PRESS-SEAL GASKET CORPORATION
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Performance Evaluation
CAST-A-SEAL® 603 (Single Clamp)

Press-Seal Gasket Corporation
Fort Wayne, Indiana

Laboratory performance tests were conducted on 13 December 2001 on the 12-inch CAST-A-SEAL® 603 flexible connector product designed and produced by Press-Seal Gasket Corporation, 6932 Gettysburg Parkway, Fort Wayne, Indiana, 46804. This CAST-A-SEAL® 603 product is intended to provide a watertight seal to accommodate any diameter pipe in a straight structure wall. The product is extruded and can, therefore, be customized for any size pipe in a precast or cast-in-place application.

The CAST-A-SEAL® 603 testing was conducted at the Press-Seal Gasket Corporation facility to meet 13-psi pressure requirements, which currently exceed the 10-psi requirements specified in ASTM C923, "Standard Specification for Resilient Connectors Between Reinforced Concrete Manhole Structures, Pipes, and Laterals."

Test specimens were randomly selected. The CAST-A-SEAL® 603 product was monolithically cast into a precast reinforced flat concrete headwall. This wall was a 4-inch thick, 28-inch by 28-inch precast headwall. The 12-inch (I.D.) CAST-A-SEAL® 603 was simply cast in as a folded boot. A solid wall PVC pipe with the banded (one stainless steel clamp) attached the pipe to the CAST-A-SEAL® 603.

The test specimens were isolated by placing the headwall unit into the Press-Seal Gasket pressure testing apparatus. A hydrostatic head was applied internally to the pipe and flexible connector and restrained by a pipe plug on the protruding end of pipe and the test frame plate at the inside face of the headwall.

The test was a straight alignment test to a test pressure of 13-psi and held with no loss of pressure or leakage for 10-minutes. The deflection test for the pipe to manhole alignment to 7 degrees was not conducted as it was already conducted on the original 31 July 2001 test. The main intent of this

test was to confirm an equal performance of the system with only one clamp and to a higher test pressure.

The load deflection testing component of ASTM C 923 was not germane for this testing, as an axial movement in excess of 1-inch would result during the load deflection testing, negating the test requirements per Section 7.2.4.

The pressure gauge used was a calibrated Maarsh, Control #613, range 0 – 15 psig, hose mounted connection.

Submitted by:

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