

BELT CLEANING SYSTEMS



TITAN® CONDOR® RAVEN®

**BELT
CLEANING
SYSTEMS**

**Conveyor Belt Cleaners
& Accessories**

Conveyed material that does not fall off the belt at the discharge point but sticks on to the return run of the belt is called carry back.



Failure to control the carry back leads to :

- Material builds up on the return rollers leading to mis-tracking of the conveyor belt.
- Seizure of return roller due to jamming of bearings.
- Build up of material on the floor and conveyor gallery causing potential danger to workers.
- Loss of material.

Generally, carry back reduces the efficiency and profitability of the conveyor system and increases the maintenance and up keep costs.

Thejo makes engineered Belt Cleaning Systems helps to:

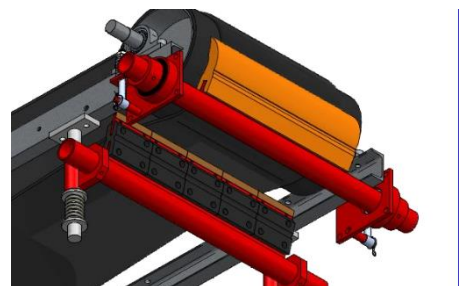
- Control carry back thus reducing loss of material.
- Improve the availability of conveyor by reducing unscheduled stoppages.
- Increases life of conveyor components thus reducing maintenance cost.
- Reduce clean up costs thereby improving profitability.
- Improve safety of workers.

Thejo advocates a multiple cleaner approach to solve the carry back problem. It essentially consists of a Primary Cleaner and a Secondary Cleaner. Depending up on the severity of carry back, additional cleaners may be installed if required.

Primary Cleaner is installed On Face of the Head Pulley Below Material Trajectory.

Secondary Cleaner is installed on the return side where the belt leaves the head pulley.

Tertiary Cleaner or additional cleaners are be installed further backwards on the return side of the belt.





TITAN BELT CLEANERS

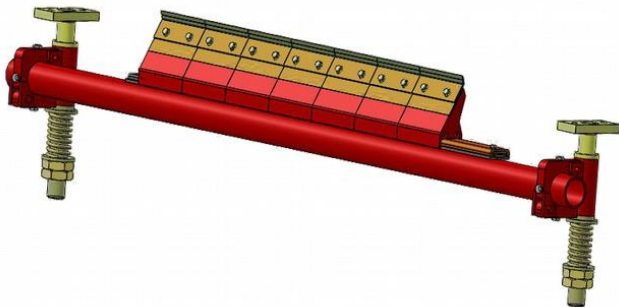
TITAN Belt Cleaner is a Heavy Duty belt cleaning system suitable for High Speed and High Tonnage conveyor belts. The robust frame is engineered to withstand punishing conditions. Blades are designed to withstand increased abrasion at higher speeds. It is suitable for most standard applications, Customized designs available on demand.

TITAN PRIMARY CLEANERS

- Extra heavy duty steel frame with schedule 80 carrier tube for maximum strength.
- Bigger segmented blades with Aluminium reinforcement to meet rugged operating conditions.
- A heavy duty spring tensioner ensures optimum cleaning pressure and reduced maintenance.
- Unique design maintains optimum cleaning angle through all stages of blade life



TITAN INLINE SECONDARY CLEANERS



- Unique T-track design allows in-line blade replacement.
- Heavy duty tensioner ensures optimum cleaning pressure and allows inline removal of cleaner frame.
- Segmented blades with taper profile allows blade to deflect to allow splices and fasteners to pass through.
- Metal faced rubber buffer ensures zero material build up on the cleaner elements.
- Provision for pneumatic tensioner available.

TITAN-SD SECONDARY CLEANERS

- Extra heavy duty steel frame with schedule 80 carrier tube for maximum strength.
- Bigger segmented blades with Aluminium reinforcement to meet rugged operating conditions.
- A heavy duty spring tensioner ensures optimum cleaning pressure and reduced maintenance.
- Unique design maintains optimum cleaning angle through all stages of blade life



CONDOR Belt Cleaner is an economical yet efficient solution for conveyor belt cleaning problems. It is designed for long term performance to withstand punishing conditions. Suitable for most standard duty applications, Customized designs available on demand.



