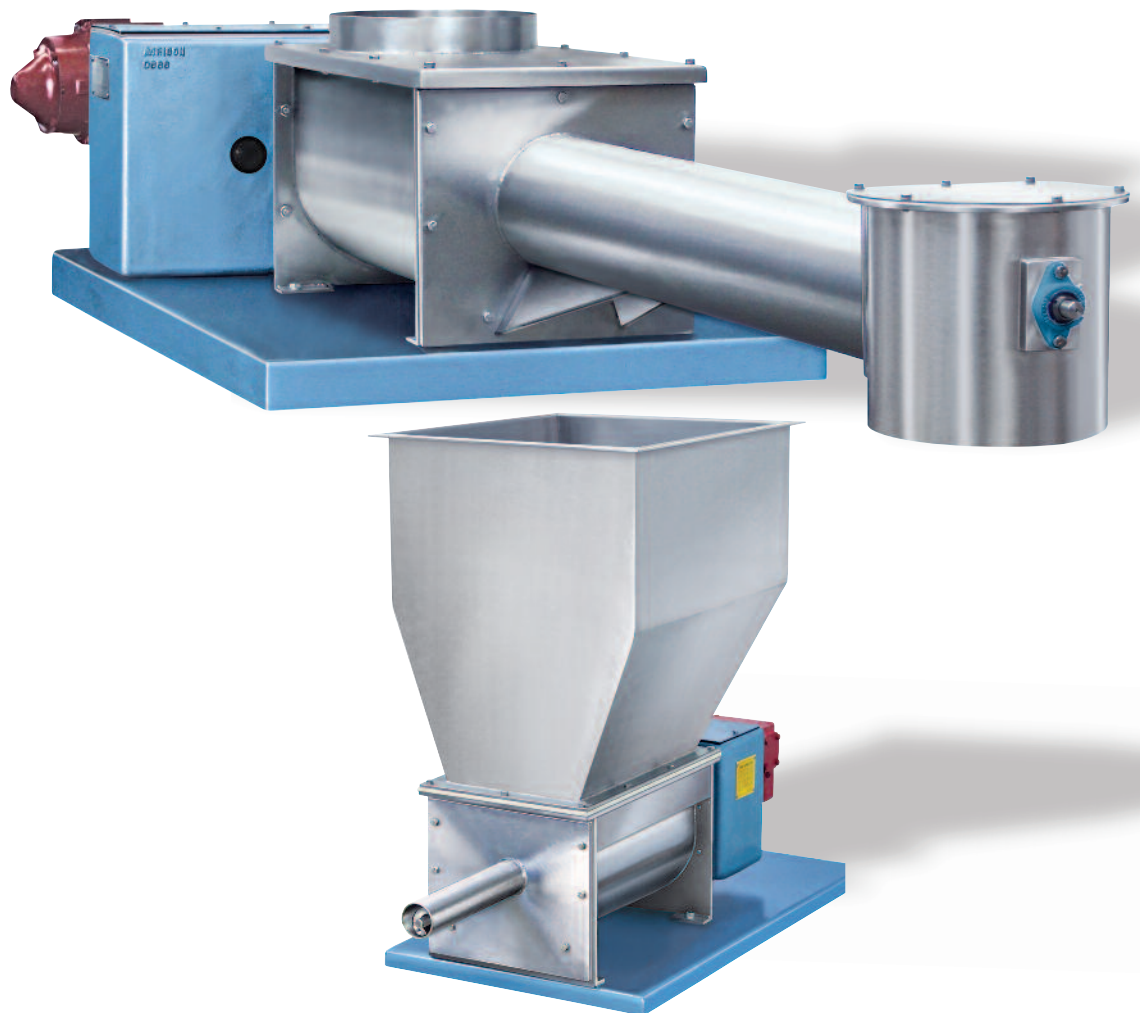


Acrison®

Volumetric Feeders Models 105 and 140 Series

For Dry Solid Materials



Built to Last

*World-class dry solids volumetric feeders featuring
Acrison's **Dissimilar Speed, Double Concentric
Auger Metering Mechanism** for accurate, dependable
and exceptionally versatile metering performance.*

Volumetric Feeders Models 105 and 140 Series *For Dry Solid Materials*

Introduced in 1965, the Models 105 and 140 Series of Volumetric Feeders, designed with Acrison's unique Dissimilar Speed, Double Concentric Auger Metering Mechanism, operate in virtually every conceivable process where dry solids metering is a requirement. This extremely effective, time-proven metering concept possesses the inherent ability to accurately and reliably feed an unparalleled variety of dry solid ingredients.

