



City of
PORTLAND, OREGON
Portland Permitting & Development

Process Improvement and Technology Subcommittee
Meeting Notes
October 17, 2024

Meeting documents are available at the [Process Improvement and Technology Sub committee](#)

Meeting Notes

10:15 – 10:20am - Welcome & Introductions

Sean Green, PITSC Chair

Sean Green, PITSC Chair, welcomed the group of attendees and facilitated the adoption of September meeting minutes.

10:20 – 11:40am - Water Quality Backflow Requirements - Discussion

Kris Calvert, PP&D Water Development Review Supervisor

Silas Richardson, Water Bureau Environmental Manager

Question #1: *Sean Green* - Have heard that some of these local requirements (to make improvements needing to relocate backflow device) were prompted by State regulations to protect drinking water system. OAR describes need to add devices that protect the entire property (premise isolation) by adding the special devices at the meter, where the water service is coming on to the property. However, it also states that there can be an alternate location.

Two types of devices that are used in general:

1. Reduced pressure device - High hazard table must use reduced pressure device. These need to be installed above ground; because they can't be in contact with water because the air gap they use to work doesn't work with the device; needs to be separated from potential water (can't install in a vault, for example).
2. Double check valve types of devices - Used for Premise Isolation; listed in Table 43.

One of things that came up in previous PITSC discussion is the question; What triggers a review that could require the installation or moving of a device from on the property to at the property line at the meter? Customers are interested in understanding the *trigger* for a tenant improvement type of project (versus new construction).

Green has reached out to different jurisdictions;

- Some say that if the project is not meeting a certain dollar threshold or meeting a certain plumbing scope, they won't review to see if the RP is at the property line.
- Some were able to provide criteria for review and the standards to which it would be held
- Would like to understand if that type of information exists, so it can be shared on the website and is clearer for customers

Answer #1: *Silas Richardson* - Portland focuses on premise isolation; #9 defines the requirements. For TI, we look at every set of plans that come in; Title 21, 28, and Backflow and Assembly rules are the places to look for installation criteria. For every plan set that comes in for review, we do our best to do as much research as possible to determine backflow requirements.

1. Are there existing backflow requirements? If there isn't, we're going to require it
2. 2" or larger = needs backflow assembly
3. If it is commercial or smaller, it may not need a backflow assembly
4. When looking at TI, the question is "is the use of water changing to a degree that it is contained in Table 42"? If the assembly is at an alternative location, it may not provide enough protection, so we're looking at moving it so we can protect the water system and the public.

The website does get confusing. There are two components of testing and monitoring that must be reported to OHA. The homeowner that gets a notice that need to test backflow assembly; there are two areas to test, and homeowners don't necessarily know difference between backwater valve and backflow assembly. That is a big component of what Water does; we need to track that data and ensure they are being tested and reported to the State.

That plays into how we look at the installation; we look at the assemblies as being there for a long time, and if done right, won't need to do it again. That is the end goal. Based on the degree of hazard, may need to be tested and able to be repaired and replaced if they fail or are damaged in the future.

Question #2: Can you explain what WQB triggers are?

Answer #2: *Kris Calvert* - Yes, partially – WQ will be looking at it if it is a Commercial project; don't know if it will be required, but will be looking at all of them

Question #3: *Sean Green* - if I'm a customer looking to rent or buy a commercial space and need to add an ADA ramp or do some electrical work, is it going to trigger a WQB review and potentially needing to install a device?

Answer #3: *Silas Richardson* - Don't have an answer right now; we've asked for it in the past, because there are a lot of existing commercial properties that don't currently have WQB protection. Right now look at every single plan set and look at it from the perspective of;

- Does it have a backflow assembly?
- Where is it in relation to rest of the assembly?
- Is water changing use?
- Can we get it closer to the property line so that the whole property is protected?

