features further advantages: compact dimensions and a low installation height, an elementary design enables an easy and quick installation of the scale. Another beneficial feature is the measuring chamber which can be opened from outside. Repair work can thus be done much more easily and quickly.

The ImpactWeigh is often used for weighing applications in closed dosing or conveying systems, such as recording of in-process material flows, inventory control or optimization of truck or wagon loading.

FUNCTIONING:

The solid flow is conveyed with constant drop height through an inlet to the inclined impact plate.

According to the formula
Force = Mass x Acceleration

the product flow rate produces a constant force impulse upon the impact plate and a horizontal deflection.

The high-precision strain gauge load cell transforms the deflection into an electrical signal which is scaled and displayed by the control unit.

Due to the special suspension of the impact plate, material deposits on the impact plate do not influence the zero-point stability of the scale. Only horizontal forces are transmitted into the measuring chamber.

The ImpactWeigh impact scale has to be integrated into a conveying system in such a way that a constant output speed of the bulk material is guaranteed. Screw conveyors, rotary valves, bucket elevators, vibrating chutes, conveyor belts or scraper conveyors can be used to this effect.

TECHNICAL DATA:

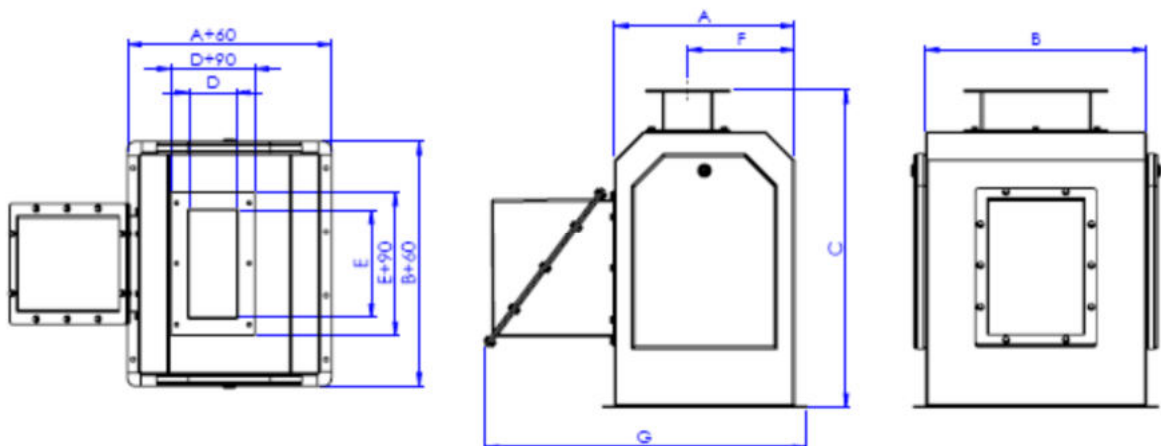
Impact scale ImpactWeigh

Load cell*:	full bridge strain gauge load cell
Material:	stainless steel
Supply voltage:	nominal 10 V DC (via the control unit)
Rated output:	2 mV/V
Output resistance:	350 Ω
Electronic overload:	double nominal load related to nominal flow rate
Electrical connection:	6-wire cable
Combined measuring error:	+/- 1 % to 2 % in the range from 50 % to 100 % of max. flow rate and tested application in the temperature range from -10°C to +40°C
Operating temperature range:	-25°C to +80°C (high temperature option for product temperatures up to +150°C)
Environmental protection:	IP 65 (load cell IP 67)
Material housing:	steel, primed and painted in RAL 7016 or upon request inlet and measuring chamber in RAL 2011 or upon request alternatively stainless steel 1,4301 (AISI 304) or 1,4501
Material impact plate:	stainless steel 1,4301 (AISI 304) or 1,4501, optionally with wear protection or coating to increase the gliding properties
Material weighing mechanic:	stainless steel AISI 304 (1.4301)

* For data of the load cell, please see the type plate.

Table with types, dimensions and weight of the scale:

Scale type	Flow rate in m ³ /h	A in mm	B in mm	C in mm	D in mm	E in mm	F in mm	G in mm	Weight in kg
IPW 10	5 - 10	450	553	794	60	200	267	807	100
IPW 25	10 - 25	450	553	794	60	200	267	807	100
IPW 50	25 - 50	450	553	794	100	200	267	807	100
IPW 100	50 - 100	450	553	794	120	270	267	807	100
IPW 150	100 - 150	450	806	794	120	400	267	807	120
IPW 200	150 - 200	450	806	794	120	500	267	807	140
IPW 250	200 - 250	450	806	794	120	600	267	807	140
IPW 400	250 - 400	450	1164	789	140	750	267	807	180



The right of technical changes is reserved.
D00185e State: 08/2020