Operation

Acrison's Double Concentric Auger Metering Mechanism consists of a large "Conditioning Auger" (Intromitter) concentrically mounted around a smaller "Metering Auger", independently driven at dissimilar speeds in a "fixed proportion" to each other by a single gearmotor, typically variable speed.

Rotation of the Intromitter produces unidirectional movement of material within the feeder's feed chamber that very effectively 'conditions' the material to a consistent state (density), while efficiently and reliably filling the Metering Auger from a full 360 degrees for accurate and highly dependable product delivery (feed). **Clearly, no other method for filling the metering auger of a dry solids feeder is as positive or effective.**

The Intromitter (or Conditioning Auger) operates at a slower speed than the smaller Metering Auger, with the "ratio" between the two augers factory selected based on the physical characteristics of the product or products being handled and feed rate requirements.

Acrison's Models 105 and 140 Series of Feeders are ruggedly constructed for long, dependable service in the typically adverse industrial environments. Maintenance requirements are minimal, and long-term operating costs are the lowest in the industry. Longevity is exceptional.

Volumetric metering accuracies generally range between ± 1 to 2 percent or better (error) for the majority of products. Accuracy is based on a given number of consecutive one minute samples.



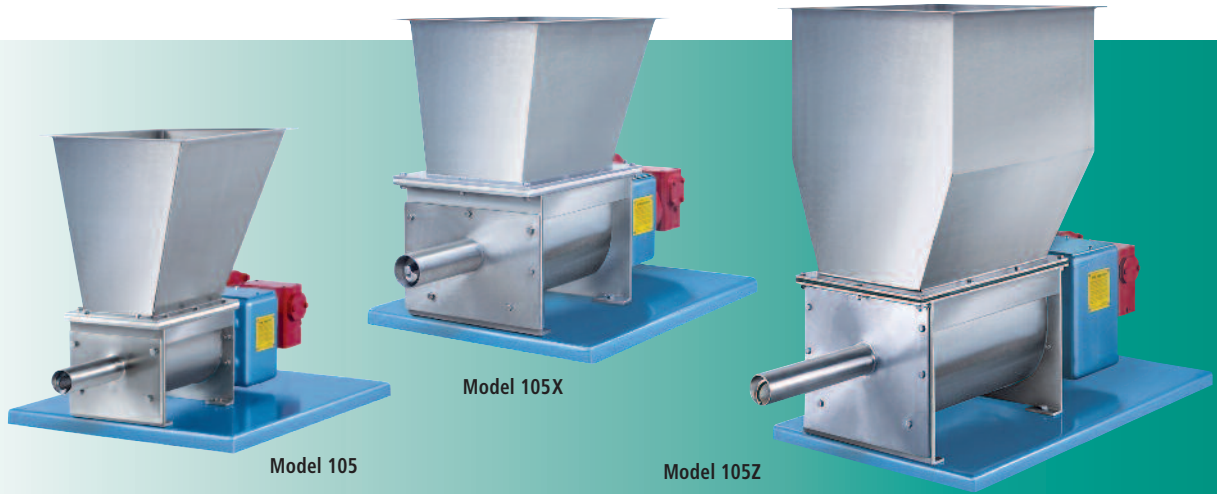
An Extremely Effective Dry Solids Metering Concept

Unsurpassed materials handling versatility

Acrison's Dissimilar Speed, Double Concentric Auger Metering Mechanism, with "Inter-Auger-Action", fills the feed auger from 360 degrees for accurate and reliable metering performance.

Model 105 Series of Volumetric Feeders

Rugged duty, Dry Solids Volumetric Feeders



Model 105

Utilizes a 6 inch diameter "Conditioning Auger". The feeder is powered by a 1/2 horsepower variable speed gearmotor.

Model 105X

Utilizes an 8 inch diameter "Conditioning Auger". The feeder is powered by a 3/4 horsepower variable speed gearmotor.

