

HY-EHPR08-33 (Proportional Pressure Reducing/ Relief Valve)

Introduction



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

Operation:
The HY-EHPR08-33 free flow from ① to ③ when no current is applied to the coil. When the coil is energized, ② is connected to ①. Increasing current to the coil will increase the control (reduced) pressure proportional. If pressure at ① exceeds the setting induced by the coil, pressure from ① relieved to ③.

Note: Back pressure on ③ becomes additive to the pressure setting at a 1:1 ratio.

Technical specification (For application beyond these parameters, please contact with us)

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Model	HY-EHPR08-33
Installation position	Unlimited
Storage temperature (°C)	-20°C To +55°C
Ambient temperature (°C)	-20°C To +50°C

Hydraulic specification

Max. inlet pressure	207 Bar (3000 psi)
Rated flow	4.0 Lpm (1.05 gpm), DP=6 bar (87 psi), cartridge only, ① to ③, coil de-energized;
Flow path	Free flow: ① to ③ coil de-energized; Reducing: ② to ① coil energized; Relieving: ① to ③ coil energized. ① is not plumbed externally
Hydraulic fluid	Mineral oil, phosphate-ester
Fluids	7.4~420 cSt
Temperature	-40°C~+120°C, With NBR seals
Cavity	HY08-3, see page H.1.2

Electrical specification

Max. control current	12 VDC coils: 1.2A 24 VDC coils: 0.6A For other voltages, please consult factory
Reducing/relieving pressure range (from zero to max. control current)	0-26 Bar (0 to 375 psi)
Hysteresis	Less than 3%
Dither frequency required	200 Hz
Step response	T on <30 ms; T off <12 ms

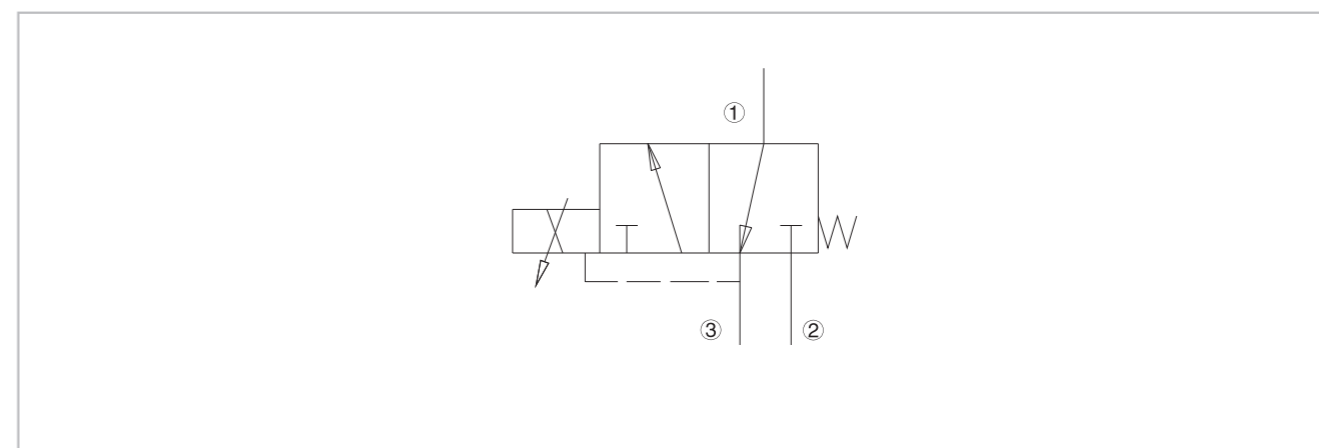
HY-EHPR08-33 (Proportional Pressure Reducing/ Relief Valve)

