UL 213C

Outline of Investigation for Grooved and Plain End Fittings

Issue Number: 3

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SUMMARY OF TOPICS

This Third Issue of the Outline of Investigation for Grooved and Plain End Fittings, UL 213C, is being issued to specify that the requirements for Paragraphs 5.2, 5.4, and 13.1 will become effective on August 3, 2017.

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INTRODUCTION

1 Scope

1.1 These requirements cover the construction and performance of Grooved and Plain End fittings intended to be joined to pipe or to another fitting by couplings complying with the requirements of the Standard for Rubber Gasketed Fittings for Fire-Protection Service, UL 213.

1.2 For the purpose of this Outline of Investigation, Grooved and Plain End fittings include constructions having one piece cast devices and fittings fabricated from steel pipe that could be segmented and welded to form the fitting.

2 Components

2.1 Except as indicated in this clause, a component of a product covered by this Outline of Investigation shall comply with the requirements for that component.

2.2 A component is not required to comply with a specific requirement that:

a) Involves a feature or characteristic not required in the application of the component in the product covered by this Outline of Investigation, or

b) Is superseded by a requirement in this Outline of Investigation.

2.3 A component shall be used in accordance with its rating established for the intended conditions of use.

2.4 Specific components are incomplete in construction features or restricted in performance capabilities. Such components are intended for use only under limited conditions, such as certain temperatures not exceeding specified limits, and shall be used only under those specific conditions.

3 Units of Measurement

3.1 Values stated without parentheses are the requirement. Values in parentheses are explanatory or approximate information.

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4 Undated References

4.1 Any undated reference to a code or standard appearing in the requirements of this Outline of Investigation shall be interpreted as referring to the latest edition of that code or standard.

5 Glossary

5.1 For the purpose of these requirements, the following definitions apply.

5.2 GROOVED END FITTING – A fitting constructed with outlets grooved for use with specific couplings complying with the requirements of the Standard for Rubber Gasketed Fittings for Fire-Protection Service, UL 213.

5.2 effective August 3, 2017

5.3 NPS (NATIONAL PIPE SIZE) – A dimensionless designator for pipe sizes defined in standards including ASTM A 53/A 53M, ASTM A 135/A 135M and ASTM A 795/A 795M used to replace terms such as ″Nominal Diameter″ and ″Nominal Size.″

5.4 PLAIN END FITTING – A fitting having outlets without grooves or threads.

5.4 effective August 3, 2017

5.5 PROPRIETARY GROOVES – Dimensions of the grooved end fitting specified by the rubber gasketed fitting manufacturer that differ by dimension or tolerance from Standard Groove Dimensions. These proprietary grooves are intended for use with specific rubber gasketed fittings having dimensionally compatible proprietary grooves.

5.6 RUBBER GASKETED FITTING – A coupling commonly consisting of a two-part metallic housing and an internal elastomeric seal bolted together to form an assembly used to connect a fitting with other fittings or pipe.

5.7 STANDARD GROOVES – Dimensions of the grooved end, fitting specified by the rubber gasketed fitting manufacturer that complies with the dimensions of the Standard for Fire protection – Automatic sprinkler systems – Part 12: Requirements and test methods for grooved-end components for steel pipe systems, ISO 6182-12, for cut, rolled and cast grooves, intended for use with a groove type rubber gasketed fitting to join the fittings.

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