Model 105Z

Utilizes a 10 inch diameter "Conditioning Auger". The feeder is powered by a 1 horsepower variable speed gearmotor.

Capacities

The capacity chart indicates the typical output range for each standard size metering auger available with the Model 105 Series of Volumetric Feeders.

Since the physical properties of the actual product being metered may have an effect upon the exact output, the stated capacities could vary.

MODEL 105 FEEDER SERIES CAPACITY CHART

(Capacities shown in cubic feet per hour)

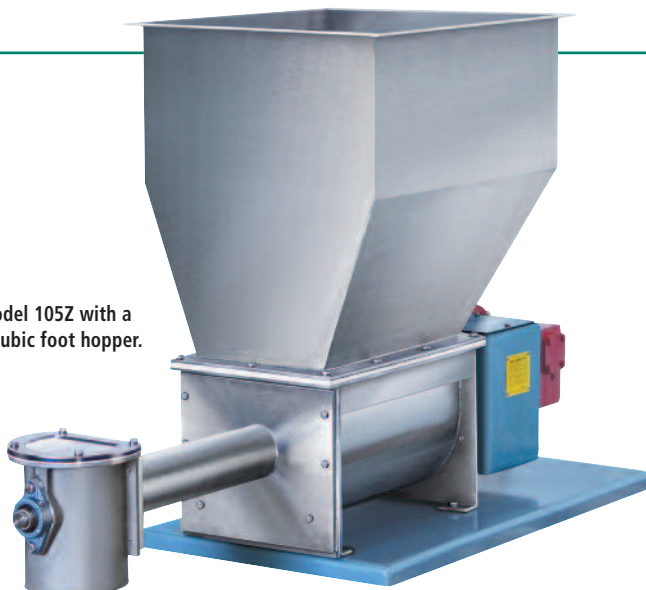
Model Size	Minimum Output		Maximum Output
	30:1 Speed Range	50:1 Speed Range	
105-A	0.002	0.0012	0.06
105-B	0.005	0.003	0.15
105-BC	0.0127	0.0076	0.38
105-BB	0.018	0.0108	0.54
105-C	0.03	0.018	0.9
105-CC	0.047	0.028	1.4
105-D	0.08	0.048	2.4
105-DD	0.14	0.084	4.2
105-E	0.2	0.12	6
105-EE	0.29	0.174	8.7
105-EF	0.63	0.38	19
105-F	0.47	0.28	14
* 105-FF	0.63	0.38	19
* 105-G	0.97	0.58	29
* 105-GG	1.4	0.84	42
* 105-H	1.7	1.02	51
** 105-HH	2.4	1.4	72
** 105-K	3.2	1.9	96
** 105-KK	3.9	2.4	118
** 105-M	5.3	3.2	160
105-N	6.7	4.0	202

* Available on the Models 105X and 105Z only.

** Available on the Model 105Z only.

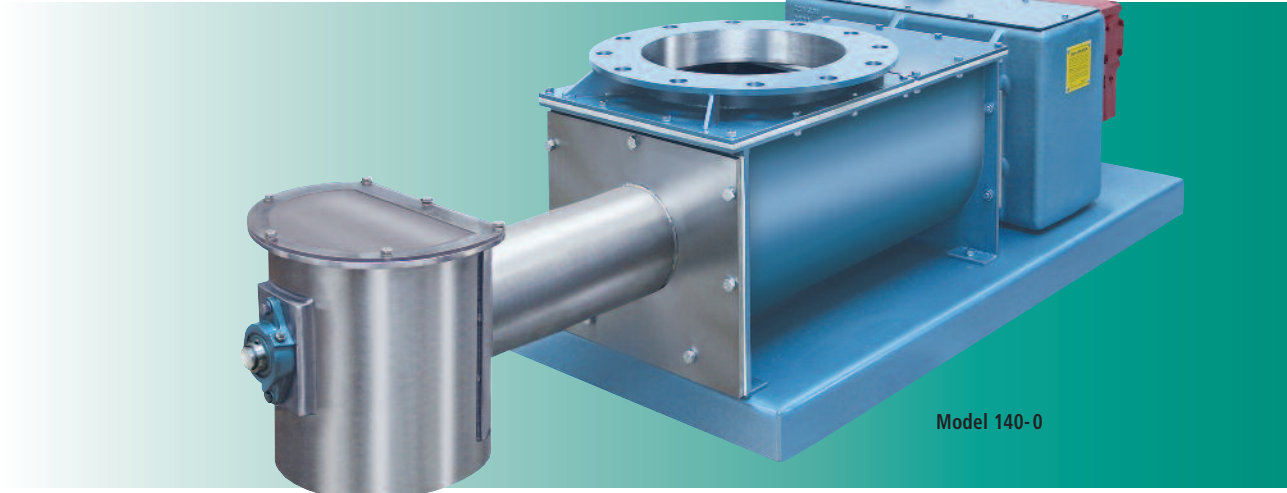
NOTE: The Speed Range is determined by the selected variable speed drive/controller.

