

Myth Buster

By Joseph P. Guzzo

Life is filled with unexplained phenomenon, myths passed on from generation to generation. Some people call them old wives tales, or folk lure. You can find these mysteries in all aspects of life. Our plumbing code is no different.

Many myths are transformed into working habits, when challenged there is usually no written word to back them up. This also includes some truly strange interpretations by Plumbers and Plumbing Inspectors. Following are just a few of these myths I have encountered.

Lead and oakum for the first three joints - According to section 10.08,2,G, Building Drain At Foundation Wall, #3 will state, *When cast iron soil pipe and fittings are used, the joining methods shall comply with section 10.07,2,c,1, and shall be installed as diagramed in figure #18.* This means these joints must be made with lead and oakum. Now I have corrected many plumbers on this section usually when they use no-hub pipe through the foundation. However for the plumbers that knew the pipe and fittings must be bell and spigot, I would have to say 90% of them only lead the first three joints. I was so fascinated with this myth that I questioned every plumber and asked where they learned that. Most would say that's just what they thought and no one ever corrected them. However a good majority of them told me they were taught it in school. One plumber actually went back to his notes from school and confirmed it. In order to bust this myth just check out figure #18 on page 236. Three diagrams are shown two below ground and one above ground. The first one shows seven (7) joints must be lead and oakum. The second one shows four (4) joints must be lead and oakum. And the third one shows four (4) joints must be lead and oakum. Nowhere in the code will it state the first three joints.

Flushometers and floor drains - This is a two part mystery I have heard so many times I have to put it in the myth category. **1. You must use a flushometer type water closet in all buildings other than residential. 2. When you use a flushometer type water closet you must install a floor drain.** I thought perhaps these interpretations could have been passed down from an old code. So I did some research and scoured through my collection of code books that go back to 1934. I could find no such reference to either of these myths. The fact is our code does not restrict the use of tank type toilets. And you certainly do not have to install a floor drain just because a flushometer type toilet is used. You will find these regulations in section 10.10,10,a,5, and 10.10,18,n. In short it will say a floor drain must be installed when there are two or more water closets or urinals, or two or more in any combination. Also it is important to mention floor drains require a trap primer **and** a hose bib, one does not eliminate the other.

Piping shall not be installed on an outside wall. This is a definite myth and has never been true. Refer to section 10.05,8,c, 1.2.and 3. #2 will state *for water supply or drainage piping that is installed in an exterior wall unconditioned space or similar areas that may be directly influenced by freezing temperatures, adequate provision shall be made to protect all pipes from freezing.* Pay very close attention to #3, *the protection and covering of water and waste pipes shall be the responsibility of the installing plumber.* To completely bust this myth I again referred to my old code books. City of Boston

Plumbing Laws 1938, quote, *No trap or water supply piping shall be exposed to freezing without adequate protection.* Of course you can install piping on an outside wall and in attics or crawl spaces, sometimes you have to. You simply have to protect them from freezing, which is the plumber's responsibility.

Plumbing Fixtures Require an Overflow. Recently I got a call from a plumber working in another town. He told me the inspector was making him change four lavatories because they did not have overflows. I told him he was wrong, dead wrong. Read section 10.10,2,a, *When any fixture is provided with an overflow, the waste shall be arranged so that the standing water in the fixture cannot rise in the overflow when the stopper is closed or remain in the overflow when the fixture is empty.* The key word is **when**. I wanted some back up to bust this myth. So I referred to the IAPMO International Plumbing Code strictly for comparison purposes. The IAPMO Code has this great interpretation manual; following is their interpretation word for word. *Question, is an overflow required on a bathtub, specifically a prefabricated fiberglass tub and shower combination, when such unit is not drilled for an overflow? Answer, No, the UPC does not specifically state that a plumbing fixture of any kind requires an overflow, section 404.0 states that when a fixture is provided with an overflow, certain conditions shall be met. If a bathtub with an IAPMO listing is delivered to the job site without an overflow, an overflow is not required to be installed.* Our code basically says the same thing, myth busted.

Vents For Sewage Ejectors Must Be Run Separately Through The Roof. This may be more of a misinterpretation. None the less I'm calling it a myth. Going back to our original uniform code in the 60's, there was some wording that vents for sumps may have to be run independently, however it was not mandatory. Following is the wording. *It shall be vented by means of an independent vent pipe not less than four inches (4") in diameter and/or not less than the size of the tapping provided by the manufacturer, extended through the roof or connected to the vent stack; or, it may be properly connected to the vent stack of the fixture discharging into the sump if such vent is four inches (4") or larger.* Today 50 years later it is still being misinterpreted by some. Under section 10.16, venting of sumps and ejectors, there is no mention of running an independent vent, except for the air pressure relief pipe for a pneumatic ejector. This is not your conventional ejector and in my estimation is very rare. Myth busted again.

Please write me if you have any myths, I would love to hear them. If you disagree with any of my opinions I will be completely receptive, just remember to back it up with a written regulation not a myth.