

Field Inspection Manual	Part: 4-STP	Section: 34	Page: 1 of 1
Volumetric Measuring Devices	Issued: 2004-03-01	Revision Number: Original	

SPECIALISED TEST PROCEDURES - MANIFOLD BACK FLOW TEST (CALIBRATED TANKS)

APPLICATION

This procedure is used when performing accuracy tests on any fixed, mobile or vehicle mounted tanks that are connected to a common manifold or piping.

PURPOSE

A battery of calibrated tanks may be equipped with a manifold provided that a mechanism is installed to prevent intermixing or diversion of products (flow from one compartment to another). This procedure tests the operation of the check-valves in the manifold and is performed on all compartments in the tank.

LEGISLATIVE REFERENCES: R.300.

PROCEDURE

Make sure that the emergency and manifold valves of the compartment under test are closed and that this compartment is full of product, calibrated and sealed.

Open all the valves for the empty compartments and, if applicable, the split manifold valve and allow the piping to drain completely.

After draining, close the delivery valve(s) (main shut off valve(s)).

Open the emergency and manifold valves for the compartment under test (at this time the valves for all empty compartments and the first one should be open).

Check for leakage into the empty compartments. No product should appear in the empty compartments within: 5 minutes for a single manifold tank, or 2.5 minutes for a double manifold tank.

The above sequence tests all the empty compartments. Following the calibration of these compartments, one should be kept full for checking those that contained product during the first test.

Repeat the above procedure until all compartments have been tested.

NOTE: The sequence for this test is not significant as long as every compartment is tested.

INTERPRETATION OF RESULTS

No product should flow from one compartment or tank to another.

REVISION

Original document