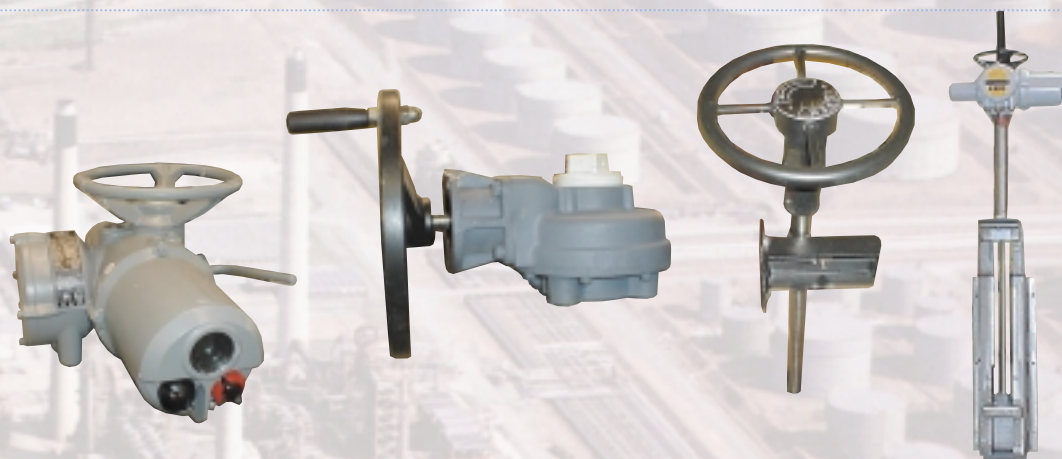
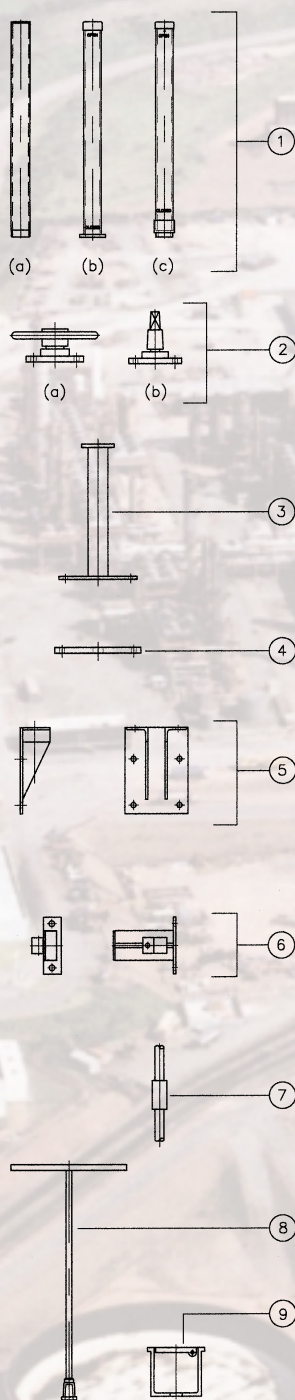


Series OG1 and OG2

OPERATING EQUIPMENT

Operating equipment accessories for rising stem applications



The series OG1 & OG2 provides a range of operating equipment accessories for use in rising stem and non-rising applications for use with penstocks.

Options and Construction Materials

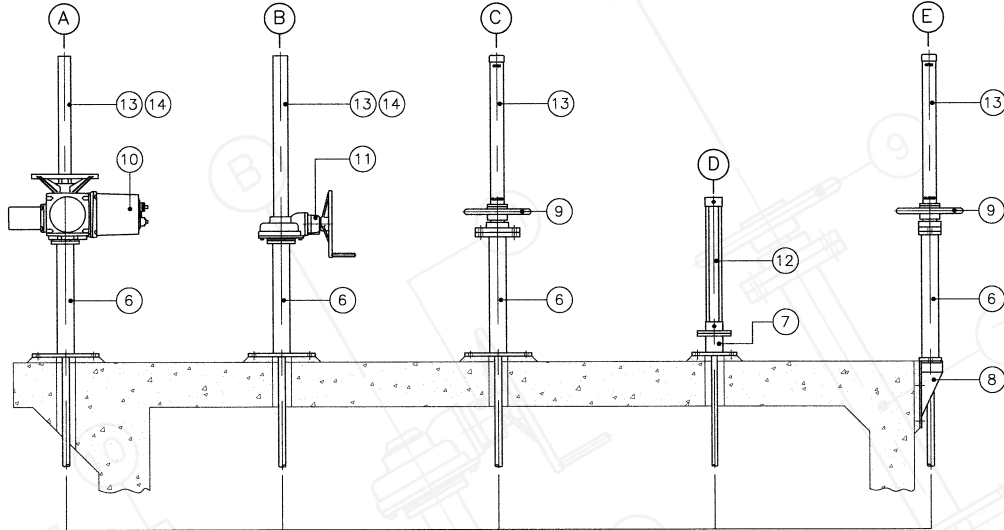
ITEM	PRODUCT	OPTIONS	MATERIAL
1 (a)	Protection	Non-indicating	Mild Steel, BS 4360 Gr 43A
1 (b)	Tube	Indicating	Clear polycarbonate
1 (c)			with UPVC adapters
2 (a)	Handwheel Assembly	Direct on penstock frame or remote operation	Mild Steel, BS 4360 Gr 43A Stainless Steel, BS 970 Gr 304 Stainless Steel, BS 970 Gr 316
2 (b)	Square Cap Assembly	Direct on penstock frame or remote operation	Mild Steel, BS 4360 Gr 43A Cast Iron Grade 220 to BS1452 Stainless Steel, BS 970 Gr 304 Stainless Steel, BS 970 Gr 316
3	Pillar	Direct on penstock frame or remote operation	Mild Steel, BS 4360 Gr 43A Stainless Steel, BS 970 Gr 304 Stainless Steel, BS 970 Gr 316
4	Guide Plate		HMWP
5	Coping Bracket (Footplate)		Mild Steel, BS 4360 Gr 43A Stainless Steel, BS 970 Gr 304 Stainless Steel, BS 970 Gr 316
6	Adjustable Guide Bracket		Mild Steel, BS 4360 Gr 43A Stainless Steel, BS 970 Gr 304 Stainless Steel, BS 970 Gr 316
7	Couplings	Muff Coupling	Mild Steel, BS 4360 Gr 43A Stainless Steel, BS 970 Gr 316
8	Tee Key		Mild Steel, BS 4360 Gr 43A
9	Surface Box		Cast Iron, BS1452 Gr 220

