

# 199-PVE24EZ

## 24 Volt DC Horizontal Power Conveyor (Zero Pressure Accumulating Type)

The Model 199-PVE24EZ Accumulating conveyor uses a 24 VDC motor/reducer to drive Poly-V Belt driven tread rollers. This conveyor is designed to handle cartons or pallets. Products may be accumulated in zones and released upon request.

- EZLogic™ Accumulation System
- Poly-V Belt Driven Rollers
- Shaft Mounted 24 VDC Drive
- Adjustable MSN-Type Floor Supports Available



U.S. Patent Numbers  
5,862,907 • 7,243,781 • 7,591,366  
Other Patents Pending.

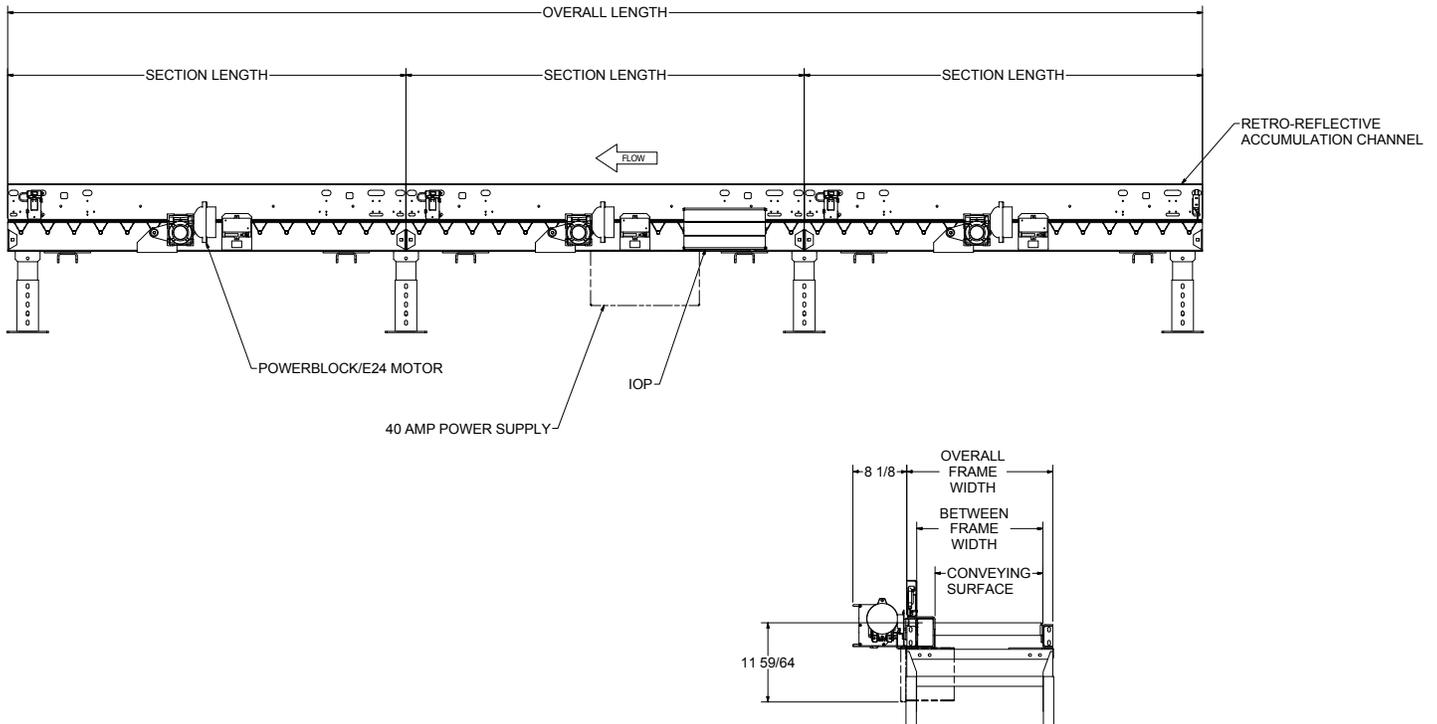
Conveying Surface	12 ¼"	14 ¼"	16 ¼"	18 ¼"	20 ¼"	22 ¼"	24 ¼"	28 ¼"	30 ¼"	34 ¼"	36 ¼"
Between Rail Width	15"	17"	19"	21"	23"	25"	27"	31"	33"	37"	39"
Overall Frame Width	18"	20"	22"	24"	26"	28"	30"	34"	36"	40"	42"
Weight (Lbs.) Per Foot 3" Roller Centers	56	59	61	63	66	68	71	75	78	81	85
Weight (Lbs.) Per Foot 4" Roller Centers	51	53	55	57	59	61	63	67	69	73	75
Weight (Lbs.) Per Foot 6" Roller Centers	46	48	50	52	54	56	58	62	64	66	68

- Total Weight = (Number of Zones x 30) + (OAL x Weight Per Foot)
- All weights in catalog are conveyor weights only. Accessories, crating, etc. are not included.
- Motors will slave a maximum of 40 rollers, 20 rollers per side.



## HOW IT WORKS

The conveyor is made up of accumulation zones. Each zone contains an individual zone drive interfaced to Hytrol's EZLogic™ Zone Controllers, which sense product presence and control the accumulation and release of the zones by starting and stopping the zone drives.



## • STANDARD SPECIFICATIONS

**BED**—Roller bed with 1.9 in. dia. x 9 ga. unplated rollers spaced every 3, 4, or 6 in. Tread rollers mounted in 3 ½ in. x 7 ga. formed channel on side opposite guard and 4 ½ in. x 7 ga. formed channel on guard side. Bolted together with butt couplings.

