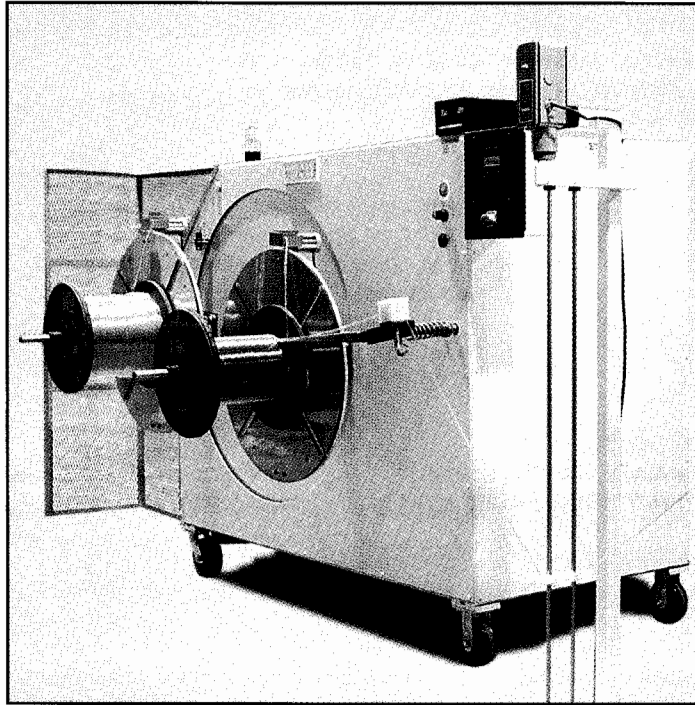


Vulcan Sonic Loop Turret Coiler SLC-PS Series



APPLICATION:

Vulcan's Turret Coiler is a two spindle, turret type unit in which the extrudate is fed to the coiler under an ultrasonic sensing dancer that locates the position of the extrudate loop and adjusts the speed of the servo driven spindles to maintain a virtually tensionless coiling operation. The unit is equipped with an automatic cut and transfer system that will rapidly transfer the product from the full reel to the new empty reel without disrupting the coiling process at speeds to 700 fpm. The addition of low or high levels of tension control can be provided, if required. The spindle and traverser control is a coordinated two-axis, fully programmable AC servo system. This allows for unprecedented accuracy and flexibility at greatly extended speed ranges.

Model Number	Max. Package O.D. (Inches)	Max. Package Traverse (Inches)	Standard Arbor Diameter (Inches)	Max. Package Weight (Pounds)	Motor Torque Continuous (In./Lbs)	Motor Torque Peak (In./Lbs)
SLC18PS	18	14	1-1/2	100	33	135
SLC28PS	28	14	1-1/2	125	48	200
SLC38PS	38	14	2	200	48	200

FRAME:

- Heavy wall Tubing, Steel Plate, & Structural Sections
- Two Rigid and Two Swivel Casters & Hold-Downs

PROGRAMMABLE CONTROLS:

- Vulcan Sonic Loop Coilers are equipped with fully programmable, closed loop position and velocity coordinated, dual axis, AC servo control
- Easily programmed using Basic programming format - complete software documentation
- Four line LED display of machine functions provides for easy trouble shooting of input and output controls
- Servo controller allows for rapid change-over and set-up from product to product

DRIVE TRAIN:

- Drive motors are class H, low inertia, brushless AC servo motors
- Coiler drives are geared in at customer's desired maximum speed
 - maximum to minimum coiling speed is over 500 to 1

ULTRASONIC DANCER AND PRODUCT GUIDES:

- Loop detection by ultrasonic dancer making no contact with product
 - sensor determines amplitude of loop by reflection of time sequenced ultrasonic tones
 - microprocessor computes loop position and adjusts coiler speed instantly as required
- Product guide system provides close coupling to spool resulting in precise lay-on with low tension. One set of product guides furnished.
 - provisions for tensioning and tension control offered as optional features

TRAVERSER:

- Traverser drive is servo motor driven
- Servo motor traverser is electronically coupled to spindle drive via Integrated LAN Communications Network
- Traverser automatically slows down proportionally as RPM of spindle changes with package build-up or line speed changes
 - pitch infinitely adjustable throughout range
- Multiple traversing patterns including instantaneous and delayed reversal, pancake winding, and geometric end point control

ELECTRICAL:

- Standard units are wired for 230/3/60
 - Electrical other than the above is available as an option

SPINDLE CONFIGURATION:

- Spindles flanged one inch from the machine housing
- Mounting Flange is 6" O.D.

CONTROLS:

- Four Line LCD display with soft touch key pad entry
- Proprietary software driven display
 - Guides operator through set-up and prevents input errors
- Start push button
- Emergency stop push button
- Single turn line speed potentiometer (for manual operation)
- Reset traverser and turret push button
- Automatic/Manual locking selector switch
- Manual counter override with counter reset
 - Pushbutton for reset after package transfer

OPTIONS:

- Custom winding heads for reeless packages
- Fully programmable cut length system
- Incoming line transfer for electrical requirements other than 230/3/60
- Tension adding and controlling system for applications requiring tension
- Automatic storage and retrieval of process parameters based on part numbers
- Extra product guides

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