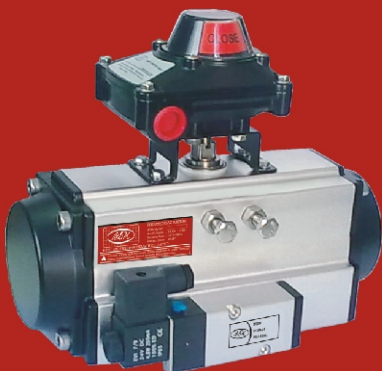




Work with the Experts

[SOLENOID VALVE]



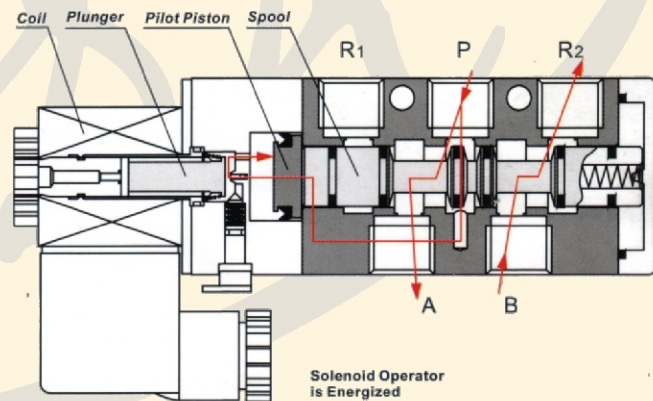
INTRODUCTION

BSV series plate type NAMUR solenoid valve is available in both 3/2 way (Single Acting) and 5/2 way (Double Acting) versions with IP65 enclosure. The integral slot throttle structure design and high precision finishing technique for valve hole allow for positive shifting of air flow and constant cleaning of the spool with each shift, enabling the valve to stroke millions of trouble-free cycles. The BSV series solenoid valve is intended for use on all Valves with Quarter Turn Pneumatic Actuator that incorporate the standard of NAMUR mounting pad (24mm x 32mm rectangle i.e, 1/4" connection).

The operating principle is as follows.

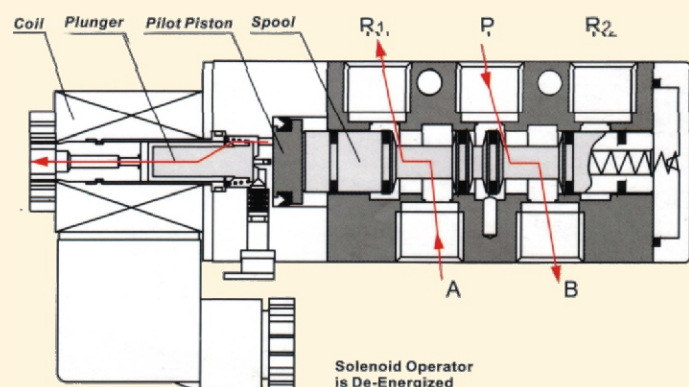
ENERGIZED

When the solenoid operator is energized, the solenoid coil creates a magnetic field surrounding the plunger assembly and plunger. The plunger is lifted off its seat by this magnetic force and supply air provides an internal pilot pressure that is directed to the pilot piston that shifts the spool and compresses the main spring. This shifting directs the flow of supply air from inlet port P to cylinder port A while cylinder port B is connected to exhaust port R2.

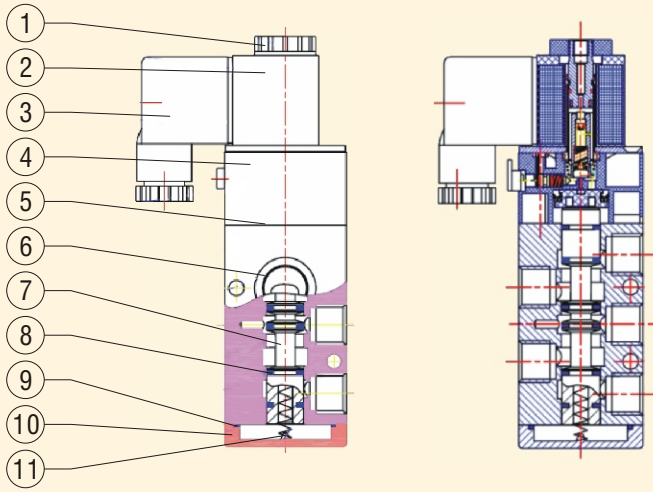


DE-ENERGIZED

When the solenoid coil is de-energized, a spring on the plunger will return the plunger to its seat, blocking internal pilot air, and open a vent port. This vent port will allow the air on the spool's pilot piston to escape, and the main spring will return the spool to its normal position. In this position, the spool directs flow of supply air from inlet port P to cylinder port B while cylinder port A is connected to exhaust port R1.

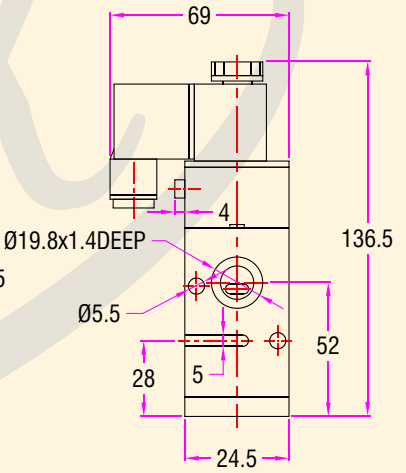
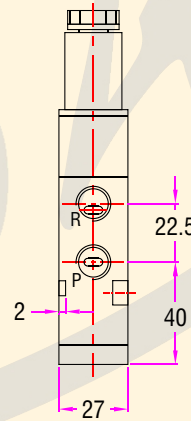
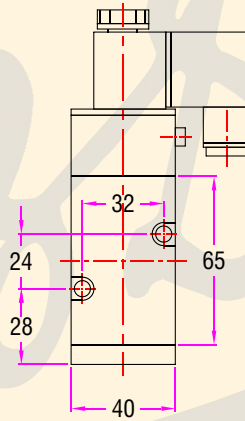
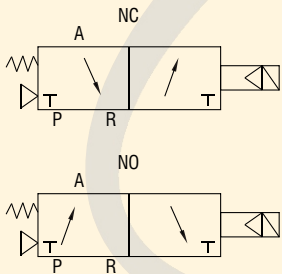


PARTS AND MATERIALS



NO.	PART NAME	MATERIAL	QTY
01	NUT	PLASTIC	01
02	COIL	-	01
03	JUNCTION BOX	PLASTIC	01
04	PLUNGER	-	01
05	VALVE BODY	ALUMINUM ALLOY	01
06	O-RING	NBR	02
07	SPOOL	ALUMINUM ALLOY	01
08	FLAT RING	NBR	06
09	RHOMBUS RING	NBR	01
10	COVER	ALUMINUM ALLOY	01
11	RETURN SPRING	SS	01

3/2 WAY DIRECT ACTING, NAMUR SOLENOID VALVE - BSV 231 (1/4" CONNECTION)



5/2 WAY DOUBLE ACTING, NAMUR SOLENOID VALVE - BSV 251 (1/4" CONNECTION)

