

microglue®

HM25 MELT UNIT

Innovative new technology makes the GMS HM25-2, 4, 6 & 8 the best performing melt unit available.

Unparalleled features and benefits make the HM25 a perfect choice for commercial printing, mailing and bindery applications.



HM25 Melt Unit

25 pound advanced Teflon coated tank

2, 4, 6 and 8 hose/gun configurations

Digitally controlled output pressure

24 Hour Timer for auto start-up

100 pound/hour melt and pump rate

Optional tank level detection with low level alarm

Energy-Miser, power conservation technology, a green solution!

HM25 series melt units are designed to provide ultra high performance, precise pressure and temperature control and outstanding features for fugitive, permanent, re-moistenable or pressure sensitive hot melt adhesives.

Our proprietary closed loop torque sensing motor drive system allows the unit to be digitally set to deliver an exact pressure. Feed back from an integrated pressure transducer is constantly monitored eliminating any variation in output pressure regardless of the load. The pressure can be set either manually on the melt unit or via the external GMS pattern controller. This pressure setting can be fixed or proportional to machine speed. There are many advantages of our new innovative pumping technology, it offers all of the advantages of both piston and gear pumps without any of the drawbacks. The fact that the pump motor only rotates when needed pumping only enough glue to offset

consumption. This concept eliminates the primary disadvantage of a gear pump because there is no recirculation of the glue which causes molecular breakdown. Alternatively, since the pump output is digitally set and pressure maintained at an exact setting there is no momentary lapse in output pressure like with a piston pump designs

The new high performance Teflon coating used on the cast aluminum tank is rated for applications over 1000 degrees F and extremely resistant to abrasion. The 25 pound capacity tank holds enough glue to satisfy most graphic arts related applications. The tank casting design has been engineered for optimum heat transfer enabling the unit to melt a greater amount of adhesive with less energy.

The GMS HM25 hot glue unit is an integral part of a high tech GMS adhesive application system.

GMS



HM25 2, 4, 6 & 8 Head/Hose Melt Unit

Specifications:

Hydraulic Pressure ¹	500 psi
Tank Capacity	25 Pound
Pump Rate ¹	100 Pound/Hour
Melt Rate	100 Pound /Hour
Working Viscosity	20,000 cps
Sensing Technology	Thermistor, 10,000 ohm
Electrical Requirements	208-240VAC Single Phase 20 amp
Wattage	7,200 Watts
Dimensions	16.5" W x 22" L x 16" H
Weight	96 LBS

Note, The GMS microglue[®] hot glue system does not require pressurized air.

¹ Performance will be affected by higher viscosity adhesives.
Recommended viscosity is 500 - 3000cps for optimum performance.

Features:

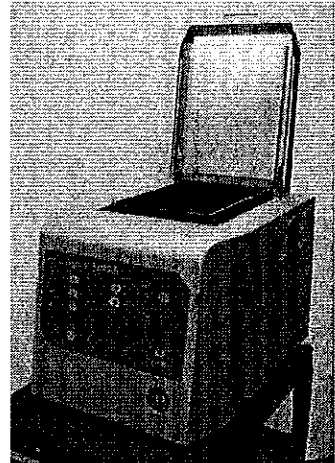
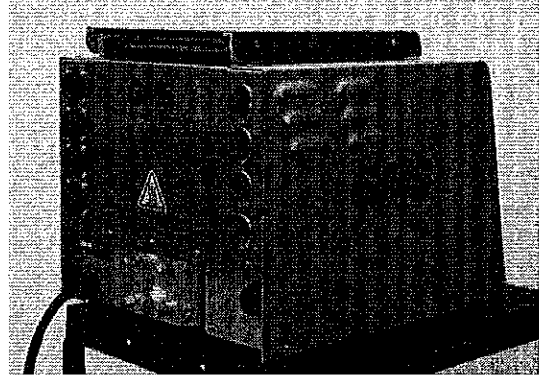
Each temperature zone which includes the tank, each hose and each applicator are independently set.

The variable torque gear pump drive system allows you to set the desired output pressure to an exact value and can be increased or decreased by using the up and down arrow keys.

The system has a built in 24 hour timer for automatic start-up and a stand by mode so that the system can be partially cooled down between jobs

HM25 units are field upgradable from 2 to 8 hoses/guns. Upgrade kits contain an output PC board assembly and a connection wire harness assembly. The system will automatically recognize the addition of the PC board and will reconfigure itself for the correct number of outputs.

The melt unit is securely mounted to a rolling stand assembly with a built in extension cord, lockable casters, an auxiliary mounting bar for storing unused applicators and two shelves for tools or adhesives.



microglue®

428 Series 4 channel 8 output controller

The 428's 4 channels, 2 events per channel, 4 optical sensor inputs and 2 encoder inputs along with it's distance based stitch and 8 high power outputs provide outstanding performance at an affordable price.