Question #4 + Conversation: *Suzannah Stanley* – I'm guessing this group is not focused on when the review is triggered, but the interest is when the requirement occurs; So for ADA ramp example, do you review for WQB?

Also guessing that Gresham flow chart, there are multiple codes, and then there is another set of codes for what jurisdictions can do to require upgrades, so if changing a door, City can't require something that is not in proportion. If doing a massive TI, it's no problem to upgrade the WQB device; sometimes just changing a wall and the addresses and the requirements come into play and drive cost up in an unreasonable way.

So how will we know when we will need to do WQB upgrades? What is the trigger? And how can the City write something that meets the federal proportional rules so that it is clear? This information should be codified so customers know what the City's routing system and expectations would be.

Josh Lighthipe – Have seen lots of Portland Public Schools (PPS) upgrades, 21 of them have had boilers, and where are doing ramps. Even though they are under \$30K, they have to have an RP; a small project doubles or triples in cost because they have boilers. It's currently over \$1.2 million of additional costs that the firm and PPS were not aware of. Since there weren't clear checklists, it was assumed that because it was a small improvement, the cost would be lower. No leeway has been granted; this has impacted not just construction costs, it was also design costs and extension of construction timelines. We would appreciate something like the Gresham Flow Chart to help make things simpler. Would also love to see a cost trigger; PPS is a big organization, but for smaller businesses, that is hard. They decide not to do an upgrade because it's not affordable.

Sean Green - In previous discussion, having more clear info on the website came up, but if different jurisdictions are doing it differently, and all citing the same State regulations; there is a lot of variation between jurisdictions. Unsure if some jurisdictions are not following the law right, or if they have discretion to implement some of the proportionality that Suzannah brought up.

Dave Tebeau - Silas and I have had multiple conversations and Silas has been very collaborative. See customers who are doing small TI, they give the water reviewer quite a bit of latitude; premise isolation, if it's not in that location, etc., the water bureau has some latitude to decide some of those things

Question #5: *Dave Tebeau* - Silas, you were alluding to a small TI, no plumbing fixtures; you were saying that if you find the device is somewhere other than POD, you are working to move all of those out to POD. If that is the case, that could be a litmus test; maybe that is something that can be more clearly communicated? Is that right, or is it case by case?

Answer #5: *Silas Richardson*- It is case by case from what I can gather.

Dave Tebeau - Transparency for customer so they can know what will be expected would be really helpful.

Question #6: *Brent [Last name not provided]* - I would like to hear some clarification from the City on interpretation of the OARs or changes in the OAR. We've seen some increases in the requirements for RPs, seeing it more with speculative industrial work where the industrial isn't clearly defined when the spec comes in. Also seeing TI on 15+ year old buildings without plumbing or water and required to upgrade to RP devices. These requirements can be impactful, especially when frontage is built out and utilities are built out, it presents additional challenges for what seems to be a no impact/no change TI. Is there a difference in interpretation, and how does that apply to the RP upgrades?

Answer #6: *Silas Richardson* - "Speculative" is accurate; if it is just a blank slate and we're not sure what's going to go in, we will error on the RP because it gives the best protection for high hazards. As far as replacing, we're looking at the use and if it's a change in use, looking at it from the best protection possible; not generated from the OAR, generated on use past the POD.

Brent - Some of the examples don't involve change in use or types of fixtures or connections, but being required to upgrade from a double check to an RP. It's seemingly a difference in interpretation.

Another interpretation is does the City look at the worst case use in a building? For example, fitness facility with pool? Pool has higher WQB prevention than other parts of the gym, have been able to isolate that from the rest of the plumbing fixtures, can stick with the double check. is that allowed?

Silas Richardson - It is case by case at this time; Portland is missing standards and drawings. I have a meeting set up with engineering; it's recognized that information will be helpful, however it is currently case by case.