Specifications

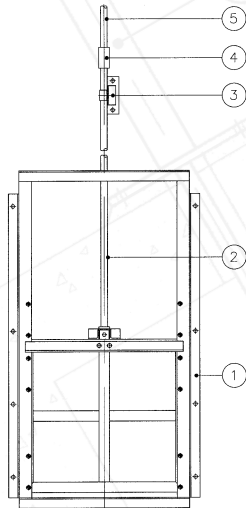
OG1 OPERATING EQUIPMENT

Remote Operation for Rising Stem Applications

The series OG1 provides an extensive range of operating equipment for rising stem applications for use with penstocks and a selection of valves. The operating equipment illustrates typical applications and can be configured to satisfy specific requirements.



Option	Description
A	Electric Actuator on with clear polycarbonate or steel protection tube on a floor pillar
B	Bevel Gearbox with clear polycarbonate or steel protection tube on a floor pillar
C	Handwheel and thrust assembly with clear polycarbonate protection tube on a floor pillar
D	Hydraulic or pneumatic linear actuator on a short floor stool
E	Handwheel and thrust assembly with clear polycarbonate protection tube on a floor pillar



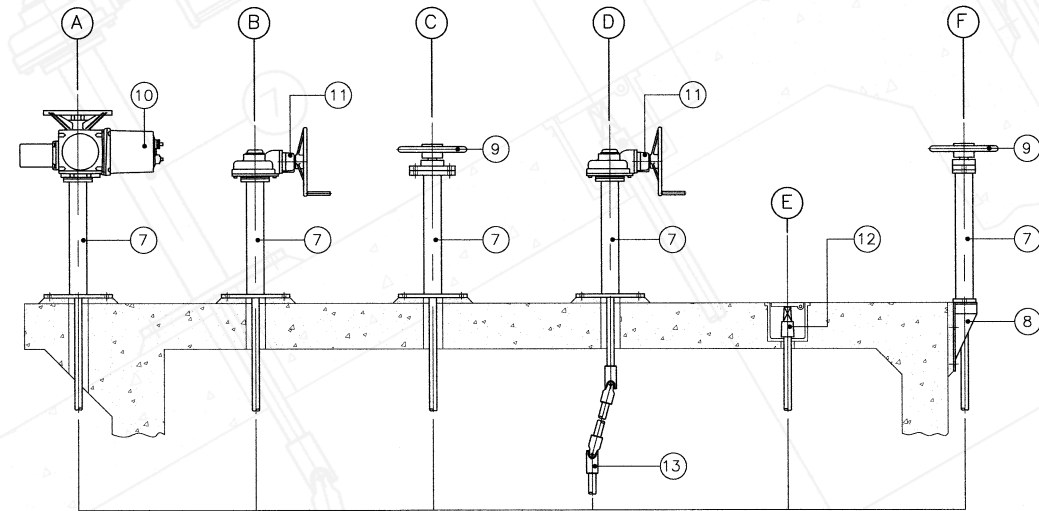
Item	Description
1	Penstock Unit
2	Lower rising Stem
3	Adjustable Guide Bracket
4	Muff Coupling
5	Upper rising Stem
6	Pillar
7	Short Floor Stool
8	Coping Bracket (Footplate)
9	Manual Thrust Assembly
10	Electric Actuator
11	Bevel Gearbox
12	Linear Actuator
13	Polycarbonate Protection Tube
14	Steel Protection Tube

Specifications

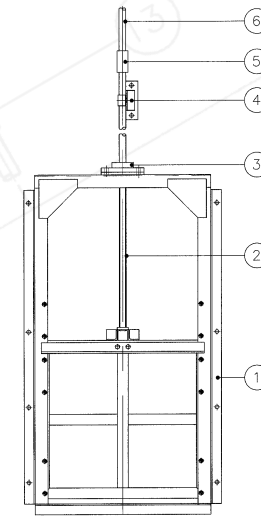
OG2 OPERATING EQUIPMENT

Remote Operation for Non-Rising Stem Applications

The series OG2 provides an extensive range of operating equipment for non-rising stem applications for use with penstocks and a wide selection of valves. The operating equipment illustrates typical applications and can be configured to satisfy specific requirements.



Option	Description
A	Electric Actuator on a floor pillar
B	Bevel Gearbox on a floor pillar
C	Handwheel assembly on a floor pillar
D	Bevel Gearbox on a floor pillar with universal couplings
E	Adapter square for tee key operation in surface box
F	Handwheel assembly on a coping bracket



Item	Description
1	Penstock Unit
2	Non-rising Stem
3	Thrust Assembly
4	Adjustable Guide Bracket
5	Muff Coupling
6	Extension Stem
7	Pillar
8	Coping Bracket (Footplate)
9	Handwheel Assembly
10	Electric Actuator
11	Bevel Gearbox
12	Adapter Square
13	Universal Coupling