

The ALL-CON Hot-Melt Glue Conveying System



A Superior Thermoplastic Adhesive Materials Handling System for Packaging Applications

Unique Features:

- Automated conveying
- Stand alone design
- Feed multiple glue stations
- Transport chips long distances
- Self-cleaning process
- State-of-the-art controls

A Highly Reliable System For Conveying Thermoplastic Adhesives To Hot-Melt Glue Melters



The ALL-CON Hot-Melt Glue Conveying System is an automated, stand-alone materials handling system, designed for production-line packaging applications, that effectively conveys a consistent flow of thermoplastic adhesives to hot-melt glue melters.

When compared to other hot-melt adhesive conveying systems -- the ALL-CON system can substantially improve the material handling efficiency, and lower maintenance costs and down time.

This patented, custom-engineered system by ALL-CON World Systems, Inc. can transport solid hot-melt glue, either pellets (B-Bs) or chiclet-sized chips, a distance of more than 100 feet from a bulk source to a melter unit. It feeds either a single or multiple glue stations -- all receiving material from the same container of adhesives.

Stand-alone Design

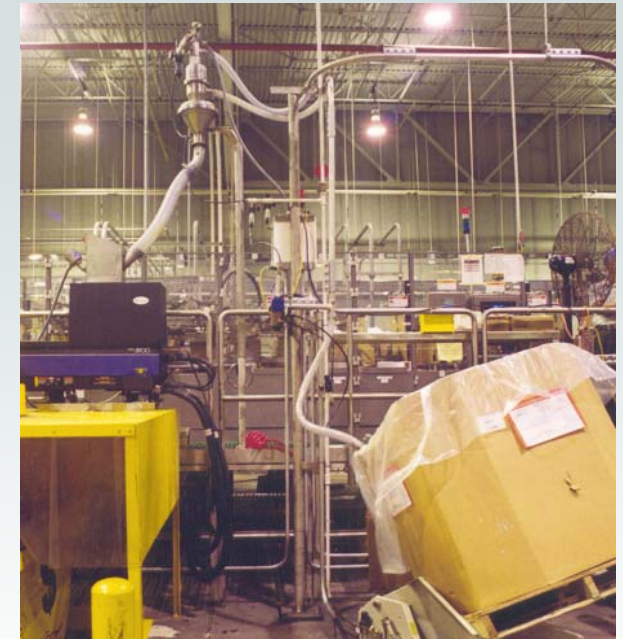
The proprietary system meets an industry need for a reliable, self-cleaning process that automatically transports hot-melt adhesives a much greater distance from a bulk source to a melter unit than is possible by other type systems. One of the unique features is its totally stand-alone design. There are no direct mechanical tie-ins or any direct electric circuitry connections to production line equipment.



How It Works

In operation the ALL-CON system has two basic cycles:

- Convey and store the adhesive material, and
- Discharge and route the material to the melter.



It is designed to batch convey an uninterrupted flow of hot-melt adhesives, while preventing the chips from being left in the conveying line after each cycle. This eliminates the possible buildup of product in the conveying line.

The system automatically responds to a melter's need for hot-melt glue using electronic instrumentation that senses, monitors and controls the process.

Responding to a sensor's signal that the quantity of glue in the melter is at a low level, stored adhesive from a gaylor is automatically conveyed to the melter unit. The adhesive is transported through a flexible hose and aluminum conveying line to a vacuum chamber assembly and filtered before being discharged to a convergence cone assembly.

Keeping the System Clean

The ALL-CON system filters material at various points in the conveying process to effectively screen the particle size of material flowing through the line and to minimize foreign particles, such as fines and powder, from entering the melter unit.

This minimizes the risk of clogging melter nozzles -- a common problem experienced by most adhesive melting systems being used for packaging applications, thus reducing cleaning and replacement costs.

At the end of each cycle, the system is automatically purged clean -- to assure that no buildup of material remains in the conveying line. A filter screens unwanted particles before being discharged into the receiving hopper, which then directs the clean material to the melter.



Undersized chips and fines are separated by a stainless steel filter and isolated from the material being processed. These chips and fines are directed to an inline secondary filter, which is located on the vacuum power unit at floor level for easy servicing.

In addition to the system's ability to continually clean itself, it also is designed to restrict moisture entering the system due to heat transfer from the melter. This allows the chips to remain dry, and prevents bonding before the glue begins to change to a molten state upon entering the melter.

About The Company

ALL-CON World Systems is a premier systems integrator and manufacturer of automated, integrated bulk materials handling systems -- including major, minor and micro ingredient feeding, weighing and conveying of dry powdered ingredients -- designed especially for the chemical, plastic, food and packaging industries.

ALL-CON specializes in designing, fabricating and installing customized systems, including single to multi-point vacuum conveying systems. Its conveying systems include both dense- and dilute-phase designs.

Packaging Application

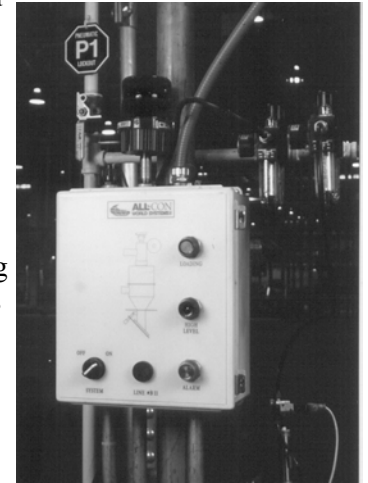
In the mid 1990s, ALL-CON began developing a vacuum conveying system to transport hot-melt glue chips for a packaging application at a major U.S. brewing company. A prototype was designed and installed in 1996, and subsequent refinements were made to further improve the system's operating efficiencies.

Since then, ALL-CON has patented the system, and has multiple systems operating at a number of the brewery's facilities.

ALL-CON is now offering this Hot-Melt Glue Conveying System to others who are using or planning to use thermoplastic adhesive material in their packaging operation. The system is time tested, and proven to be highly efficient and dependable. Its performance record is second-to-none.

System Controls

The system is equipped with a state-of-the-art control panel that integrates sophisticated electronic controls and displays readings from various sensors in the system. It can be utilized with most operating systems used on production lines for packaging applications and is extremely user friendly. The ease in operating and monitoring the system is remarkable.



Savings

Users of the ALL-CON Hot-Melt Conveying System can expect to realize substantial savings from this system in their packaging operations. These savings are a direct result of the system's ability to keep maintenance at a minimum, and to reduce downtime.

ALL-CON World Systems, Inc.
P.O. Box 647
Seaford, DE 19973
Phone: 302-628-3380
Fax: 302-628-3390
E-mail: sales @all-con.com
Web site: www.ALL-CON.com

