CHAIN-VEY®

THE BETTER WAY TO CONVEY

COMPONENT OPTIONS

SYSTEM DISCS

STANDARD

SYSTEM STANDARD - Split FDA approved UHMW discs with sanitary stainless steel compression rivet fasteners.

OPTIONS

1.

1. MOLDED-ON DESIGN - FDA approved UHMW direct over-molded onto stainless steel chain.

CLEANOUT DISCS

STANDARD

SYSTEM STANDARD - FDA compliant clear polyurethane.

OPTIONS

1.

1. METAL DETECTABLE WIPER DISCS - Specifically designed for processing lines with a metal detection system, these wiper discs are made of metal-infused FDA compliant polyurethane that consists of magnetic and metal detectable stainless steel.

2.

2. CONNECTOR LINK SPONGE - In instances where cleanliness beyond that obtained by our standard wiper disc is desired, or when moisture will need to be wiped from the inside of the piping, a sponge disc is available for attachment to the conveyor chain. The sponge disc quickly connects to the chain connector link and does not require disassembly or tension adjustment.

CHAIN

STANDARD

SYSTEM STANDARD - Ultra high-strength hardened alloy steel with tensile strength greater than 16,000 lbf.

OPTIONS

1.

1. 316 STAINLESS STEEL - with tensile strength greater than 16,000 lbf.

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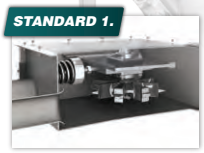
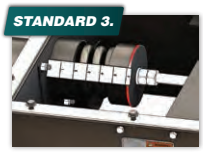
180° TENSIONING TURNAROUND

Keeps the chain tensioned within the system and adjusts as the conveyor is loaded and unloaded with product. May be run in either direction and is configurable with either internal or external tension adjustment.





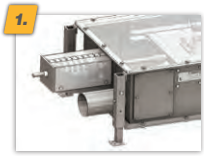
SYSTEM STANDARD

1. INTERNAL TENSION SPRING ADJUSTMENT - Keeping constant tension applied to the chain, a compression spring is utilized within the 180° Turnaround. Having the spring mounted internally allows for a fully enclosed system and prohibits unauthorized adjustments to the tension.

2. TENSION SWITCH - To control any undesirable fluctuations in the tension of the system, each 180° turnaround unit is equipped with a tension limit switch. Any adverse changes in the tension (+ or -) will "trip" the switch which in turn, cuts power to the conveyor. This allows the operator the opportunity to examine the tensioning issue prior to damaging the equipment or causing disengagement from the sprocket.

3. COMPRESSION SCALE - To help with tracking the tension set-point, a scale is provided next to the tensioning spring so that the amount of compression applied can be noted in inch or millimeter increments.

OPTIONS



1. EXTERNAL TENSIONING - The external assembly re-locates the tension nuts and spring outside the front of the turnaround. This allows for easy tension adjustments without removing the turnaround lid.

2. TOOL-LESS ENTRY TURNAROUND - For frequent access to the turnaround unit interior, a tool-less entry option is available. Standard nuts and bolts are replaced with swell latches to securely fasten the lid to the housing. The latches are permanently fastened to the lid, eliminating the issue of losing nuts and bolts. To maintain operator protection, a safety interlock switch is provided. This switch must be wired to the conveyor control system safety circuit to stop operation if the lid is removed.

3. TRAY BOTTOM FOR TURNAROUND - A removable tray is available for quick cleaning of the turnaround unit without the need for lock-out of the drive. The tray can be configured to pull out from any of the four sides by bolt on slide guides. A safety mesh is also utilized above the tray to maintain safety but allow for product to fall.

4. TURNAROUND UNIT ROTATION SENSOR - With each revolution, an inductive proximity switch within the turnaround reads a flag on the rotating sprocket. This can be tied into a control system for confirmation feedback that the chain is moving when the drive is running.

5. TURNAROUND SPRAY NOZZLE - A spray nozzle in the turnaround allows for a cleansing jet of water on the chain/discs, and can be equipped with a quick-coupling hose connection. With this option, the bottom cover of the turnaround is replaced with an inclined bottom to funnel any water and/or product toward a drain connection.

PIPING

SYSTEM STANDARD - Utilizes 4-bolt compression couplings with an internal EPDM gasket and metal grounding strip.

