**Bullet® Magnet**
- Flow-thru design with aerodynamic stainless steel nose cone
- Can be installed anywhere in pneumatic line systems operating at or below 15 psi
- Ideal for use ahead of processing equipment and bulk load outs to assure product purity and protect machinery from tramp metal damage
- Helps extend the life of filters and screens
- Cart mounted models available for truck and rail car bulk unloading
- Nose cone diverter and magnet assembly is designed to maintain a balanced flow through the housing thereby maintaining uniform velocity in line flow

Ideal for dilute phase systems, typical Bullet® Magnet applications include: processing of powders, flour, chemical, resin, food stuff, pharmaceutical and mineral materials.

**Features:** Leak-Resistant Seal, Easy Clean Stripper Collar, Door Mounted Magnet (removes magnet from product flow for cleaning) and Stainless Steel Construction.

**Exposed Pole Tube Magnet**
- Open flow design is ideal for use where product degradation is a concern
- Ideal for use in dense phase systems operating at or below 15 psi
- Typical installations include processing of pelletized plastics, foods, feed and grain or conveying of fibrous products or similar products that may have a high moisture content with a tendency to clog or congeal
- Ideal for use ahead of processing equipment and bulk load outs to assure product purity and protect machinery from tramp metal damage
- Cart mounted models available for truck and rail car bulk unloading

The EP Tube is available in either Ceramic or Rare Earth designs. Ceramic versions, ideal for capturing large tramp metal such as nails, bolts or screws, have the magnetic portion built into the body of the housing. The Rare Earth version can capture fine particles of metal. Rare Earth EP Tubes feature a door mounted magnet (removes magnet from product flow for cleaning).

**Features:** Leak-Resistant Seal and Stainless Steel Construction.

**Pneumatic-Line Housing**
Incorporates a series of 1-in.-diam, 52 MgOe rare-earth tubes on staggered centers versus a single center-flow cartridge circuit often prescribed for pneumatic line systems. This configuration ensures that all product flowing through the housing makes repeated contact with the magnets. The resulting capture rate of ferrous and weakly magnetic stainless contaminants far exceeds any other magnetic separator available.

Ideal for dilute-phase pneumatic systems, the Pneumatic Housing is suitable for processing dry, powder, and granular materials. It can be used ahead of processing equipment and bulk load-out stations to ensure product purity and protect machinery from tramp metal damage.

**4JIT Magnet**
Ideal for vacuum or pneumatic unloading systems for handling pelletized products, plastic resins and granulars from bins, boxes hoppers and gaylords. The Vacuum 4JIT magnet captures ferrous metal contaminants. The powerful Rare Earth magnet cartridge provides optimum equipment protection and improved product purity without restricting product flow. Available from 1-1/2” to 2-1/2” line sizes.

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**Key Markets**
- Dense or dilute phase pneumatic conveying of dry or granular products such as food, feed, grain, plastics, chemical

**Related Products**
- Magnetic separation products prior to air lock and after cyclone

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*All Photos And Drawings Represent The Products At The Time Of Publication (12/19)*
Pneumatic Line Magnets

Pneumatic-Line Magnet Installation Guidelines

Pneumatic Line Magnets can be installed at an angle. Vertical Position will allow product to drain from the magnet area when the system is shut down. For Placement of a pneumatic line magnet near a curve: Magnet should be located 10 times the line diameter away from the curve. Example: 10 X 4" line = 40" from curve.

Note: Vertical Mounting is recommended for Ceramic EP-Tubes and most PLH installations.

"Modular Door Mounting Kit is available for 6” and larger Bullet® Magnets. The kit allows for on-site installation position changes for Bullet® Magnets ordered for HU, HD and VD mounting styles.

4JIT Vacuum Line Magnet

The 4JIT magnet cartridge captures ferrous metal contaminants to provide equipment protection and improved product purity. Clean captured metal by removing the clamp to separate the two halves. Once separated, wipe the metal off the magnet with a gloved hand or shop rag.

FEATURES:
• Welded stainless steel construction with a one piece, stainless steel clamp
• Powerful Rare Earth UHI-52™ Magnetic Circuit
• Coupling ends are constructed of .065" wall tubing
• Viton, flange matched gasket material for leak-resistant operation

OPTIONS: Custom sizes, finishes and magnetic circuits

Exposed Pole Tube Magnet

The flow-through design of IMI’s Exposed Pole Tube magnet (EP Tube) makes it ideal for use in pneumatic line systems where degradation is a concern or where the products being conveyed may have a tendency to clog or congeal.

