

# Meeting Minutes: Ad-Hoc Code Review & Rulemaking Committee

Date: April 22, 2019  
Time: 9:00 a.m.  
Location: Minnesota Room, Department of Labor and Industry  
443 Lafayette Road No., St. Paul, MN 55117-4344

## Committee Members Present

Richard Becker  
John Flagg  
Mike Herman  
Rick Jacobs (chair)  
Cathy Tran

## Committee Members Absent

None

## DLI Staff & Visitors

Suzanne Todnem, General Counsel (DLI)  
Brad Jensen (DLI)  
Jim Peterson (DLI)  
Stephanie Menning (MN Utility Contractors)  
Gary Thaden (MMCA)  
Bob Moore (Contech)  
David Radziej (Metro PHCC)  
Aaron Ganson (ADS)  
Bryan Miko (ADS)  
Anita Anderson (MDH)  
Gary Schick (City of Rochester)  
Jennifer Schaft (County Materials)  
Carlos Villarreal (County Materials)  
Jim Gander (Superior Mechanical)  
Dan Murphy  
Mike Johnson (J Berd Mechanical)  
Scott Thompson (My Plumbing Training)  
Lance Hoff (Momentum Env)  
Matt Marciniak (IAPMO)  
A.J. Schwidder (Upstream Technologies) – via tele  
David Weum (MDH) – via tele

### **1. Call to Order**

The meeting was called to order by Chair Jacobs at 9:20 a.m. Introductions and housekeeping announcements were made. Attendance was taken; a quorum was met with 5 of 5 members present.

### **2. Approval of meeting agenda**

A motion was made by Becker, seconded by Flagg, to approve the agenda as presented. The vote was unanimous with 5 votes in favor; the motion carried.

### **3. Approval of previous meeting minutes**

A motion was made by Flagg, seconded by Herman, to approve the March 29, 2019, draft minutes, as presented. The vote was unanimous with 5 votes in favor; the motion carried.

#### 4. Regular Business

Approval of Expense Reports – Chair will approve expenses presented at the meeting.

#### 5. Special Business

Discuss chapters 7, 11, 13, 15, 16, 17, and 2 of the 2018 Uniform Plumbing Code (UPC), appendices A, B, C, E, and I, of the 2018 UPC, and any other chapter or appendix of the 2018 UPC as time permits; discuss possible rulemaking recommendations to the Plumbing Board.

**PB0133 Proposal:** add ASTM F2562 standard (regarding SRPE pipe) to Table 701.1 (renumbered to Table 701.2)

Robert Moore presented the RFA to the Ad-Hoc committee related to Steel Reinforced Polyethylene Pipe (SRPE) for proposed use inside and outside of buildings. The RFA requested adding SRPE pipe meeting ASTM F2562 to Table 701.1, and included IAPMO Certification of Listing for steel reinforced polyethylene rainwater harvesting tanks to IGC 329. Mr. Moore stated there is a correlation between IGC 329 and ASTM F2562. No copy of IGC 329 was provided for the Committee's review and ASTM F2562 is not a listed standard in the 2018 UPC. Committee discussed RFA and expressed concerns about the appropriateness of use inside of buildings, testing requirements, the lack of the IGC 329 for review, the proposed use of the materials appears to be for storm water retention system, incomplete/conflicting information, and adding new standards that have not been incorporated in the 2018 UPC.

Committee **recommended** the board take no action on RFA PB0133 because there is insufficient information.

**PB0123 Proposal:** add various standards to section 1101.4.5, Building Storm Sewers; and Joints and Connections.

Aaron Ganson and Bryan Miko, Advanced Drainage Systems, presented the RFA to the Ad-Hoc committee. This RFA had been initially discussed at a previous committee meeting. Presenters requested 1) creating a new table of building storm sewer pipes under 1101.4.5, 2) add new pipe materials, and 3) add joints and connections for those new pipe materials. Presenters also noted that the 2018 IPC does include the proposed standards. Committee discussed the various proposed standards on materials for building storm sewers. Tran recommended that the standard ASTM F2306, HDPE 12 inches and larger, be added as a material for use in storm sewers and as a referenced standard in chapter 17 because DLI has commonly seen this material proposed on many projects and it has been considered and approved as an alternate material. Tran confirmed with Miko that all proposed materials are intended for use in installation from manhole to manhole with no changes in directions, using an approved Fernco coupling to join building drain to the HDPE material, 10 feet separation from water piping, and installation per ASTM D2321. Miko confirmed. Adding it to the Plumbing Code would provide consistency among jurisdictions. DLI stated the proposed concrete pipe Standard ASTM C76 has already been recommended for incorporation at a previous committee meeting.

Committee **recommends** the board include Standards ASTM F2306 and F2881 for storm sewer (outside of buildings) use only and Standard ASTM F2648 for yard drainage only in Table 701.2, and add as referenced standards to Table 1701.1, and add the proposed Joints and Connections language.

**PB0132 Proposal:** require a minimum of 18 inches between nearest inlet pipe and a vertical baffle.

Arthur Schwidder submitted this RFA but was not available to present to the committee. Lance Hoff of Momentum Env addressed the committee regarding his concerns about this RFA. Hoff expressed his concerns about having a fixed minimum clearance and not appropriate for all designs; he recommended that baffles like these be installed to meet manufacturers' installation requirements. Installation per manufacturers' installation instructions is more performance-based and more appropriate than a set minimum distance. Committee discussed this RFA with respect to the current Minnesota Plumbing Code, and recommends baffle designs be considered on an individual project basis as engineered and per manufactured interceptor instructions under Section 1009.2 for the specific application.

