## Syntron<sup>®</sup> volumetric feeder machines

## Total control in material handling for feeding, blending or packaging

Simple design and flexible control account for the efficient, economical performance of Syntron<sup>®</sup> Volumetric Feeder Machines, and the growing industrial preference for them. These units can feed most dry bulk materials and can be supplied to conform to FDA and USDA specifications. Six Syntron Volumetric Feeder Machine models are available.

Syntron Volumetric Feeder Machine designs include four basic components: a supply hopper, a hopper vibrator, a vibrating feeder and the supporting frame. Supply hoppers are usually fabricated from mild steel but are available in stainless steel. Most supply hoppers are conical; however, rectangular hoppers are an option. Adjusting the gate height between the hopper and feeder trough regulates material depth for most models. Material depth for model FM-T0 is regulated by hopper tilt.

Arching, plugging or bridging of materials in the hopper is prevented through incorporation of a Syntron electromagnetic vibrator. The hopper vibrator features a variable power control, assuring free flow of material to the feeder trough. Vibrating feeders on the Syntron Volumetric Feeder Machines operate at 3,600 vpm (at 60 Hz) and trough options include flat pan (standard), V-shaped, tubular or screening troughs of mild or stainless steel.

Because of their simple design, Syntron Volumetric Feeder Machines are dependable and have an exceptionally long service life. There are no moving parts such as motors, belts, gears, valves, connecting arms or sliding rods to wear or lubricate. For dust-tight sealing, special covered or tubular troughs feature flexible seals on the discharge end of the supply hopper. In addition, flexible seals that seal the top of the supply hopper to an overhead chute, as well as removable dust covers for the supply hopper are available.



Syntron Volumetric Feeder Machine with conical supply hopper.



Drives on Syntron<sup>®</sup> vibrating feeders are available with dust-proof, dust-tight and waterproof construction. These units are virtually noiseless, meeting applicable OSHA specifications. Even at maximum feed, a hum is the only indication that the machine is operating.

Syntron Volumetric Feeder Machines are supplied with electric controls that can be mounted separately at any desired location. Standard controls contain operating switches, rectifiers and rheostats. The electric control regulates the feed rate by varying the vibrating intensity of the electromagnetic feeder. A graduated dial on the control panel permits variation of the flow speeds. Timers are also available to provide intermittent feed.

Capacities of Syntron Volumetric Feeder Machines vary with different materials. Lighter and finer materials result in less capacity and heavier materials result in higher capacities.



Syntron Volumetric Feeder Machine with customized rectangular hopper.

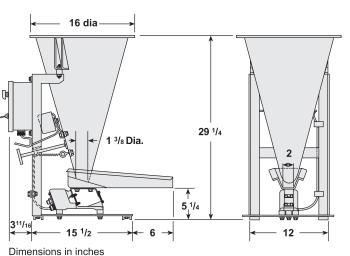


A custom-built SFM-212 Syntron Volumetric Screening Feeder Machine.

### volumetric feeder machine models and dimensions

## Model FM-T0-3/4

Syntron® Model FM-T0-3/4 is one of the smallest, most economical volumetric feeder machines available. This dependable unit is usually preferred for light-capacity, continuoususe operation. This model features a 3/4 cubic foot supply hopper, a V-2 hopper vibrator, an F-TO vibrating feeder with 2 x 16-inch flat pan trough and a solid-state control. Configured for 115 volt, single-phase 50 or 60 cycle power. Operating at 230 or 460 volts requires a step-down transformer. Optional equipment includes a stainless steel supply hopper and/or feeder trough, trough and hopper covers.



#### WITH STANDARD 2-INCH X 16-INCH FLAT PAN TROUGH

MAXIMUM MATERIAL CAPACITY (sand @ 100 lb C/F) .625 TPH

#### **SPECIFICATIONS**

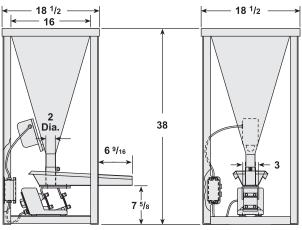
Power Consumption	on* 30	Watts	Net Weight, machine	55 lb
Current Input*	1.20	amps	Net Weight, Control	9 lb
*115 volt, 60 cycle	2		Shipping Weight, Both	125 lb
Control (inches) – 6 <sup>15</sup> / <sub>16</sub> W x 9 <sup>1</sup> / <sub>2</sub> H x 3 <sup>5</sup> / <sub>8</sub> D				

## Model FM-T01-1

Syntron Model FM-T01-1, with a separate solid state control as standard equipment, has wider application than any other medium-capacity volumetric feeder machine in the Syntron line. This unit features a 1 cubic foot supply hopper, V-4 hopper vibrator and F-TO1 vibrating feeder with a 3 x 18-inch flat pan trough. Configured for 115 or 230 volt, singlephase, 50 or 60 cycle power. Operating at 460 volt requires a step-down transformer. Optional equipment includes a stainless steel supply hopper and/or feeder trough, and stainless steel covers for trough and hopper.



9 lb



Dimensions in inches

#### WITH STANDARD 3-INCH X 18-INCH FLAT PAN TROUGH

MAXIMUM MATERIAL CAPACITY (sand @ 100 lb C/F) 2 TPH

#### **SPECIFICATIONS**

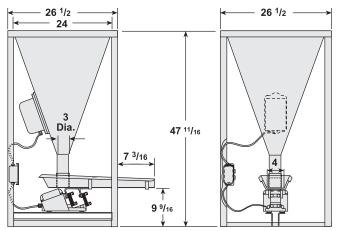
Power Consumption\* 75 Watts Net Weight, machine 100 lb Current Input\* 1.75 amps Net Weight, Control \*115 volt, 60 cycle Shipping Weight, Both 160 lb Control (inches) - 6<sup>15</sup>/<sub>16</sub> W x 9<sup>1</sup>/<sub>2</sub> H x 3<sup>5</sup>/<sub>8</sub> D

Capacities of Syntron Volumetric Feeder Machines vary with different materials. Lighter and finer materials result in less capacity and heavier materials result in higher capacities.

