

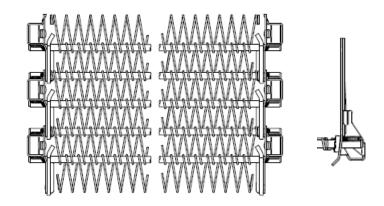
# Ashworth Engineering

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# PRODUCT TECHNICAL BULLETIN

# ExactaStack WD

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# **DESCRIPTION**

ExactaStack WD is a stainless steel, self-stacking belt designed to be a drop-in replacement belt for popular heavy–duty stacker systems. It is available in all standard widths and tier heights. It works with OEM drive systems and can be spliced directly to OEM belts, allowing replacement of small sections of damaged belt or the entire belt with no modification to the system.

# **SPECIFICATIONS**

• Material

Stainless steel links, rods, and mesh.

Rod Size

6mm (.236") or 7mm (.276") depending on belt width

• Pitch

Longitudinal pitch is 59.9mm (2.36") per link. The intermediate rod is spaced at 30mm (1.18").

Tier Height

Nominal tier heights of 80mm (3.15"), 100mm (3.94"), 120mm (4.72"), 150mm (5.90"), 180mm (7.09"), and 220mm (8.66") are available.

• **Belt Width** Belt is offered in widths to fit pre-engineered systems. Available widths are:

760mm (29.92"), 920mm (36.22") and 1060mm (41.73").

# • Conveying Surface

Useable width is approximately 42mm (1.65") less than belt width.

# • Open Area

6mm Mesh: 35% straight, 21% turn 9mm Mesh: 51% straight, 40% turn 13mm Mesh: 61% straight, 52% turn 20mm Mesh: 69% straight, 62% turn

# • Turn Capability

Belt is designed to turn in one direction only. Inside edge links are supplied with ventilation holes for compatibility with existing systems. Either right hand (CW) or left hand (CCW) turn direction must be specified.

Belt Weight (lbs/ft)

# • Turn Ratio

Turn ratio (turn radius  $\div$  belt width) is 1.7.

#### • Belt Weight

Select the belt weight from the table below.

Belt	Link	Pitch	6mi	n	9m	m	13m	m	20m	m	
Width	<u>Height</u>	Wire	1.6mm	1.8mm	1.6mm	1.8mm	1.6mm	1.8mm	1.6mm	1.8mm	
760mm	80mm		9.57	10.52	8.40	9.04	7.68	8.12	7.10	7.40	
		100mm		9.96	10.91	8.79	9.43	8.06	8.51	7.49	7.78
	120mm		10.34	11.29	9.17	9.81	8.45	8.90	7.87	8.17	
		150mm		10.92	11.87	9.75	10.39	9.03	9.48	8.45	8.75
	180mm		11.50	12.45	10.33	10.97	9.61	10.05	9.03	9.33	
	220mm		12.27	13.22	11.10	11.74	10.38	10.83	9.80	10.10	
920mm	80mm		13.00	14.21	11.50	12.31	10.57	11.13	9.86	10.23	
	100mm		13.38	14.59	11.89	12.70	10.95	11.52	10.24	10.62	
	120mm		13.77	14.98	12.27	13.09	11.34	11.90	10.63	11.01	
	150mm		14.35	15.56	12.85	13.67	11.92	12.48	11.21	11.58	
	180mm		14.93	16.14	13.43	14.24	12.50	13.06	11.79	12.16	
	220mm		15.70	16.91	14.20	15.02	13.27	13.83	12.56	12.94	
1060mm	80mm		14.71	16.12	12.93	13.87	11.87	12.53	11.05	11.48	
	100mm		15.10	16.51	13.32	14.25	12.26	12.91	11.43	11.87	
	120mm		15.48	16.89	13.70	14.64	12.64	13.30	11.82	12.26	
	150mm		16.06	17.47	14.28	15.22	13.22	13.88	12.40	12.84	
	180mm		16.64	18.05	14.86	15.80	13.80	14.46	12.98	13.41	
	220mm		17.41	18.82	15.63	16.57	14.57	15.23	13.75	14.19	

# **OPERATING RATINGS**

# • Allowable Tension

Belt strength is not rated. Belts are designed for replacement use in zero-tension self-stacking systems, where tensions do not typically exceed 100 lbs (45.5kg). Belts will carry the maximum load specified by the system manufacturer for an equivalent belt.

- Belt Speed 100 ft/min (30 m/min).
- **Temperature Rating** -50°F (-46°C) to 400°F (204°C)

For applications that do not comply with these rating limits, please consult Ashworth engineering.

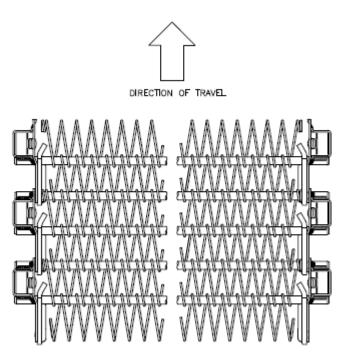
# **BELT OPTIONS**

## • Wire Mesh Overlays

Mesh is specified using the standard designation for existing systems, X-Y-Z, as shown below.

X = Belt Width	Y = Pitch	Z = Wire Dia.
<b>76</b> = 760 mm	<b>6</b> mm	<b>1.6</b> mm
<b>92</b> = 920 mm	<b>9</b> mm	1.8 mm
<b>106</b> = 1060 mm	<b>13</b> mm	
	<b>20</b> mm	

Standard mesh overlay for ExactaStack is a right-hand wind, unilateral weave (see illustration below) comprised of two mating spirals. The first terminates with round pigtails on the leading side of the spiral. The second terminates with oval pigtails on the trailing side of the spiral and has one less loop across the width of the belt such that the oval pigtails are nested within the round pigtails on the adjacent spiral. The pigtails of both spirals are installed on the connecting rod joining the links. Tension links are installed between the links and the spirals on both sides of the belt.



# • Special Wire Mesh Overlays

Typically, special mesh configurations can be made to match existing belts with non-standard mesh overlay. Please consult Ashworth engineering.

# **BELT OPERATION**

#### **General Guidelines To Reduce Belt Tension and Wear:**

- Clean and lubricate guides and supports.
- Replace plastic wear coverings on guides and supports when worn.
- Clean ice and product debris from the belt, sprockets, and idlers to prevent belt damage.
- Observe the effect of temperature on the coefficient of friction between the supports and the belt. Products may leave a slick residue at room temperature that can become viscous or sticky as the temperature decreases. At freezing temperatures the debris may become slick again or leave a rough surface depending upon its consistency.
- Remove extra weight from the take-up loop.
- Align sprockets properly and insure that they do not migrate on the shaft.
- Do not overload the belt.
- Decrease belt speed.

#### **Lubrication**

Lubrication is not required under normal operating conditions. However, lubrication will enhance belt performance, particularly at higher belt speeds or when conveying heavy product loads. Make sure any lubricant used is compatible with your belt material and product. SPIRALUBE Belt Oil from Ashworth Factory Service is recommended.

#### **Application Method**

- Brush, fed from a drip reservoir, applied onto the belt's underside in the return path so that the belt coats the loaded path rails with the lubricant.
- Install and activate lubricator for either a predetermined application interval or when drive motor amperage indicates excessive belt tension.

Reference: Product Technical Bulletin "Conveyor Design Guidelines".

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