

## EHPR08-33

### Proportional Reducing/Relieving Valve, 207 BAR Rated

A screw-in, cartridge-style, direct acting, spool-type reducing/relieving valve, which can be infinitely adjusted across a prescribed range using a variable electric input. Pressure output is proportional to DC current input. This valve is intended for use as a pressure control device in demanding applications.



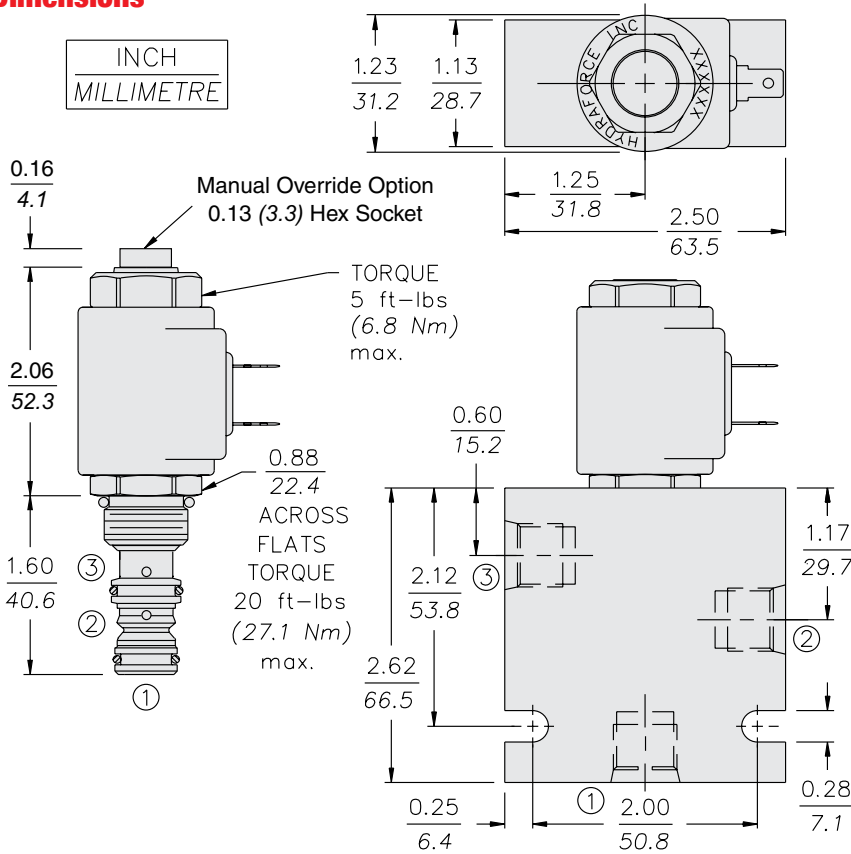
HYDRAFORCE

Voltage	Hydraforce code	Article no.	Price £	Price €
<b>CARTRIDGE VERSION</b>				
24V DC	EPHR08-33-0-N-24DG	<b>EPHR0833C24</b>	<b>£140.80</b>	<b>€168.90</b>
<b>INLINE WITH BODY 3/8" BSP</b>				
24V DC	EPHR08-33-3B-N-24DG	<b>EPHR08333B24</b>	<b>£175.00</b>	<b>€218.50</b>
<b>INLINE WITH BODY 1/2" BSP</b>				
24V DC	EPHR08-33-4B-N-24DG	<b>EPHR08334B24</b>	<b>£175.00</b>	<b>€218.50</b>

with nitril seals  
**WITH 'G' DIN CONNECTOR PLUG**

On request - Viton Seals - Screen filter protection - Manual Override  
On request - For DC coils with spade or push on connections

### Dimensions



### Materials

#### Cartridge:

Weight: 0.25 kg. (0.55 lbs.)  
Steel with hardened work surfaces.  
Zinc-plated exposed surfaces.  
Buna N O-rings standard.

#### Standard Ported Body:

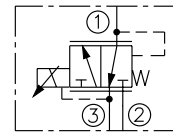
Weight: 0.16 kg. (0.35 lbs.)  
Anodized highstrength 6061 T6 aluminum alloy, rated to 207 bar (3000 psi).  
Ductile iron bodies available; dimensions may differ.

#### EHPR Series Coil:

D-Coil: Weight: 0.11 kg. (0.25 lbs.)  
Unitized, thermoplastic encapsulated.

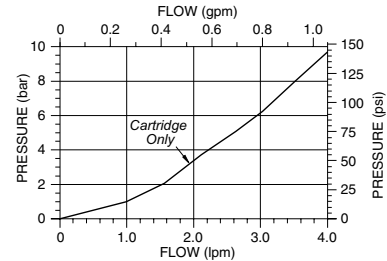
### Symbols

#### USASI/ISO:

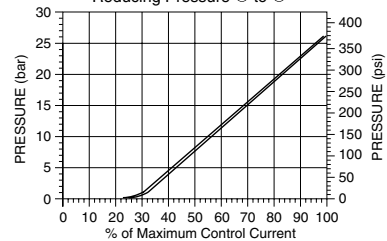


### Performance

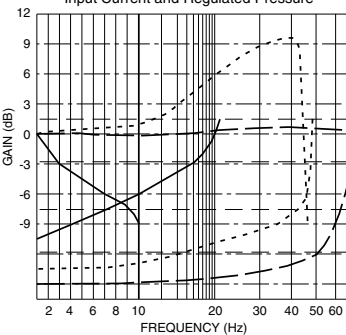
Pressure Drop vs. Flow Characteristic  
For Flow ① to ③ with Coil De-energized



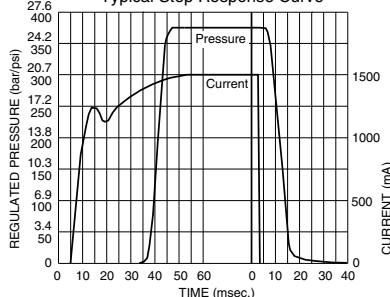
Relief Pressure vs. Current (DC) Characteristic  
Reducing Pressure ② to ①



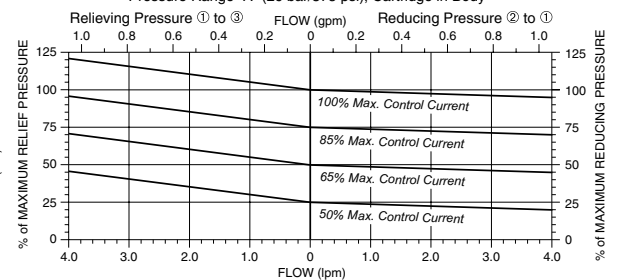
Typical Frequency Response Curves  
Input Current and Regulated Pressure



Typical Step Response Curve



Typical Relieving/Reducing Pressure vs. Flow Characteristic  
Typical Relieving Pressure at Various %'s of Maximum Control Current  
Pressure Range "A" (26 bar/375 psi); Cartridge in Body



Signal 25% ±10% ———— Inlet: 35 bar (500 psi).  
Signal 50% ±50% - - - - - 4 lpm (1 gpm).  
Signal 85% ±10% - · - · - - Regulated: Blocked.  
Input Signal: Sinusoidal Tank: <0.15 bar (2 psi)