

- Detects magnetic and non-magnetic metal contaminants
- Protects machinery: prevents production downtime and damage to equipment
- Reduces costs and increases productivity
- Ensures metal-free products
- Automatically compensates for products with a high product effect (caused by moisture, carbon etc)
- Very simple to operate, even for non-technical staff
- Higher signal/noise ratio with regard to electromagnetic interference and vibration



TMDL tunnel metal detectors, which are separable and equipped with digital technology, are used for inspecting bulk materials or individually packaged product on belt conveyors, material slides or vibratory conveyors. They detect all magnetic and non-magnetic metal contaminants (steel, stainless steel, aluminium etc), even those which may be contained in the product. If metal is detected a signal is sent to the process controller or the reject unit is activated.

The metal detector's robust design offers maximum resistance to interference and ensures the system is highly reliable both mechanically and operationally, particularly in harsh conditions. It can be used in a wide variety of very different operational areas, from rudimentary detection through to highly demanding, precision applications.

A major advantage of the TMDL is the ease with which it can be integrated into existing belt conveyors as there is no requirement to dismantle the belt; top and bottom components of the detector are simply assembled around the belt. Over 200 standard sizes are available for optimal customisation.

Typical applications

- Plastics industry
- Chemical industry
- Textile industry
- Wood industry
- Recycling industry
- Mining, stones, quarrying

TMDL tunnel metal detectors offer the following performance features:

- Highest sensitivity to all metals
- Equipped with digital signal processing, automatic self monitoring and continuous self-calibration as well as filters to suppress electrical and mechanical background noise
- Manual or automatic reset when metal is detected
- Metal impulse and delay times can be fine-tuned to control reject or signal devices, machines or other peripheral equipments
- Compact single board technology optimises operational reliability and means the unit is easy to service
- Maintenance-free electronics, no further adjustments required
- UL/CSA certification (optional)



Additional Performance Features

- Machinery parameters shown on eight LEDs; operated through three control buttons, a reset and a test starter
- Adjustable metal impulse and delay times
- Product memory for eight products, three products pre-installed
- Free choice of operation mode
- Maintenance free electronic, no re-adjustment necessary

Scope of Delivery

- Tunnel detector TMDL
- Control Unit PRIMUS

Options/Accessories

- Optical and acoustic signal system
- Digital incident counter
- Conveyor stop and turning prevention control
- Control unit SENSITY for higher scanning sensitivity
- UL/CSA Certification
- Further options on request

Product Description

The splitable tunnel detector TMDL is used to analyse smalls and bulk materials on a conveyor belt or material chutes. It detects all magnetic and non-magnetic metal contaminations (steel, stainless steel, aluminium) – even if enclosed in the product.

On detection of metal, a signal device and a separation system can be activated or a signal can be send to process controlling.

Typical Application Areas

- Plastics and Rubber industry
- Recycling industry
- Timber industry
- Chemical industry
- Textile industry
- Mining Industry
- Cement Industry

Application

- Machinery protection for granulators, shredders, hocks, crushers, calenders, bandsaws, planing machines, and many more.

If you have any more questions, require technical assistance or would like a quotation, please contact us.

www.eclipsemagnetics.com

Eclipse Magnetics Ltd, Atlas Way, Sheffield, S4 7QQ, England

T +44 (0)114 225 0600 F +44 (0)114 225 0610 E info@eclipsemagnetics.com W www.eclipsemagnetics.com

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