

Internal Use Only

INTERNATIONAL ASSOCIATION OF PLUMBING AND MECHANICAL OFFICIALS

STANDARD FOR

WASTEHOLDING TANK FLUSHING SYSTEMS FOR RECREATIONAL VEHICLES

IAPMO TS 27-97^{e1}

1. PURPOSE

- 1.1** The purpose of this Standard is to establish an acceptable Standard for minimum health and safety protection for a flushing system to be installed within wasteholding tanks; to serve as a guide for producers, designers, manufacturers, installers, inspectors, and users; to promote understanding regarding materials, manufacture and installation; and to provide for identifying holding tank flushing systems installed within wasteholding tanks that conform to this Standard. The provisions of this Standard are not intended to prevent the use of any alternate material or method of construction, provided any such alternate is at least the equivalent of this Standard and has been approved.

2. SCOPE

- 2.1** This Standard covers the physical requirements and tests for materials, components, proper design and operation; and provisions for proper installation of the finished product, together with methods of marking and identification.

3. DESIGN AND CONSTRUCTION REQUIREMENTS

- 3.1** The flushing system components shall be of material not subject to corrosion.
- 3.2** The flushing system shall be designed to provide for a watertight seal to the wasteholding tank.
- 3.3** Each flushing system shall be equipped with a listed atmospheric vacuum breaker located a minimum of six inches (6) in. above the flood rim of the highest fixture connected to the wasteholding tank. A listed spring loaded check valve shall be installed horizontally immediately on the discharge side of the vacuum breaker.
- 3.4** The flushing system shall be self cleaning as to the waste materials in the tank.

4. GENERAL CONSTRUCTION AND OPERATING REQUIREMENTS

- 4.1** The inlet hole in the wasteholding tank for the flushing system shall be located no more than two inches from the top of the wasteholding tank, and the flushing system shall not extend below that point.
- 4.2** Piping and components shall conform or be equal to ASTM D 3309 with a minimum of one-half inch (1/2) in. IPS.

5. INSPECTION AND TEST METHOD

- 5.1** The following test shall be conducted to determine that the flushing system operates as designed:
- (a) After the flushing system is installed, mount tank level on a rack, per tank manufacturer's instructions for vehicle mounting, that will allow free movement in all directions. An eighteen (18) inch length of pipe shall be placed into the vent opening. All other openings shall be capped or plugged. The tanks shall then be filled with water to the top of the eighteen (18) inch stand pipe. After one (1) hour there shall be no leakage.
 - (b) A function test shall ensure that the flushing system does rinse ninety percent (90%) of a forty (40) gallon minimum size wasteholding tank at forty (40) psi pressure.
- 5.2** The testing shall be performed by a testing laboratory, which shall evaluate, record and provide a written report of the product's performance.

6. INSTRUCTIONS

- 6.1** Instructions covering proper usage and installation shall be attached to each system or component.
- 6.2** The instructions need not necessarily be permanent in nature, but shall be sufficiently durable and attached in a manner that they will reach the installer and user.
- 6.3** These instructions shall be examined by the testing agency for accuracy and compatibility with the results of the test from a technical stand point.

7. MARKING AND IDENTIFICATION

- 7.1** The fill inlet shall be legibly identified (i.e. Caution: Sewer Valve Must Be Open When Using This Inlet).