Model instruction

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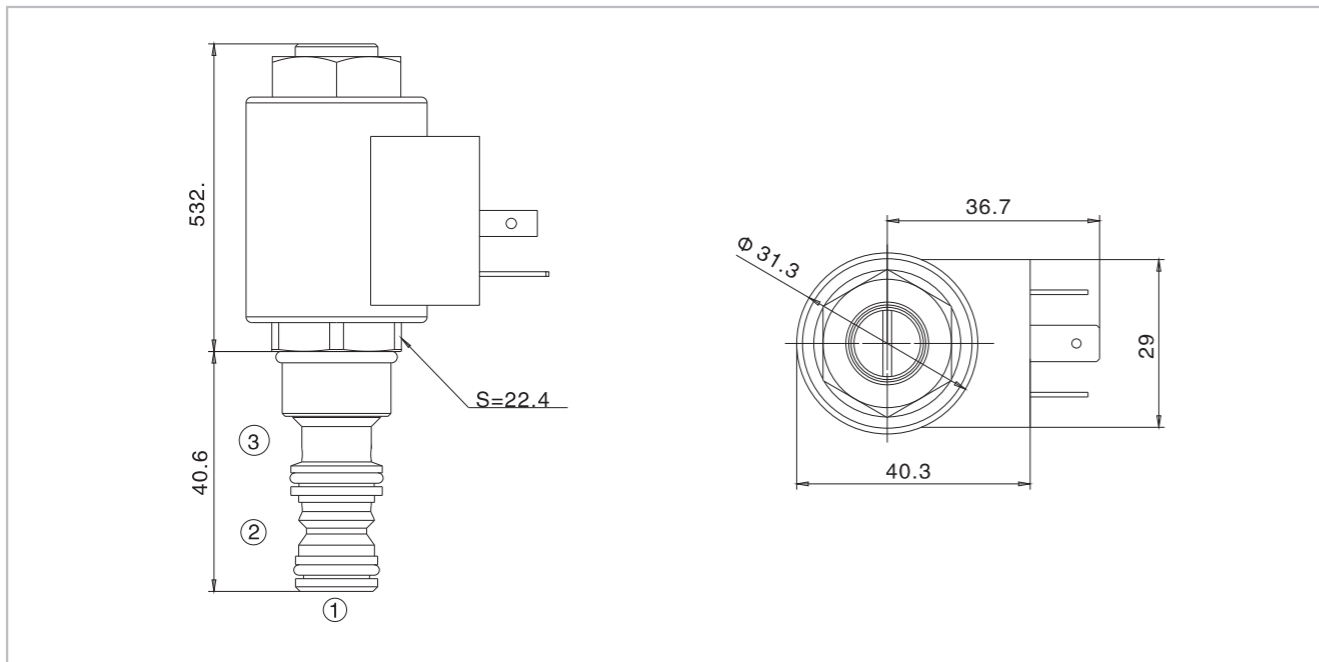
Proportional pressure Reducing/ relief valve	Coil termination DG DIN 43650 ER Deutsch DT04-2P
Option Vent screw blank Manual override M	Voltage 0 Less coil 12 12 VDC (1.2 amps max.) 24 24 VDC (0.6 amps max.)
Porting 0 Cartridge only 6T SAE6 8T SAE8 3B 3/8 in. BSP* 4B 1/2 in. BSP*	Seals N NBR Seals V FPM Seals

Code symbol



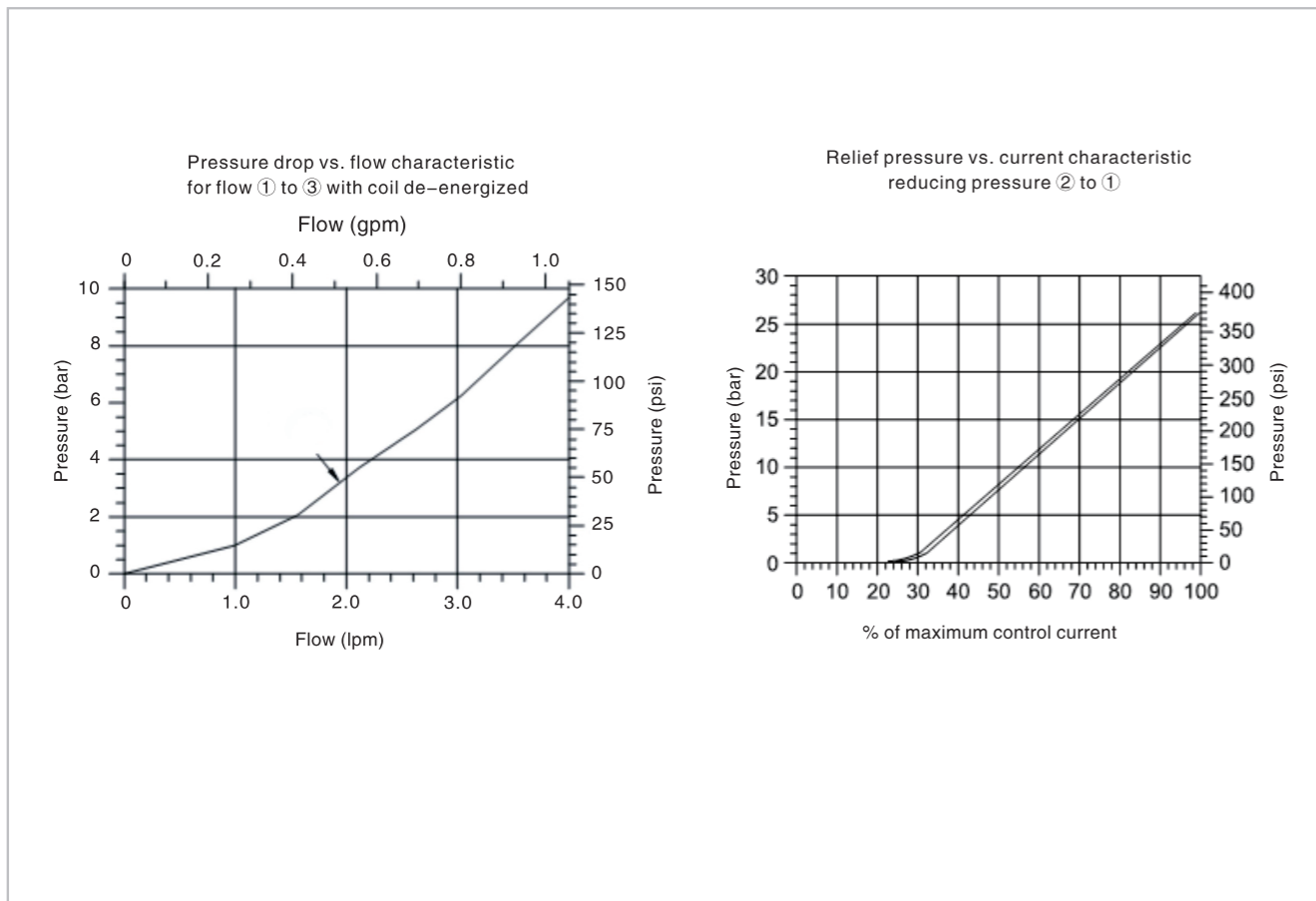
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External dimensions