OPERATION:
The EP Tube is available in either Ceramic or Rare Earth designs. Ceramic versions, ideal for capturing large tramp metal such as nails, bolts or screws, have the magnetic portion built into the body of the housing. To clean, open the hinged door, reach into the housing and remove the collected metal.

Rare Earth versions, ideal for capturing fine particles of metal, are designed with the magnet mounted on a hinged door. To clean, un-clamp the door, swing it open and away from the product flow and remove the collected metal.

FEATURES:
• Provides product purity control and incoming product inspection for bulk loadout docks
• Leak-resistant Food Grade Silicone gasket for flat to flat seal (factory tested to 15psi)
• Lorenz® T-Handle clamps for a positive seal
• Stainless steel housing for long, non-corrosive life
• Grade 8 Ceramic or 52 MgOe Rare Earth Magnet Material
• Door Lock-Out
• Food grade finish

OPTIONS: Standard pipe-size ends
• Custom line sizes
• ANSI or custom bolt pattern flanges available
• ANSI spec flanges
• Sanitary finish and welds
• Couplings
• Camlock fittings
• Cart mounting for portable bulk unloading

Pictured: Rare Earth EP Tube

Part Number | Line Size O.D. (A) | Overall Length (B) | Coupling Length (C) | Overall Dia. (D) | Wt. (Lbs.)
---|---|---|---|---|---
4JIT1500R | 1½" | 12½" | 2½" | 3¼" | 3.33
4JIT2000R | 2" | 10½" | 2½" | 3¼" | 3.00
4JIT2500R | 2½" | 6½" | 2½" | 3¼" | 2.50

Part No. | A (O.D.) | B | C | D | E | F | G | H | Wt.
---|---|---|---|---|---|---|---|---|---
Ceramic
EPT2000CFG | 2" | 12" | 36" | 6" | 11½" | 5¾" | 5" | 70 Lbs
EPT3000CFG | 3" | 14½" | 36" | 6" | 11½" | 5¾" | 7¼" | 104 Lbs
EPT4000CFG | 4" | 14½" | 36" | 6" | 11½" | 5¾" | 7¼" | 105 Lbs
EPT5000CFG | 5" | 16½" | 39" | 8" | 11½" | 7" | 8" | 137 Lbs
EPT6000CFG | 6" | 16½" | 39" | 8" | 11½" | 7" | 8" | 138 Lbs
EPT8000CFG | 8" | 20¼" | 50" | 14½" | 10" | 11½" | 7" | 8" | 335 Lbs
Rare Earth
EPT2000RFG | 2" | 7½" | 36" | 9½" | 6" | 11½" | 5½" | 1½" | 64 Lbs
EPT3000RFG | 3" | 7½" | 36" | 9½" | 6" | 11½" | 9½" | 1½" | 67 Lbs
EPT4000RFG | 4" | 8½" | 36" | 10½" | 6" | 11½" | 9¼" | 2½" | 83 Lbs
EPT5000RFG | 5" | 9½" | 36" | 11½" | 8" | 11½" | 9¼" | 2½" | 91 Lbs
EPT6000RFG | 6" | 10½" | 36" | 12½" | 8" | 11½" | 9¼" | 3½" | 105 Lbs
EPT8000RFG | 8" | 12½" | 48" | 14½" | 11" | 11½" | 15¼" | 4½" | 142 Lbs
**Bullet® Magnet**

**IMPROVE PRODUCT PURITY WHILE PROTECTING PROCESSING EQUIPMENT FROM METAL DAMAGE.**

The aerodynamic nose cone and flow-thru design of IMI’s Bullet® Magnet allows it to be used anywhere in a pneumatic line system. The Bullet® Magnet is ideal for use ahead of processing equipment and bulk load outs to assure product purity and protect machinery from tramp metal damage. The nose cone assembly is designed to maintain a balanced flow through the housing thereby maintaining uniform velocity in line flow. Ideal for dilute phase systems, typical Bullet® Magnet applications include: processing of powders, flour, chemical, resin, food stuff, pharmaceutical and mineral materials.