## Model FM-010-3

Syntron<sup>®</sup> Model FM-010-3, while similar in design to the FM-T01-1, has a larger capacity. This machine is furnished with a 3 cubic foot supply hopper, a V-20 hopper vibrator and a separate solid-state control. Model FM-010-3 includes an F-010 vibrating feeder with 4 x 24-inch flat pan trough. The FM-010-3 operates on 115, 230 or 460 volt, single-phase, 50 or 60 cycle power. A 460-volt power configuration requires a step-down transformer. Optional equipment includes stainless steel supply hoppers and feeder troughs and plastic, mild steel or stainless steel covers for trough and hopper. Hoppers are available in conical or rectangular design.





#### WITH STANDARD 4-INCH X 24-INCH FLAT PAN TROUGH

Maximum Material Capacity (sand @ 100 lb C/F) 4 TPH

#### **SPECIFICATIONS**

Power Consumption*	125	Watts	Net Weight, machine	180 lb	
Current Input*	4.0	amps	Net Weight, Control	9 lb	
*115 volt, 60 cycle			Shipping Weight, Both	340 lb	
Control (inches) – 6 <sup>15</sup> / <sub>16</sub> W x 9 <sup>1</sup> / <sub>2</sub> H x 3 <sup>5</sup> / <sub>8</sub> D					

Dimensions in inches

## Model FM-152-3

Model FM-152-3, while similar in design to the FM-T01-1, also has a larger capacity. It is furnished with a 3 cubic foot supply hopper, a V-20 hopper vibrator and a separate solid-state control. Model FM-152-3 features an F-152 vibrating feeder with an 8 x 28-inch flat pan trough. It operates on 115, 230 or 460 volt, single-phase 50 or 60 cycle power. Optional equipment includes stainless steel supply hoppers and/or feeder troughs and special 6, 10 or 18 cubic foot supply hoppers with conical or rectangular design.

Call the factory for assistance in selecting Syntron FM-152-3 volumetric feeders.



Maximum Material Capacity (sand @ 100 lb C/F) 7 TPH

#### SPECIFICATIONS

Power Consumption\*175 WattsNet Weight, machine225 lbCurrent Input\*4.5 ampsNet Weight, Control9 lb\*115 volt, 60 cycleShipping Weight, Both440 lbControl (inches) - 6 15/16 W x 9 1/2 H x 3 5/8 D



Custom designed FM-152-3 feeder machine with rectangular supply hopper.



# volumetric feeder machine models and dimensions, cont'd.

## Model FM-212-3

Syntron<sup>®</sup> FM-212-3 offers economical, high-capacity performance. Standard construction includes a 3 cubic foot supply hopper, a V-20 hopper vibrator, a separate solid-state control and a powerful F-212 vibrating feeder with a 10 x 24-inch flat pan trough. Configured for 115, 230 or 460 volt, single-phase, 50 or 60 cycle power. Optional equipment includes stainless steel supply hoppers and/or feeder troughs and special 6, 10 or 18 cubic foot supply hoppers, with conical or rectangular design.

#### WITH STANDARD 10-INCH X 24-INCH FLAT PAN TROUGH

Maximum Material Capacity (sand @ 100 lb C/F) 20 TPH

#### SPECIFICATIONS

Power Consumption*200		Watts	Net Weight, machine	475 lb	
Current Input*	6.5	amps	Net Weight, Control	9 lb	
*115 volt, 60 cycle			Shipping Weight, Both	600 lb	
Control (inches) – 6 <sup>15</sup> / <sub>16</sub> W x 9 <sup>1</sup> / <sub>2</sub> H x 3 <sup>5</sup> / <sub>8</sub> D					

## Model FM-22-50

Syntron FM-22-50 is a high-capacity unit. The supply hopper has a 50-cubic footcapacity. A V-50 hopper vibrator moves bulk material to the 12 x 36-inch flat pan trough of an F-22 vibrating feeder. A solid-state control is mounted separately. Configured for 115, 230 or 460 volt, single-phase, 50 or 60 cycle power. Optional features include special hoppers up to 100 cubic foot capacity, stainless steel supply hoppers and/or feeder troughs.

Call the factory for assistance in selecting and specifying Syntron FM-22-50 volumetric feeders.

#### WITH STANDARD 12-INCH X 36-INCH FLAT PAN TROUGH

Maximum Material Capacity (sand @ 100 lb C/F) 30 TPH

#### SPECIFICATIONS

Power Consumption	n*450 Watts	Net Weight, machine	1,700 lb	
Current Input*	14.5 amps	Net Weight, Control	11 lb	
*115 volt, 60 cycle		Shipping Weight, Both	2,000 lb	
Control (inches) - 6 <sup>15</sup> / <sub>16</sub> W x 9 <sup>1</sup> / <sub>2</sub> H x 3 <sup>5</sup> / <sub>8</sub> D				

Capacities of Syntron Volumetric Feeder Machines vary with different materials. Lighter and finer materials result in less capacity and heavier materials result in higher capacities.



FM-212 feeder machine with custom rectangular supply hopper.