



Lower your water consumption and reduce your cleaning time!

In a recent industry wide study conducted at meat processing plants across the country they found the following water consumption rates:

- A typical slaughter house uses ~696 gallons of water per LWK.*
- A typical packing house uses ~1046 gallons of water per LWK.*
- A typical processing plant uses ~1265 gallons of water per LWK.*

Water is used within the plant for a variety of processing needs including: Kill, evisceration, cutting, rendering, and further processing. Today the use of conveyor systems to assist in the processing and movement of products within plants is common practice. All of these conveyor systems require routine cleaning to remove product that remains after processing has been completed each day.

We recently completed a study of water used in cleaning one conveyor belt used in a major meat processing facility in the Midwest. We compared the amount of water needed to clean a modular plastic conveyor system to one using a thermo plastic system. The thermo plastic belt has a smooth surface, resistant to cutting, this eliminate crevices where bacteria can grow. It also has an integral positive drive providing the benefits of modular belting. The belt is USDA / FDA / 3A Dairy certified and extremely hygienic.

Belt Study	Gallons Per Cleaning	Minutes Per Cleaning
Intralox 800 Series 30" x 35' (Total conveyor length)	570	31
Thermoplastic 30" X 35' (Total conveyor Length)	125	6.5
Daily Reduction (Based on 1 shift 6 days per week)	445	24.5
Yearly Volume Reduction (Based on 1 shift 6 days per week)	138,840.00	7,644.00
Yearly Cost Reduction (US average cost of water \$1.00 per 1,000 gallons)(converted minutes to hours then x \$24 per hour average labor cost)	\$1,338.40	\$3,057.76
Percentage of Reduction	78%	79%

As you can see from the chart above there was a significant reduction in the amount of water used to clean one belt. Approximately 138,840 gallons per year. This results in an annual savings of \$1,338.00 per year based on US average cost of water at \$1.00 per 1,000 gallons. As an added bonus, the amount of time needed to clean the belt was reduced from 31 minutes to 6.5 minutes. This resulted in an additional labor savings of \$3,057.00 per year. Less cleaning time also means additional savings in the decreased use of harmful detergents and less waste water. This particular processing plant had seven of these conveyor systems in operation, the estimated annual water savings was over 1,000,000 gallons per year. Please contact us at any of our locations below for more information.

"The plant with the lowest waste load also had the lowest water use*"

* North Carolina State University at Raleigh #am18c

Minneapolis, MN 800-279-2450	Owatonna, MN 877-891-8276	Hibbing, MN 888-882-1613	Arrowhead Belt Service 888-882-1613	Conveyor Services 888-882-1613
Des Moines, IA 877-860-2700	Fargo, ND 877-373-1188	Sioux Falls, SD 877-270-7428	Baldwin Automation & Control 800-279-2450	Light Weight Belting 800-897-1964