



ESOV Series | Swing Check Emergency Shut-off for Gas, Liquid, or Vapor



Assured Automation's ESOV series ANSI flanged swing-check valves with fusible links are designed to provide a simple yet effective method of closing in an emergency or hazardous situation.

The valves are designed with an external spring load and held in the open position with the fire-sensitive fusible link. The valve will automatically close when the link melts due to fire or high temperatures. The external lever rotates the hinge pin which drives the disc into the closed position, stopping the flow of the liquid, gas or vapor.

FEATURES

- Local and/or remote actuation
- Fire-Safe fusible link
- Economical solution for required safety
- Can be used in horizontal and vertical service
- All valves are factory tested to API 598
- Back pressure ensures a tight seal between the disc and seat
- Once closed, the valve can ONLY be reset manually as a safety feature

TYPICAL APPLICATIONS

- Refineries
- Petrochemical
- Off-shore oil rigs
- Chemical process equipment
- Water and Waste applications
- · Superheated steam lines on ships

SIZES & END CONNECTIONS

150# ANSI Raised Face Flanges: 2" to 16" 300# ANSI Raised Face Flanges: 2" to 16"

PRESSURE RATING

150# ANSI Raised Face Flanges: 275 PSIG 300# ANSI Raised Face Flanges: 740 PSIG

TEMPERATURE RANGE

-20°F to 475°F

MATERIALS

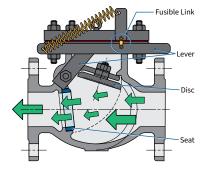
Body: Carbon steel or Stainless Steel Disc: Carbon steel or Stainless Steel

Hanger Arm: Carbon steel or Stainless Steel

Seat: API 598 Trim 8 or 12 Cover Seal: Graphite

see page 2 for complete material details

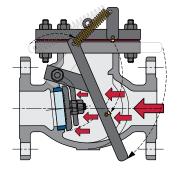
OPERATION



Dual Fusible Link

Normal Operation

Disc is held up and away from the seat by the lever and fusible link



Emergency Shut-off

Fusible link melts and the spring pulls the lever which moves the disc into the closed position against the seat

FLOW CAPACITIES

Size	c _{v (gpm)}
2"	120
3″	285
4"	520
6"	1,245
8″	2,285
10"	3,570
12"	5,340
14"	6,500
16"	8,620





ESOV



Swing Check Emergency Shut-off for Gas, Liquid & Vapor

BPSL

Basic

Spring Assisted Closure with Fusible Link Only



CPSL

Pneumatic Release

Basic PLUS Pneumatic Cylinder for Trigger



MPSL

Electric Release

Basic PLUS Electro-Magnetic Trigger



ORDERING INFORMATION

ESOV - 0200 - BPSL - 150 - C - 08 - 165F

Size

Trigger Type Flange Class Body Material Trim Material Trim Material

Size:-

0200 =	2"	1000 = 10"
0300 =	3"	1200 = 12"
0400 =	4"	1400 = 14"
0600 =	6"	1600 = 16"
0800 =	8"	*Call for Larger Size:

Type & Remote Triggering:

BPSL = Basic Spring Assisted Closure with Fusible Link Trigger

CPSL = Spring Assist Closure w/ Fusible Link Trigger PLUS Pneumatic Cylinder Remote Trigger
MPSL = Spring Assist Closure w/ Fusible Link Trigger PLUS Electro-magnetic Remote Trigger

ANSI Raised Face Flange Class (to ANSI B16.5):

150# = ANSI Class 150# **300**# = ANSI Class 300#

Body Material:-

C = Carbon Steel (ASTM A216 Gr WCB)

S = Stainless Steel

Trim (Seat Ring) Material:-

08 = API Trim 8

12 = API Trim 12

Trigger Temperature of Fusible Links:-

135F = 135°F

165F = 165°F (standard)

212F = 212° F **280F** = 280° F

360F = 360°F