CONDOR PRIMARY CLEANERS



- Pre-Cleaner incorporates a Sturdy Polyurethane blade and Heavy Duty Carrier tube
- Designed for tough and rugged conveyor belt cleaning conditions.
- Single locking pin design allows ease of installation and quick replacement of the blade
- Unique design maintains optimum cleaning angle through all stages of blade life
- Torque storage tensioners to maintain optimum cleaning pressure

CONDOR-PD SECONDARY CLEANERS

- Multiple blade arrangement allows blades to conform to belt profile, especially when worn.
- Robust construction of cleaner assembly resists accidental damage.
- The blades deflect when encountering metal belt fasteners, belt repairs or belt damage.
- Spring tensioner ensures optimum cleaning pressure.
- PU Blades available for belts with fastener joints



CONDOR-SD SECONDARY CLEANERS



- Special Rubber buffers maintains optimum cleaning pressure.
- The blades deflect when encountering metal belt fasteners, belt repairs or belt damage.
- Sturdy mounting bracket with screw take up for tensioning of cleaner.
- Compact design allows installation in cramped areas.

CONDOR TAIL PROTECTION PLOUGHS

- Choice of rubber and polyurethane blades to suit various temperatures and belt speeds.
- V-Plow for unidirectional belts, D-Plow for reversing belts.
- Tensioning arrangement to ensure constant contact between cleaner blade and belt.
- Suitable for high speed and high tonnage belts.
- Can be customized to meet site requirements.

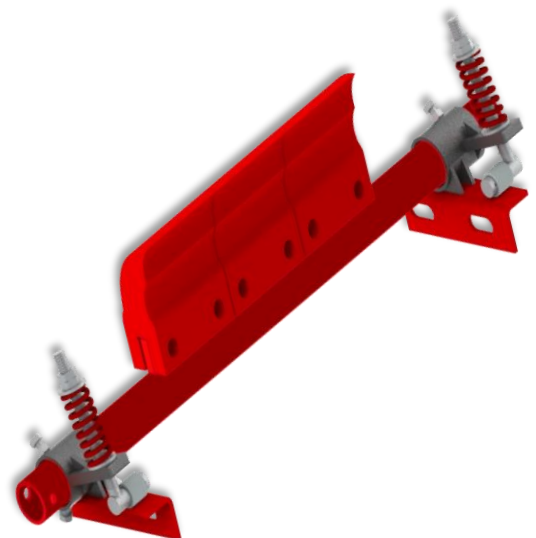


RAVEN Belt Cleaner is an effective, low cost belt cleaner for light to medium duty conveyor applications.

RAVEN Pre-Cleaner is designed for performance at an affordable price. The cleaner incorporates segmented Urethane Blade mounted on a steel frame. Ideally installed in contact with the face of the head pulley, just below the origin of material trajectory, the cleaner design prevents material build up and returns valuable carry back material back into the primary material stream. Standard cleaners are available off-the-shelf, complete with tensioners and mounting brackets. Colour coded Polyurethane blades suitable for different application and conditions are available on request. It is designed to meet the needs of light duty conveyor applications.

RAVEN Light Duty CLEANERS

- Spring tensioners ensures optimum pressure exerted on the belt with maximum cleaning efficiency.
- The scraper's minimalistic design allows ease of installation and replacement of the blade even in confined spaces.
- Cleaners available for belt width 300mm to 1800mm.
- Segmented blade design allows economical operation of the cleaner. Each blade segment is 150mm wide.
- Designed for light to medium conveyor belt cleaning conditions.
- Simple bolting design allows ease of installation and quick replacement of the blade
- Torque storage tensioners to maintain optimum cleaning pressure



