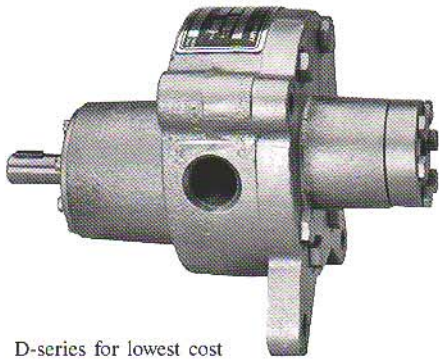


# SMALL CAPACITY PUMPS

## FOR CYLINDERS, AUTOMOTIVE, FORKLIFT, AND



D-series for lowest cost

### D-SERIES

Each D-series pump comes complete with a back to tank bypass valve and built-in strainer. Without disturbing the piping, the gear set and strainer screen can be serviced. Likewise, should the mechanical shaft seal assembly require replacement, the gear set does not have to be removed from the pump. Each D-series pump uses a BUILT-IN bypass valve cartridge set at 90 psid. Pump bypass must be piped back to the supply tank. Designed for direct motor mount to 56C-frame electric motor. Foot mount available.

### E-SERIES

Each E-series pump comes complete with an internal/external bypass valve and built-in strainer. Affords the flexibility of either using the pump bypass valve to relieve within the pump in cases where it is necessary or with a simple rotation of the pump cover, the internal bypass valve can be used as an external bypass valve with the use of a return line back

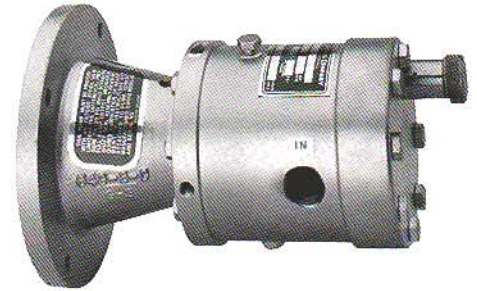


E-series for internal or back to tank bypass

to the supply tank (see figure 3). The bypass valve cartridge is set to crack at 90 psid. Designed for direct motor mount to 56C-frame electric motor or to internal combustion engine for portable transfer applications. Replacement parts for E-series are interchangeable with D-series. Foot mount available.

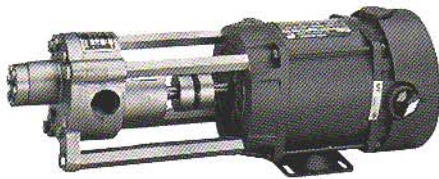
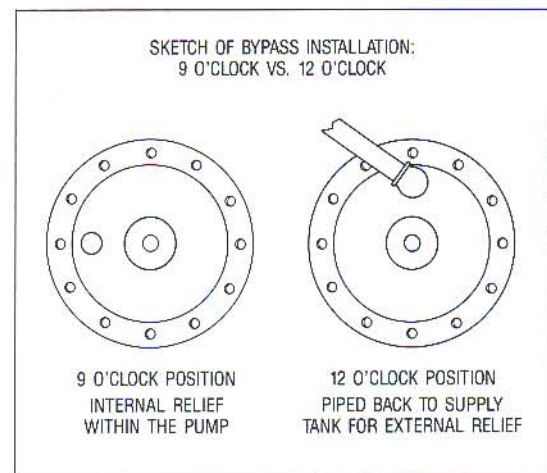
### MC- AND GC-SERIES

Each MC- or GC-series pump utilizes the balanced 3-gear set unique to Smith pumps. The internal porting and superior construction enable these pumps to handle continuous duty service applications and pump against high differential pressure. The MC-series features an adjustable internal bypass valve. The GC-series features a permanently set internal bypass valve at 90 psid. The GC-series pump can be used in conjunction with an internal combustion engine for portable transfer applications. Both MC- and GC-series are designed for direct motor mount to 56C-frame electric motor. Foot mount available.