Committee **recommends** the board take no action on this RFA.

**PB0127 Proposal:** repeal MN amendment to section 712.1 and use 2018 UPC 712.1 language to allow air testing on PVC and remove the water column test

Scott Thompson presented the RFA to the committee. Presenter proposed eliminating the manometer test and only having a visual inspection for the final plumbing inspection. Several visitors expressed that the final manometer test does take a significant amount of time to perform on larger projects and questioned if the test is really necessary. DLI expressed that they feel the manometer test is important because it is a way to ensure that the plumbing system has not been compromised since the rough-in test and inspection was performed.

Committee **recommends** the board keep the language as previously amended in rule part 4714.0712.

**PB0125 Proposal:** various proposals

Tran presented RFA to the committee, proposed RFA consists of multiple items related to chapter 11. Committee discussed proposed RFA and have recommendations as follows.

1. Add subsections 1101.11.2.1 Location and 1101.11.2.2 Engineered System. Specifically, add proposed language for 1101.2.1 as follows "Unless roof design is certified by Registered Design Professional specializing in Structural Engineering for the maximum possible depth of water that will pond in accordance with Minnesota Rules, Chapter 1305, secondary roof drainage shall be located 2 inches above the lowest point of the roof surface." Add 1101.11.2.2 to read: "Engineered siphonic roof drainage systems must not be utilized in the design of a secondary roof drainage system."
2. Amend sections 1103.1 and 1103.2 (renumbered from 1106). Add to both sections, as indicated in the RFA: "For sizes not listed under Table 1103.1, a minimum rainfall rate of 4 inches per hour must be used to size the rainwater piping."

Committee **recommends** the proposals for 1101.11.2.2, 1103.1 and 1103.2 as submitted; for 1101.11.2.1, recommends the proposal as indicted above.

**PB0124 Proposal:** Amend 4714.1702, Table 1702.9.4; do not adopt chapter 15 of UPC 2018 Anita Anderson from the Minnesota Department of Health (MDH) presented this RFA to the committee. The RFA presented is based on new information on water treatment for rainwater harvesting from the report titled “Risk-Based Framework for the Development of the Public Health Guidance for Decentralized Non-Potable Water Systems”. Based on the recommendation from this report, the RFA proposes to 1) amend the log of reduction requirement under table from “Minimum 0.5 log inactivation of viruses” to “Minimum 3.5 log reduction of bacteria”; 2) delete the turbidity standard from Table 1702.9.4 because it restricts the use of other available water treatment technology methods that do not required turbidity to be less than 1 NTU to be effective treatment; 3) change to 100 micron or smaller filter rather than 5 micron in order to update the standards and consistent with the UPC 2018, 3) . The proposed changes are more performance-based requirements.

Committee discussed the proposed change. Mike Herman had concerns of the proposed log reduction of bacteria requirement. The committee decided to **table** this RFA until the committee has had a chance to thoroughly review Chapter 16 (Nonpotable Rainwater Catchment Systems), of the UPC 2018.

Regarding chapter 15, 2018 UPC: MDH’s recommendation regarding chapter 15 is that the board should not incorporate this chapter by reference into the Plumbing Code. Chapter 15 addresses graywater. Graywater systems would have to be indoors in Minnesota due to winter conditions; they would freeze in the winter if outdoors. There are health concerns if graywater systems were indoors. The equipment and systems would need maintenance and oversight to ensure continued compliance.

The committee **recommends** not adopting Chapter 15 of the 2018 UPC.

**PB0134 Proposal:** add two definitions for “potable water” and “water for human consumption”

Anita Anderson presented RFA to the committee. Committee discussed the RFA. The proposed definitions created issues for the terms in some contexts, projected unintended consequences with a change in definitions. Presenter **withdrew** the RFA at this time. Presenter might resubmit a revised RFA.

**PB0129 Proposal:** define “quick-acting valve”

Scott Thompson presented the RFA to committee. Committee discussed RFA and noted the difficulty of defining “quick acting” valve. There was consensus that clarification on what is considered a “quick-acting valve” would help plumbers and inspectors know where water hammer arrestors are required. The proposed definition does not satisfy all situations in which a quick-acting valve is referenced.

Committee has **no recommendation** to the board on this RFA and recommends the full board discuss this definition.

**PB0128 Proposal:** add two definitions for “floor drain” and “floor drain – emergency”

Scott Thompson presented the RFA to committee, which included proposed definitions. The committee came to consensus on the following definition for “floor drain - emergency.” “Floor drains that are located in restrooms, under emergency eyewash/shower equipment and in laundry rooms.”

Committee **recommends** adding the definition above for “floor drain – emergency” and not adding the proposed definition of floor drain.

**PB0135 Proposal:** amend definition of “building supply”

Tran presented the RFA to the committee. The proposed definition is derived from final interpretations issued by the Plumbing Board on May 11, 2016, and June 15, 2016 regarding building supply piping. Because water meters are usually installed inside a building to protect them from freezing (as compared to locating meters near the curb or property line), Minnesota should define “building supply” differently.

Committee **recommends** using the proposed definition in the RFA.

The committee would like to meet again to review Appendix E, complete discussion of PB0124, discuss expansion of PVC pipe, review chapter 16, and any other part of the 2018 UPC.

## 6. **Adjournment**

A motion to adjourn by Becker, seconded by Flagg. The vote was unanimous with 5 votes; the motion carried, and meeting was adjourned at 4:00 p.m.

Respectfully submitted,

*Richard Becker*

Richard Becker