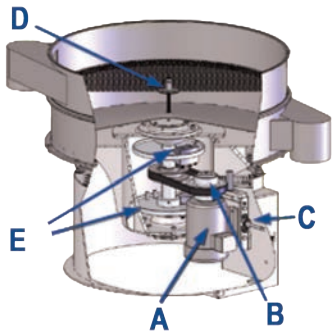


Vibratory separators are used to separate particles by size or separate solids from liquids. Designed for maximum screening efficiency, Midwestern's ME Series Separator utilizes a variable speed drive, giving the user greater control over screening applications resulting in a wide range of sizes and finishes that includes food, dairy, and pharmaceutical standards.

The innovative ME Series Separator design is a combination of a shaft, two balance cages, and a foot-mounted motor connected to the shaft by a belt. The motor employs a variable speed pulley, and is mounted to a sliding base that allows the motor to be adjusted in and out by a crank for various rpm changes. This allows fine adjustment of frequency providing accurate material travel and increased production.

## ME Series Gyra-Vib® Separator



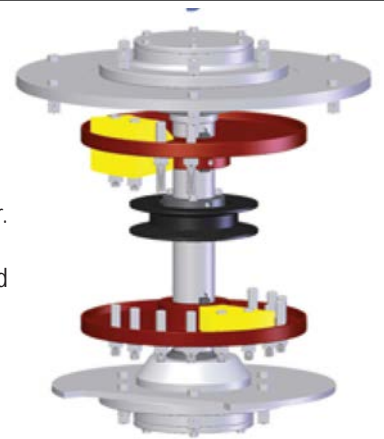
- A** Standard NEM foot-mounted motor. Explosion-proof motors can be used for hazardous locations. All motors are available in a range of voltage options.
- B** The variable speed pulley is easily accessible and mounted on the motor, isolating the screen vibration from the motor. The motor is mounted on an adjustable slide base allowing for a variable speed range of 950-1450 rpm.

- C** The motor mount is adjustable for control of frequency. The power is transmitted from the motor to the balance cages using a heavy duty belt.
- D** The reversible centre locking device allows positive screen tensioning up or down.
- E** Balance cages are mounted on a large diameter shaft between standard, heavy-duty, double spherical roller bearings. Specially designed bearing housings have greater grease capacity for long life as well as convenient lubrication fittings.

For increased durability the units base and table assemblies are constructed of heavy metal steel plate by certified welders. The lower frame is bolted to the table on 36" through 72" diameter units, enabling use of multiple screening surfaces without the spacing frames turning.

### MIDWESTERN BALANCE CAGE WEIGH SYSTEM

The innovative and first in the industry balance cage system is found on the Midwestern separator. The top balance cage is known as the horizontal cage. Weights added to this cage produce the horizontal or flat effect of the screen. If you are screening a heavy material, more weights would be added to the top cage to create the horizontal movement to convey the material outward. Screening performance is not achieved until sufficient horizontal motion is attained. The bottom cage is known as the vertical cage. Weights added to this cage impose the vertical lift on the screen. Changing the position of these weights alter the flow pattern of the material (see ME flow pattern above).





### ULTRASONICS:

Midwestern has one of the most advanced ultrasonic systems in place today, offering customers better results with less complication. By utilizing a combination of gyratory vibration and ultrasonics, your process will be more efficient, have greater throughput, and less near size plugging.

Such effective results are accomplished by converting electrical energy into high frequency energy, which is then converted into ultrasonic oscillation by the converter.

Unlike other systems, Midwestern's ultrasonic systems use frequency variation generators that excite the screen over a large bandwidth, eliminating the costly and timely process of tuning the screens ring to meet a sharp resonance.

### TYPICAL ME FLOW PATTERNS

The flow pattern on a screen deck may be varied to retain material for desired intervals or directly sweep to the discharge spout. The lead angle determines particle motion.



0° Lead Angle



35° Lead Angle



60° Lead Angle



120° Lead Angle

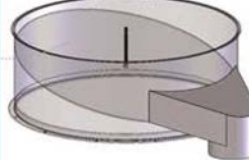
### ACCESSORIES, FRAMES AND SCREENS:

RAS System



The RAS Frame is designed for applications with a high percentage of oversized material.

Diverter Frame

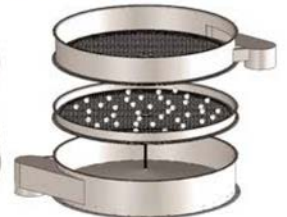


The Diverter Frame is useful when dealing with a high volume of undersized particles.

Anti-Blinding Devices

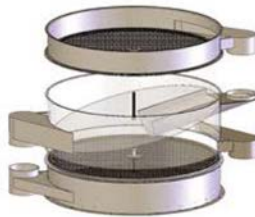


KleenerTray Assembly



Ball Tray Assembly

Series Feed Frame



Manufactured for high capacity screening, the series feed frame gives the user the ability to screen the material twice with one machine.

Round & Square Screens



Ultrasonic Screens



Perforated Screens



Sandwich Screens



Bulls-Eye Screens



Wagon Wheel Screens



Custom Woven Screens