We have a database, on TI are doing site visits to verify what is going on. Some submitted plans are not accurate or to scale (meter may be off by 30-70' or more). Portland is old and has a lot of character, but it brings a lot of challenges; talking about RPs and visual obstructions, we do realize that and are doing our best. If you contact us and ask us to come out and give us a site review, can give some early feedback on what we think you're looking at. Water definitely wants to help, we want to be part of the interactions, and share knowledge and info on how things are looking from Water perspective.

Question #7: Does case by case mean that there are differences in the same types of situations? Are we verifying the existing situation, or could there be different applications for similar situations?

Answer #7: *Kris Calvert* - Think Sean is asking for knowable standards that are written so customers know how and when they are going to have requirements enforced; I don't know that there is variability in the decision.

Sean Green - What are those standards? If the team has those standards, seems like should be something that should be shared with customers?

Silas Richardson - If they are going to do rain harvesting, and it has a double check valve, but if it has irrigation with chemical additive downstream, would need to have the RP because it has a relief valve and a higher level of protection. We're trying to look at it rationally, what is being used and what's going on. Sometimes we look at the lifespan; if it is the original assembly from the 70s, it may be time to upgrade that and bring it up to code. I'm hearing that a flow chart would be helpful, and am Portland can put that together.

Question #8: *Suzannah Stanley* - Also wanted to bring up the question – WQB doesn't attend EA meetings; there's not a fee, so we're not paying for their time - is there a way to make a connection

with Water at the EA meeting? Maybe it's a statement that there is also a WQB group that needs to review and points to their codes?

Answer #8: *Kris Calvert* - There is a template and an explanatory paragraph updated over the months and years with a link to the webpage, so that is in every EA response.

Silas Richardson - 21.12/320 is the City code under water and it gives some pretty good outlines of what is required; as far as the webpage, everybody's interpretation could be different, but the information is there.

Suzannah Stanley - In the EA notes in the "other" category, do see that now about Water and EA – guessing that it might not happen too frequently; maybe the water person at the meeting could highlight that.

Kris Calvert – We will bring that up as a suggestion, that might be a habit that takes time to build, but that's a good suggestion. (Kris agreed to take this forward)

Josh Lighthipe - I would love to see a clearer and reinterpretation of code in flow charts or tables to make it easier to digest. Tables, etc., would be so helpful with examples; clear examples could help avoid unexpected complications and expenses in various situations.

Brent - Some standardization for vault sizes for different types of meters would be helpful so design to the correct level of tolerance; it's unfortunate if customers aren't able to anticipate things well because of lack of examples and standardizations.

Silas Richardson – That is on the to do list and we hope to get something in motion soon.

Josh Lighthipe - Getting standard comments and asks in Checksheets; would be great if those are published in word format so can include those in the plans the first time around. Would prefer to get it right without getting a Checksheet – we know are always going to get a water quality check sheet.

Silas Richardson – I'll come back in January to give an update on progress of internal conversations; in the meantime would be good to talk to other jurisdictions to understand how they came up with their process flows and decision making trees.

TAKEAWAYS - Ideas + Suggestions:

1. Setting expectations with customers early, i.e., TI (tenant improvement) and not when they are in design.
2. Helpful if there was some type of flow chart that would show when these requirements are changed, or the triggers for the change to add the device.
3. Suggestion for this create a 'trigger table' for clients so they understand when and what triggers certain requirements.
4. Updating the website instructions and requirements regarding this device requirement.
5. Can we get some examples from water quality backflow group about these types of issues, need to understand how often this happens?

11:40 – 11:45am - Future PITSC Agenda Items

All

- Suzannah – list of ROW code updates and had a couple weeks to provide comments, what is the status of that project and should that go to this group or DRAC?
 - Brenda/Sean to check in on this
- Jill – RS permit submittal – finding little things could use some adjustment; have sent a few things to Lila.
 - Jill will forward some thoughts to BF for coordination
 - Jill to follow up with Alice and Lila to determine whether should be discussed at PITSC, are in the queue, etc.