



**Experts in Solid
Dosage Technology**

A Division of *Spraying Systems Co.*



GRANUMILL® JR.

Size Reduction Mill with Flexible
Containment Option for High-Potency
Compounds

GRANUMILL® JR. Features & Benefits

- Three interchangeable rotor designs available (square/flat, round, and knife) and fine feed control with optional screwfeeder for tighter control over particle size distribution
- GMP design and quick-release housing allow entire mill to be broken down in minutes for cleaning
- Virtually identical tip speed from R&D through production scale ensures easy scale-up and validation
- Approved for USDA 3A applications including dairy processing

Flexible Containment Option Advantages

In cooperation with ILC-Dover, we are able to provide custom-designed solutions for the containment of hazardous APIs in R&D size reduction applications.

- Flexible enclosure set-up allows for use in both containment and non-containment applications, eliminating the need to purchase a second machine solely for containment use
- Capable of meeting an OEB5 classification
- Achievable containment level of 1.0 µg/m³ on a task basis

Customizable. Versatile. Cost-Effective.

GRANUMILL® JR. size reduction systems meet FDA SUPAC (Scale-Up and Post-Approval Changes) guidelines for both impact and screening mills, allowing for low-RPM screening of agglomerates in addition to high-speed impact milling. The mill's versatile design combined with the new, removable containment option provides users with the flexibility to run a variety of processes for a wide range of applications on a single, cost-effective system.

Configurable to Meet Your Process Requirements

Additional custom options for the GRANUMILL® JR. include:

- Nitrogen-inerting systems
- Screwfeeding systems
- Water jacketing
- Explosion-proof construction
- In-line or portable base configurations

GRANUMILL JR. Specifications*

Speed (RPM)	500 - 10000
Finished particle size (micron)	175 - 2000
Throughput ((lbs/kg)/hour)	0.2 - 60 / 0.1 - 25
System height (inches/mm)	25 / 635
System width (inches/mm)	12 / 304
System length (inches/mm)	15 / 381
Screen width (inches/mm)	4 / 102
Containment width** (inches/mm)	40 / 1016
Containment depth** (inches/mm)	30 / 762
Containment height** (inches/mm)	45 / 1143

*Dimensions include screwfeeder

**Allow 36 inches/915 mm on side for pass-through port

Additional Resources

MAGNAFLO®/MAGNACOATER® Fluid Bed Systems

Describes how these systems optimize drying, granulating, and coating.



GRANUMILL® Size Reduction Systems

Details how these systems provide high-speed impact milling and low-speed screening of agglomerates.



PHARMX® High-Shear Granulating Mixer Systems

Explains how granulating efficiency is maximized and downtime between batches is reduced.



Retrofit Batch Equipment and Controls

Explains how to update and expand the capabilities of current equipment through software upgrades and/or machine conversions.



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