Microglue® 428 features

Inch, centimeter or millimeter operation

Two individually programmable events per channel

Four optical sensor input

Programmable output to operate any type of device

Hot and cold glue gun purging

Optical sensor lockout feature

Patented output speed compensation

Hot melt pump control

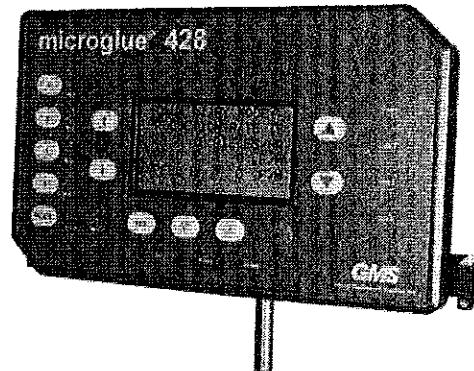
Shutter control for cold glue guns

Distance based stitch pattern control

Programmable output maximums frequency settings

Dual encoder inputs

Proportional control for glue pressure



Microglue® 428

The **microglue® 428** is the simplest and easiest to use 4 channel pattern controller available on the market today. Each channel is capable of being programmed for two separate events each a line, dot or stitch pattern. The 428 high power constant current outputs can be configured to allow you to operate many different types of glue or tape applicators. The 428 allows real time adjustments to its outputs, making it simple for operators to get the exact pattern needed. The systems distance based pattern stitching capability allows each event to be programmed to apply multiple glue patterns. Features such as 4 optical sensor inputs dual encoder inputs proportional control of glue pressure and shutter and pump controls make the 428 a very versatile controller. Like all GMS pattern controls the 428 incorporates our patented speed compensation, output cutoff speed and optical sensor lockout features.

The 428 is a perfect fit for commercial folders, pocket folder gluers straight line folder gluers and conveyor / tipping or card inserting system

GMS

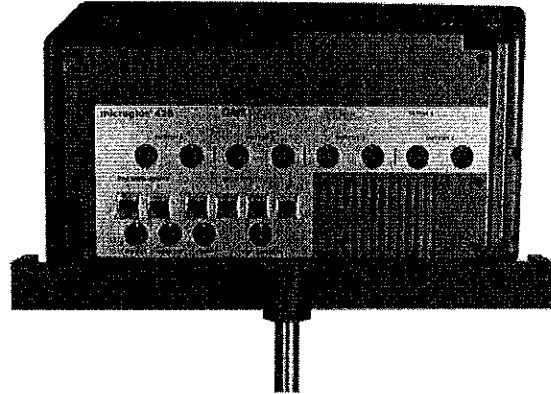


428 4 channel 2 event 8 output pattern controller

Specifications:

GENERAL

CHANNELS	4
EVENTS PER CHANNEL	2
OUTPUTS PER CHANNEL	2
OPTICAL SENSOR INPUTS	4
ROTARY ENCODER INPUTS	2
SHUTTER CONTROL OUTPUT	1
BATCH KICKER OUTPUT	1
HOT MELT PUMP OUTPUT	1
SHUTTER CONTROL OUTPUT	1
PROPORTIONAL CONTROL OUTPUT	1



ELECTRICAL DATA

INPUT POWER	90 to 264 VAC
INPUT FREQUENCY	47 to 440 Hz
GLUE VALVE OUTPUT	1.5 MAX Output current
SHUTTER CONTROL OUTPUTS	12 VDC, 100 watts
BATCH KICKER OUTPUT	12 VDC, 100 watts
PROPORTIONAL CONTROL	0 to 10 VDC,

PROGRAMMING SPECIFICATIONS

PROGRAMMING RESOLUTION	.01 inch, .3 mm
MAXIMUM GLUE LINE LENGTH	100 inch, 2540 mm
MAXIMUM PRODUCT LENGTH	100 inch, 2540 mm
ACCURACY	.01" at 1,000 ft/min, .3mm at 500 m/min.
PURGE FREQUENCIES	1000,500,333,250,200,150,100,75,50,25,10, or 5 Hz
OUTPUT FREQUENCY LIMITS	1000,500,333,250,200,150,100,75,50,25,10, or 5 Hz
MAXIMUM PRODUCT IN QUEUE	10 pieces between optical sensor and glue valve

DIMENSIONS

SIZE (H x L x W)	13.250inch x 8.187inch x 3.025 inch
WEIGHT	5.6 lbs,

OPTICAL SENSOR—

OPERATING VOLTAGE	10 to 30 VDC
CONTINUOUS CURRENT	300 ma
RESPONSE TIME	1 ms
LIGHT SOURCE	Infrared

ENCODER—

OPERATING VOLTAGE	+5 VDC
RESOLUTION	600 pulses per revolution
SPRING MECHANISM	Internal bi-directional
DESIGN	Ultra compact
FRICTION WHEEL	6 inch Circumference polyurethane cast ring on an aluminum hub
CABLE	12 foot with modular RJ45 connector