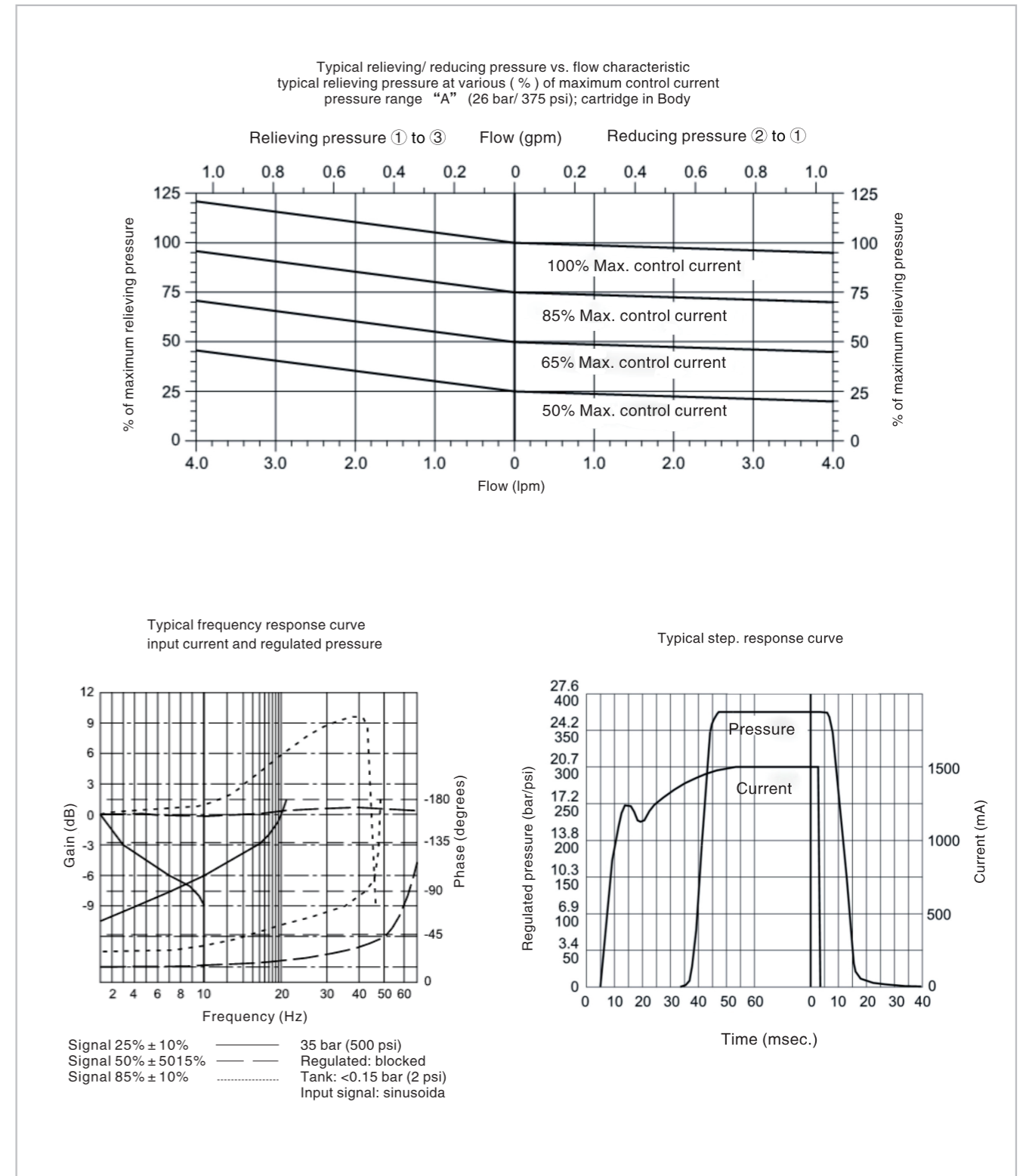
A.11.3

Specification performance



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Specification performance



A.11.4