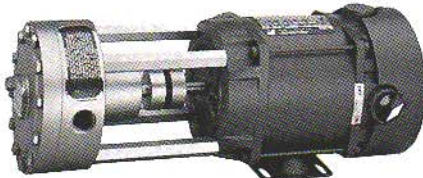


MC- and GC-series for toughest installations or continuous duty service

Figure 3: E-series bypass alternatives



D-series: Direct motor mount DW-1Z, DW-HZ



E-series: Direct motor mount EG-1Z, EC-HZ



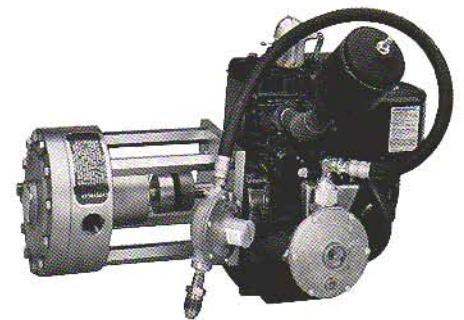
MC- and GC-series: Direct motor mount



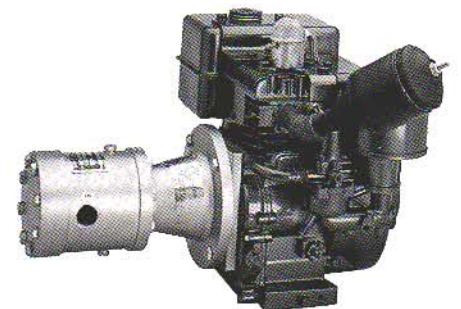
E-series: Foot mount



MC- and GC-series:  
Foot mount



E-series mounted to gasoline or LP-gas engine



GC-series mounted to gasoline or LP-gas engine

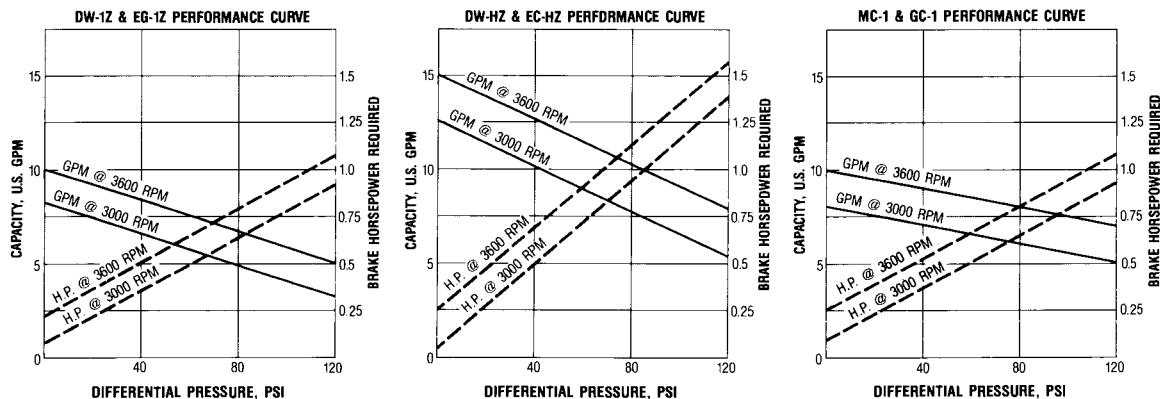
# TANK EVACUATION

## PUMP SELECTION

PUMPS ONLY		AVERAGE DELIVERY RATE IN GALLONS PER MINUTE <sup>1</sup>		INTERNAL BYPASS RELIEF VALVE SETTING	MAXIMUM DIFFERENTIAL PRESSURE <sup>2</sup>	INLET/OUTLET SIZE: FEMALE THREADED	MOTOR <sup>3</sup>	PUMP ROTATION AS LOOKING AT PUMP SHAFT-END
MODEL	MOTOR SPEED (RPM)	40 PSID, 3600 RPM	75 PSID, 3600 RPM	PSI	PSI	INCHES	H.P.	
DW-1Z, EG-1Z	3600	8½	7	90	125	¾	1	CW
DW-HZ, EC-HZ	3600	13½	12	90	125	1	1½	CW
MC-1, GC-1	3600	9	8	MC-1: ADJUSTABLE GC-1: 90	125	¾	1	MC-1: CCW GC-1: CW

1. Rated capacities for DW-1Z, EG-1Z are 10 GPM. For DW-HZ, EC-HZ: 15 GPM. For MC-1, GC-1: 10 GPM. These are capacities at 0 PSID and 3600 RPM. Capacities may vary depending on temperature or line restrictions. 2. Maximum differential pressure limited to 125 PSID as outlined in U.L.-51 standard. 3. If used with engine, 3 H.P. required.

## PERFORMANCE CURVES<sup>4</sup>

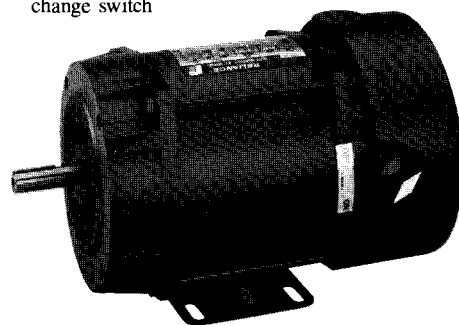


4. Performance curves based on delivery rates of propane at 75°F. Delivery rates will be reduced by approximately 15% at temperatures approaching 32°F. For exact capacity and horsepower, use empirical formulae provided under engineering data on the last page.

## ADDITIONAL DATA

MODEL	LENGTH OF TIME TO FILL LP-GAS CYLINDERS		WEIGHT PUMP ONLY	WEIGHT WITH MOTOR
	20 LB.	100 LB.	LBS.	LBS.
DW-1Z, EG-1Z	LESS THAN 1 MINUTE	3-4 MINUTES	22, 25	60, 77
DW-HZ, EC-HZ	LESS THAN 1 MINUTE	3-4 MINUTES	22, 25	67, 92
MC-1, GC-1	LESS THAN 1 MINUTE	3-4 MINUTES	20, 20	73, 73

Motor with built-in on/off switch and voltage change switch



All Smith small capacity pumps can be direct coupled to 56-C frame electric motors. Standard motors supplied by Smith are explosion-proof, single or three phase, 115/230 volt or 230/460 volt, with thermal overload protection. Motors are available with or without a built-in on/off switch and voltage changer switch and come standard with motor foot for pump/motor combination mounting.

## DIRECTION OF ROTATION