Model 105Z with a 4 cubic foot hopper.



Model 140 Series of Volumetric Feeders

Rugged duty, high capacity Dry Solids Volumetric Feeders



Model 140-0

Model 140-0

Utilizes a 12 inch diameter "Conditioning Auger". The feeder is powered by a 2 horsepower variable speed gearmotor.

Model 140-1

Utilizes a 15 inch diameter "Conditioning Auger". The feeder is powered by a 3 horsepower variable speed gearmotor.

Model 140-2

Utilizes an 18 inch diameter "Conditioning Auger". The feeder is powered by a 5 horsepower variable speed gearmotor.

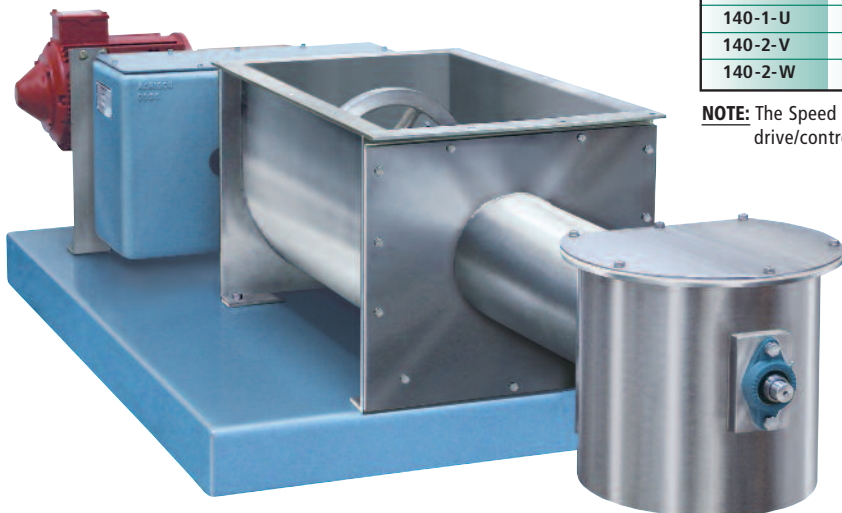
Capacities

The capacity chart indicates the typical output range for each standard size metering auger available with the Model 140 Series of Volumetric Feeders.

Since the physical properties of the actual product being metered may have an effect upon the exact output, the stated capacities could vary.

MODEL 140 FEEDER SERIES CAPACITY CHART (Capacities shown in cubic feet per hour)			
Model Size	Minimum Output		Maximum Output
	30:1 Speed Range	50:1 Speed Range	
140-0-NN	8	4.8	240
140-0-P	11	6.4	320
140-0-R	20	12	600
140-1-S	30	18	900
140-1-T	40	24	1200
140-1-U	60	36	1800
140-2-V	80	48	2400
140-2-W	113	68	3400

NOTE: The Speed Range is determined by the selected variable speed drive/controller.



Model 140-1

Models 105 and 140 Series of Volumetric Feeders

Design Specifications and Features

Standard Features for Model 105 Series

- Includes Acrison's dissimilar speed, *Double Concentric Auger Metering Mechanism*.
- All product contact surfaces are constructed of 304 stainless steel, including the feeder's drive shafts and seal components. The metering auger is 316 stainless steel.
- The Intromitter is flange-attached to its drive shaft. The metering auger utilizes a threaded attachment to its drive shaft.
- Powered by a variable speed AC or DC gearmotor with a 10:1, 20:1, 30:1 or 50:1 speed range depending on application parameters.
- Totally enclosed motor.
- Furnished with a one cubic foot supply hopper, flanged feed chamber, or a flanged feed chamber with a cover having a circular inlet.
 - Maximum circular cover inlet sizes (OD) are as follows:

105	6 inches
105X	9 inches
105Z	12 inches
 - Flanged rectangular feed chamber inlet sizes (inside dimensions) are as follows:

105	6 1/2" x 11 5/8"
105X	9" x 13 1/2"
105Z	12" x 17 3/8"
- All steel construction.
- Dust-tight, heavy-duty construction.
- Silent when operating.