**POLY-V BELT**—J profile, 4-rib roller to roller

**GUARD**—Formed steel guards totally enclose drive belts.

**ACCUMULATION ZONES**—4 in. roller centers, 32 in. to 120 in. on 4 in. increments. 6 in. centers, 30 in. to 120 in. on 6 in. increments. Frame length changes with zone length.

**MOTOR**—One 24 VDC motor in each zone.

**EZLOGIC® ZONE CONTROLLER**—Located in each zone (Retro-Reflective). NEMA 1, 2, IP 62. UL Approved.

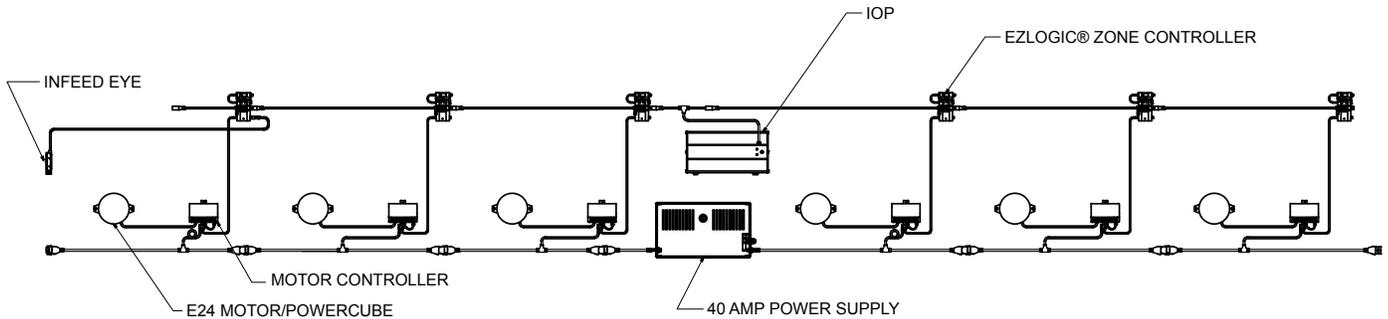
**POWER SUPPLY (FOR MOTORS)**—40 amp DC power supply, 28 volt fixed output. Maximum of 12 zones per power supply. 120 vac, 24 amp input. Mounted near center of conveyor.

**IOP**—Provides 27VDC, 100 watt power for EZLogic® accumulation system - contains slots for 4 input/output boards. Operates up to 50 zones with maximum of 25 on either side of IOP. Requires 120VAC or 230VAC single phase input.

**CONVEYING SPEED**—Up to 35 FPM.

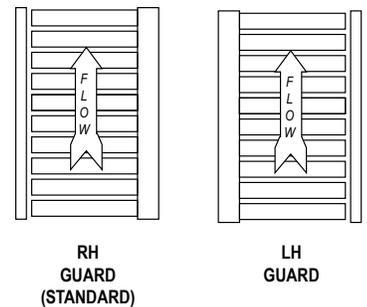
**CAPACITY**—Maximum load per linear foot of conveyor 150 lbs. supports on 10 ft. centers. 250 lbs. per ft. with supports on 5 ft. centers. Not to exceed 1000 lbs per zone. Zones longer than 6 ft. may require an additional floor support depending on product load.

**FLOOR SUPPORTS**—Now supplied as optional equipment.



Power Supply	Max Number of Zones
20 AMP	4
40 AMP	8

† **Note:** Infeed Wake-Up Eye used only on terminating infeed end of conveyor. Not used when connecting to upstream EZLogic® conveyor through power supply isolation cable.



### EZLOGIC® ACCUMULATION SYSTEM

Hytrol's EZLogic®, or "Electronic Zero-pressure Logic" Accumulation System, combines the sensing accuracy of photo-electronics with discrete electronic logic control without the use of a PLC or pneumatic logic components. The EZLogic® Accumulation System provides many features including:

**Zero-Pressure Accumulation of Product**

**Zone Stop - Function** is built in. Any zone may be transformed into a workstation by connecting a dry contact switching device to the auxiliary port of the EZLogic® Zone Controller. This feature is always used at the discharge end of the conveyor line, and may be used at any other location where a zone stop is required.

**Dynamic Zone Allocation** – Automatically adjusts the conveyor's zone length to accommodate the length of the product being conveyed. Improves conveyor efficiency and system flexibility.

**Sleep Feature** – Stops tread rollers from turning when no product is present, reducing noise, reducing energy consumption and extending roller bearing life.

**Unloading Zone Feature - Zone On Delay** – Timer delays the zone immediately upstream from a removed load, preventing it from driving for a set time. This feature is ideal where loads are routinely removed from the conveyor with a lift truck.

**Loading Zone Feature** – Zone detects load being placed onto the conveyor with a fork truck and stops the zone from driving and automatically prevents any loads in zones upstream from entering loading area.

## • OPTIONAL EQUIPMENT

**FLOOR SUPPORTS**—MSN Type floor supports are available with a wide range of adjustment. Specify top of belt or roller elevation. One support required at every bed joint and ends of conveyor. Holes in feet for lagging to floor. Knee braces recommended above MSN-6 support.

**CONVEYING SPEED**—Other constant and variable speeds. **Note:** Capacity affected with speed change.

**GUARD RAILS**—Adjustable Universal Channel Guard Rail, (both sides) fixed channel (both sides) or angle (one side).

**POLY-TIER SUPPORTS**—36 in. to 120 in. support heights in 6 in. increments. Knee braces supplied.

**CEILING HANGERS**—½ in. dia. x 8 ft. long unplated rods fully threaded. Other lengths and galvanized rods available.

**EZLogic®** – See EZLogic® Components Page.