**FEATURES:**
- Leak-Resistant Silicon seal (factory tested to 15psi)
- EZ-Clean Stripper Collar (Standard on Rare Earth models)
- Ceramic 8 or 52 MgOe Rare Earth Magnetic Material
- Negligible pressure drop across magnet
- Gas springs to assist door opening on 8” models (except horizontal side mounted installation)
- Magnet mounted on hinged door with Lock-Out to allow for removal from product flow when cleaning
- Stainless steel construction for long, non-corrosive life
- Food grade finish & welds

**OPTIONS:**
- Cart mounting for load-out
- Standard pipe-size ends
- Custom line sizes
- Sanitary finish & welds
- EZ-Clean Stripper Collar
- ANSI bolt pattern flanges
- ANSI spec flanges
- Side mounted hinges
- Other stainless steel grades available
- Camlock fittings
- Gas springs
- Magnetic Gasket
- Bolt On Nose Cone

**BULLET® MAGNET DIMENSIONS**

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<th>D</th>
<th>E</th>
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NOTE: “The (F) dimension only applies to 8” O.D. models that have door mounted gas springs. If dimensions are critical call for up to date changes and revisions.

**4JJT Bullet® Pneumatic Line Magnet**

The 4JJT Bullet® is ideal for dilute phase pneumatic systems, typical applications include processing of dry, powder and granular materials. It can be used ahead of processing equipment to protect machinery from tramp metal damage and at bulk load out zones to ensure product purity. Clean captured metal by removing the clamp to separate the two halves and wipe the metal off the magnet with a gloved hand or shop rag.

**FEATURES:**
- 100% stainless Food Grade two-part body with a Tri-Clamp
- Powerful 52 MgOe Rare Earth Magnetic Material
- Portable and capable of operation in explosive environments
- Can operate leak-free at up to 130 psi

**OPTIONS:**
- EZ-Clean Stripper Collar
- Standard pipe-size ends
- Custom line sizes
- Couplings
- Camlock fittings

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<th>Part Number</th>
<th>A (O.D.)</th>
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<th>D</th>
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**Pneumatic Line Magnets**

**Magnetic Separation For Pneumatic Conveying Lines**

### Pneumatic Line Housing

Based on our successful drawer-in-housing platform, the Pneumatic Line Housing incorporates a series of 1-in. diameter, UHI-52™ MgOe Rare Earth tubes on staggered centers versus a single, center-flow cartridge circuit often prescribed for pneumatic line systems. This configuration ensures that all product flowing through the housing makes repeated contact with the magnets. The resulting capture rate of ferrous and weakly magnetic stainless contaminants far exceeds any other magnetic separator available for this type of application.

The Pneumatic Line Housing is suitable for processing dry, powder, and granular materials. It can be used ahead of processing equipment and bulk load-out stations to ensure product purity and protect machinery from tramp metal damage.

### FEATURES:

- Welded stainless steel construction
- Food Grade Finish and Gasket Standard
- Ideal for dilute-phase pneumatic systems
- Powerful UHI-52™ MgOe Rare Earth tubes
- Nedox® coated tubes (Harder-than-steel, self-lubricating surface that resists corrosion, friction, sticking, galling, and static buildup.)
- Standard tube-size ends
- SimpleClean™, EZ-Clean & Self Clean (U.S. PATENT NO. 8,474,629) Models available
- Drawer and/or Guard Lock-Out
- Tool Free Guard Removal
- No Line Pressure Drop
- Leak-Resistant Silicone seal up to 15 PSI
- Vertical or Horizontal Installations
- Tramp Metal Catch Pans, EZ-Clean & Self-Clean

### OPTIONS:

- Custom sizes and finishes
- Camlock Fittings & Couplings
- MAGnanoSHIELD® FDA compliant, antimicrobial coating (Offers 99.9999% microbe resistance to assorted bacteria and fungus strains)
- ANSI Flanges
- Cart mounting for portable bulk load/unload
- Built-in screener

### Pneumatic Line Housing SimpleClean™ Specs

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<th>Part Number</th>
<th>Line Size Width A (O.D.)</th>
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<th>(C)</th>
<th>(D)</th>
<th>Clearance (E)</th>
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### NOTE:

Consult the Factory if your product is a sugar-based substance or has a magnetic additive such as Reduced Iron Enrichment

Not recommended for installation in a horizontal line if cross-contamination of products is a concern.