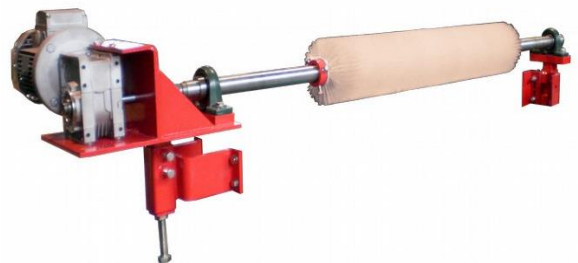
SPECIALTY CLEANERS

Thejo makes a range of belt cleaners for special and non standard applications. These include rotary belt cleaners, belt washing stations, extra wide cleaners etc. These cleaners are custom made to suit the application requirement, to get the best results.



- Spray bar with nozzles positioned to wet entire belt surface softens the carry back
- Multiple cleaners to provide complete removal of fines and water from the belt surface
- Water-tight steel enclosure fitted with flushing line and drain
- Watertight access doors allow easy inspection and service

- Effectively removes carry back fines with the help of rotary action against belt direction.
- Light weight and efficient aluminum body motor ensures maximum cleaning with minimum power consumption.
- Self destructing resilient coupling ensures safety to electric motor.
- Suitable for belts with cleats, chevrons and belts carrying sticky fines.



POLYMAXX URETHANE BLADE SPARES

PolyMaxx



To get the best efficiency and service life from a scrapers, it is very important to choose the best polyurethane suitable for the application. PolyMaxx offers a full range of polyurethane options, each specifically formulated to stand up to highly demanding operating conditions. The colour coding is based on formulations, allowing the clients to choose the correct blade easily. PolyMaxx solid polyurethane blades provides exceptional cleaning, very good service life and can be customized to fit with a wide array of other OEM belt cleaners.

- **Horses for Courses:** Urethanes are available in a variety of formulations, customized to suit different applications.
- **Colour Coding:** Poly Urethane blades are colour coded for ease for selection. Each colour represents a typical application.
- **Proprietary formulations:** The urethane formulations are derived at our state-of-the-art Research and Development centre, are engineered to withstand the tough operating conditions at installation sites.
- **Constant Angle Design:** Polyurethane blades with Constant Angle Design(CAD) maintains optimum cleaning angle through out blade life.

BELT CLEANER ACCESSORIES

TENSIONERS

- Allows splices and fastener to pass through without damage to belt or cleaner.
- Uses the torque stored in the compressed spring to keep the cleaner blade against the belt with minimum re-tensioning.
- Rugged coil spring made of high grade Spring Steel, with protective coating.
- Heavy Duty Dual Spring Tensioner for Heavy Duty Cleaners



MOUNTING BRACKETS

- Mounting brackets make the installation and maintenance of cleaners quick and easy.
- Different mounting brackets are available to meet site requirements.
- Custom-made mounting brackets are offered for special applications.

BELT CLEANER APPLICATION CHART

Belt Cleaner	Max Belt Speed m/s (fpm)	Max Pulley Dia mm (in)	Handles Reversible Belt	Max Temperature * °C (°F)
Titan Primary	7.0 (1400)	810-1220 (32-48)	YES	150 (300)
Titan INLINE	6.0 (1200)	N/A	NO	150 (300)
Titan SD	7.0 (1400)	N/A	YES	180 (300)
Condor/Raven Primary	4.6 (900)	400-760 (16-30)	YES	150 (300)
Condor PD	4.0 (800)	N/A	YES	180 (350)
Condor SD	4.6 (900)	N/A	YES	180 (350)
Belt Wash	4.0 (800)	N/A	NO	180 (300)
Swirl	3.5 (700)	N/A	YES	120 (250)
V-Plow	4.6 (900)	N/A	NO	180 (350)
D-Plow	4.6 (900)	N/A	YES	180 (350)

* For high temperature application, special grade blade/ buffer material shall be offered.

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TRANSFER POINT SOLUTIONS

TITAN®
CONDOR®
RAVEN®
SWIRL®
BELT WASH®
PolyMaxx®

BELT CLEANING Solutions



PolyMaxx



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