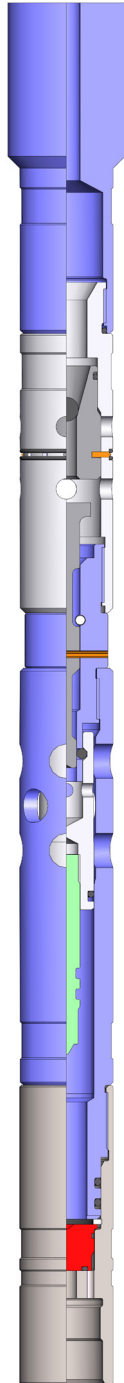


CT Safety Impact Firing Head



DESCRIPTION

The Safety Impact Firing Head is designed to run perforating guns, jet cutters or severing tools on coil tubing. The system is actuated by, dropping a ball and pressuring up the tubing. Once the ball is seated, a predetermined pressure is applied to shear the precision shear pins. After shearing, the firing pin strikes the detonator causing the gun to fire.

FEATURES AND BENEFITS

- Electrical currents, natural or man-made cannot detonate the Safety Impact Firing Head.
- Used to initiate Owen Small Scalloped Gun Systems (1-11/16", 2-1/8", 2-1/2"), Tubing Cutters and Severing Tools.
- Ideal for heavy mud and deviated wells.
- High Pressure Wells.
- Requires pinning to 2000 psi (13.8 MPa) to pass API RP-67 drop testing.

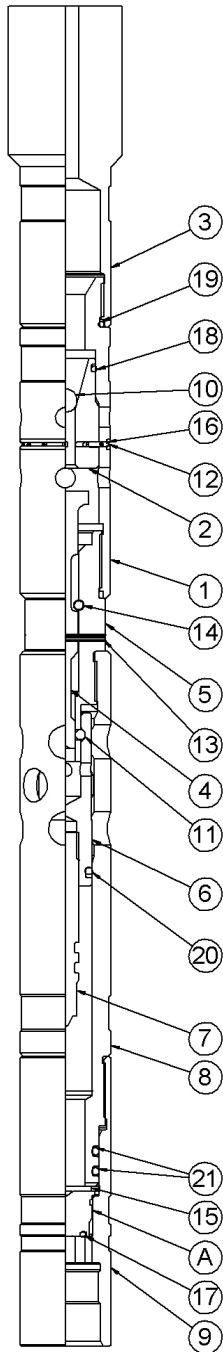
SPECIFICATIONS

TC-031-1688-000		
O.D.	1.69 IN	43 MM
Max. Temperature ¹	250°F	121°C
Max. Hydrostatic (L.P.)	8,000 psi	55.4 Mpa
Min. Hydrostatic (L.P.)	300 psi	2.0 Mpa
Max. Tensile Strength	33,000 psi	14 680 daN
Flow Area Before Firing	0.196 in ²	1.265 cm ²
Flow Area After Firing	0.442 in ²	2.852 cm ²

¹The maximum temperature can be increased to 450°F (230°C) by substituting the 90 durometer Nitrile O-Ring with 90 durometer Viton O-Rings. Refer to the Time vs Temperature Chart for Explosives to confirm any explosives requirements.

Note: Retainer caps, for special applications, are available with a 1" or 1-1/2" AMT Box Thread.

Safety Impact Firing Head (LP) BOM and Schematic



Low Pressure
Assembly

ITEM	PART NUMBER	QTY.	DESCRIPTION
1	TC-031-0002-000	1	Piston Housing
2	TC-031-0003-000	1	Ball Drop Piston
3	TC-031-0008-000	1	Retainer Cap, Special
4	TC-031-0004-000	1	Release Rod
5	TC-031-0005-000	1	Release Rod Body
6	TC-012-0004-000	1	Ball Retainer Piston (LP)
7*	TC-012-0005-000	1	Firing Pin, CP Style Detonator
8	TC-012-0007-000	1	Body, HD (LP)
9	TC-040-0010-400	1	Detonator Body, No Compression
10*	ST-040-0437-000	1	7/16" Drop Ball
11*	ST-040-0188-000	4	Retaining Balls, 3/16"
12*	SF-010-0100-038	12	Shear Pins, Owen
13*	PF-120-0125-150H	1	Spriol® Coiled Pin, HD
14*	SF-010-0187-125	1	Roll Pin
15*	HSC-0100-048E	1	Compression Gasket
16*	OOO-N569-028	2	O-Ring, N90
17*	OOO-N569-113	1	O-Ring, N90
18*	OOO-N569-119	1	O-Ring, N90
19*	OOO-N569-124	1	O-Ring, N90
20*	OOO-N569-210	1	O-Ring, N90
21*	OOO-N569-214	2	O-Ring, N90
A	REFERENCE	1	Percussion Detonator
--	TC-031-1688-099P	--	Re-Dress Kit - CT Safety Impact FH (LP) (LT)
--	TC-031-1688-399P	--	Re-Dress kit - CT Safety Impact FH (LP) (HT)

* Denotes parts in redress kits.

High Temperature Kits contain Viton 90 Durometer O-rings.