OPTIONS

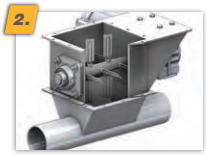
1. FLANGED PIPE - Though our standard compression couplings are proven and effective, some applications call for a more precise connection. For systems that require machined quality connection points, must be water tight, or call for frequent disassembly/reassembly, flanged pipe connections are beneficial. Flanges are machined with corresponding male and female ends for an exact fit.

INLET

The entry point of product into the conveying system. Can incorporate flow control baffles to set product fill level and prevent shearing.

OPTIONS

1. TAMPER-RESISTANT INLET BAFFLE - To prevent unauthorized adjustment of the inlet flow baffles, standard hand knobs can be replaced with tamper-resistant pin-in-head Torx cap screws. This limits adjust-ability to only the operators who are supplied the correct T40 Torx driver.



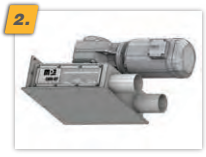
2. LUMP BREAKER - When conveying product prone to solidifying or bridging, a lump breaker is often a good addition to keep product flowing into the inlet point of the Chain-Vey. The lump breaker is equipped with a 1.5 hp motor which rotates a group of paddles to keep product fluidized.

DRIVE

Used in conjunction with the 180° turnaround unit, the drive unit pulls the chain through the drive unit by an electric gear motor powered sprocket. The drive unit may be run in either direction and is typically for bi-directional system configurations. The drive unit is installed at the end of the circuit system and is typically used as the final or only discharge point.

OPTIONS

1. DRIVE UNIT CHAIN KNOCKERS - In addition, or as an alternative to the use of air-jets to remove lingering product, pendulum "knockers" are available to physically strike the conveyor discs and remove unwanted carry-over. The knocker hangs in the path of the conveyor chain/discs, swings with the direction of travel, and strikes each individual disc as they pass. The knockers are available for the product and/or return side of the drive unit.

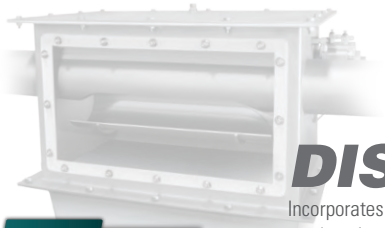


2. DRIVE UNIT STAINLESS STEEL BOTTOM - For any application where the drive unit is not to be used as a discharge point, a stainless steel cover can be supplied to cap the bottom of the unit.

3. DRIVE UNIT SIDE AIR KNIFE DOOR - The best configuration for compressed air cleaning within the drive is to blow away from the return port. This is achieved by replacing the side window on the return side with a special door fitted with custom-positioned air knives.

INTEGRATED DRIVE/TENSION UNIT

For loop-type configurations, the integrated drive and tension unit has two sprockets that allow for both tensioning and powering the chain in one component.



DISCHARGE VALVE

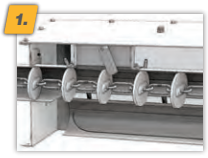
Incorporates a pneumatic actuated drop-door, which allows for automated opening and closing of the valve. Multiple discharge units may be placed at any location in a system when a number of discharge points are required, such as supplying product to a bank of silos.

STANDARD

SYSTEM STANDARD

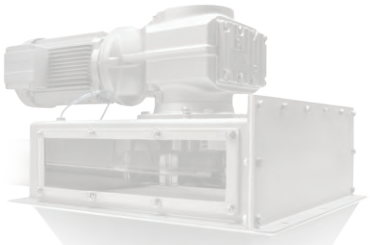
DISCHARGE VALVE AIR JETS - A series of air jets can be installed to assist with 100% product discharge or chain and disc cleaning.

1.



OPTIONS

1. DISCHARGE VALVE KNOCKERS - Pendulum "knockers" can also be added to the discharge valves to physically strike the conveyor discs and remove unwanted carry-over as product releases from the discharge valve.



VARIALBLE FREQUENCY DRIVE

VFD's are required on all Chain-Vey systems for speed optimization and control.

1.

2.

OPTIONS

1. BUILT-IN BY MPE - Motors 5 hp and under can be supplied with an internal VFD.

2. EXTERNAL BY MPE - Motors over 5 hp require an external VFD.

3. SUPPLIED BY CUSTOMER