Standard Features for Model 140 Series

- Includes Acrison's dissimilar speed, *Double Concentric Auger Metering Mechanism*.
- Available in mild steel, 304 or 316 stainless steel construction. As standard, the feeder's drive shafts and seal components are 304 stainless steel. The Intromitter and metering auger are constructed of the same material as that of the feeder.
- The Intromitter is flange-attached to its drive shaft. The metering auger utilizes a threaded attachment to its drive shaft.
- Powered by a variable speed AC gearmotor with a 10:1, 20:1, 30:1 or 50:1 speed range depending on application parameters.
- Totally enclosed motor.
- Furnished with a flanged feed chamber or a flanged feed chamber with a cover having a circular inlet.
 - Maximum circular cover inlet sizes (OD) are as follows:

140-0	12 inches
140-1	15 inches
140-2	18 inches
 - Flanged rectangular feed chamber inlet sizes (inside dimensions) are as follows:

140-0	13" x 26"
140-1	16" x 29 1/2"
140-2	20" x 34 1/2"
- All steel construction.
- Dust-tight, heavy-duty construction.
- Silent when operating.



Optional / Accessory Equipment

- Various materials of construction.
- Model 105 Series of Feeders are available with integral supply hoppers up to eight cubic feet in capacity (depending upon the feeder model and material flow characteristics).
- Model 140 Series of Feeders are available with integral supply hoppers with their size determined by material characteristics.
- Various AC and DC variable speed motor controllers and control modes.
- Quick-disconnect construction for ease-of-cleanout.
- Sanitary construction to satisfy USDA and FDA regulations (includes quick disconnect construction).
- High temperature construction.
- Pressure construction.

Model 105Z with a 6 cubic foot hopper and quick-disconnect construction.

Discover the difference!

We cordially invite you to witness a test in Acrison's State-Of-The-Art Customer Demonstration Facilities handling your actual product(s) with the specific equipment recommended for the application. Usually, there is no cost or obligation for this service. Discover the difference in technology, quality and performance of Acrison equipment.



Empire Boulevard Facility
Moonachie, NJ USA

Acrison products...

- Models 101 and 130 Volumetric Feeder Series
- Models V-101 and V-130 Volumetric Feeders
- Model 1015 Volumetric Feeder Series
- Model 105 Volumetric Feeder Series
- Model W-105 Volumetric Feeder Series
- Model 120 Volumetric Feeder
- Model 140 Volumetric Feeder Series
- Model 170 Volumetric Feeder Series
- Model 905-14 Volumetric Feeder
- Bin Discharger Feeders
- Model 200 Weigh Belt Feeder Series
- Model 203B Weigh Auger Feeder Series
- Model 270 In-Line Weigh Feeder Series
- Models 402, 404, 405, 406, 407, 408 and 410 ("Weight-Loss-Differential") Weigh Feeders
- Model Series 403 ("Weight-Loss-Differential") Weigh Feeders
- Model 403B(D) Batch/Dump Weighing Systems
- Model 404BZ(BU) Bulk Bag Unloader Batch Weigher
- Models 350 and 301 Continuous Blenders and Blending Systems
- Multiple Auger Bin Dischargers and Multiple Auger Bin Discharger Hoppering Systems
- Vibratory Bin Discharger Hoppering Systems
- Model 170-BD-30 Bin Discharger
- Models 810 and 820 Bulk Bag Unloaders
- Models 500, 515, 530, and 580 Polyelectrolyte Preparation Systems
- Water and Waste Water Treatment Systems
- Volumetric and Gravimetric Feeder Controllers and Control Systems
- Silo Systems
- Accessory Equipment for Acrison Products
- Systems Engineering



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"Visibly Different... Measurably Better"

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