



IRON STRONG

DUCTILE IRON PIPE
**SEISMIC FLEX
 COUPLING**

4" – 36"



For seismic events, including liquefaction, subsidence, and permanent ground deformation zones, the McWane Ductile Seismic Flex Coupling™ (SFC) provides state-of-the-art resilience by significantly increasing joint deflection and axial expansion/contraction ranges above industry averages. The SFC will be utilized with the TR Flex® restraint joint to provide Earthquake Resistant Ductile Iron Pipe (ERDIP) resilience. The TR Flex restrained joint has a proven track record in seismically active areas in North America for over 40 years.

- The SFC will provide 10.66" of total axial expansion/contraction range ($\pm 5.33"$), which is up to three times what our competitors offer.
- McWane Ductile's nominal pipe length is 18', providing 11.1% more joint deflection versus 20" pipe.

PIPE DIAMETER (INCHES)	DEFLECTION CAPACITY (DEGREES)	EXPANSION / CONTRACTION RANGE (MID-SETTING)
4" – 12"	11.5°	$\pm 5.33"$
14" – 16"	8°	$\pm 5.33"$
18"	7.5°	$\pm 5.33"$
20"	6.5°	$\pm 5.33"$
24"	6°	$\pm 5.33"$
30"	5°	$\pm 5.33"$
36"	4.5°	$\pm 5.33"$

- The SFC will be shipped fully assembled in the collapsed position. The coupling can be easily extended to the mid or fully extended position in the field to fit the application requirements.
- The SFC and TR Flex Ductile iron pipe is manufactured in the USA in accordance with ANSI/AWWA C151/A21.51 and C153/A21.53 (latest revisions), meeting the requirements for AIS and Buy American projects.
- McWane Ductile's SFC components were thoroughly tested for performance capability by Cornell University's Seismic Lab located in the School of Civil and Environmental Engineering (final report available).
- McWane Ductile can supply SFC components with various exterior coatings, including standard seal coat, zinc with seal coat, Tnemec paint, or Fusion Bonded Epoxy (FBE).
- The TR Flex joint is a proven and reliable flexible restraint joint that is easily assembled in the field compared to other manufacturers' proprietary designs.
- During Installation, V-Bio® Enhanced Polyethylene Encasement is recommended to reduce pipe-soil friction over 30%.
- McWane Ductile's SFC is intended for use in buried applications only; it is not recommended for above-ground installation.

ISO 16134 Performance Categories:

EXPANSION / CONTRACTION	SLIP OUT RESISTANCE	JOINT DEFLECTION
S-1 ($\pm 1\%$ of L or more)	B (1.5 d kN to 3 d kN)	M-2 ($\pm 7.5^\circ$ to $< 15^\circ$)
L = the component length d = the nominal diameter of the pipe, in millimeters (mm)		



McWane Ductile's ERDIP components and TR Flex pipe



POCKET ENGINEER

Available for iOS + Android
or online at pe.mcwane.com

CONNECT WITH US ON



mcwaneductile.com

NEW JERSEY

183 Sitgreaves St.
Phillipsburg, NJ 08865
908-454-1161

OHIO

2266 S. 6th St.
Coshocton, OH 43812
740-622-6651

UTAH

1401 E. 2000 South
Provo, UT 84606
801-373-6910



canadapipe.com

CANADA

Suite 1, 55 Frid Street
Hamilton, ON, Canada,
L8P 4M3
905-547-3251

Rev. June 2022