199—19.5(476) Engineering practice.

19.5(1) *Requirement for good engineering practice.* The gas plant of the utility shall be constructed, installed, maintained and operated in accordance with accepted good engineering practice in the gas industry to assure, as far as reasonably possible, continuity of service, uniformity in the quality of service furnished, and the safety of persons and property.

19.5(2) *Standards incorporated by reference.*

a. The design, construction, operation, and maintenance of gas systems and liquefied natural gas facilities shall be in accordance with the following standards where applicable:

(1) 49 CFR Part 191, "Transportation of Natural and Other Gas by Pipeline; Annual Reports, Incident Reports, and Safety-Related Condition Reports," as amended through June 27, 2007.

(2) 49 CFR Part 192, "Transportation of Natural and Other Gas by Pipeline: Minimum Federal Safety Standards," as amended through June 27, 2007.

(3) 49 CFR Part 193, "Liquefied Natural Gas Facilities: Federal Safety Standards," as amended through June 27, 2007.

(4) 49 CFR Part 199, "Drug and Alcohol Testing," as amended through June 27, 2007.

(5) ASME B31.8 - 2003, "Gas Transmission and Distribution Piping Systems."

(6) NFPA No. 59-2004, "Standard for the Storage and Handling of Liquefied Petroleum Gases at Utility Gas Plants."

(7) At railroad crossings, 199 IAC 42.7(476), "Engineering standards for pipelines."

b. The following publications are adopted as standards of accepted good practice for gas utilities:

(1) ANSI Z223.1/NFPA 54-2006, "National Fuel Gas Code."

(2) NFPA 501A-2005, "Fire Safety Criteria for Manufactured Home Installations, Sites, and Communities."

19.5(3) *Adequacy of gas supply.* The natural gas regularly available from supply sources supplemented by production or storage capacity must be sufficiently large to meet all reasonable demands for firm gas service.

19.5(4) *Gas transmission and distribution facilities.* The utility's gas transmission and distribution facilities shall be designed, constructed and maintained as required to reliably perform the gas delivery burden placed upon them. Each utility shall be capable of emergency repair work on a scale consistent with its scope of operation and with the physical conditions of its transmission and distribution facilities.

In appraising the reliability of the utility's transmission and distribution system, the board will consider, as principal factors, the condition of the physical property and the size, training, supervision, availability, equipment and mobility of the maintenance forces.

19.5(5) *Inspection of gas plant.* Each utility shall adopt a program of inspection of its gas plant in order to determine the necessity for replacement and repair. The frequency of the various inspections shall be based on the utility's experience and accepted good practice. Each utility shall keep sufficient records to give evidence of compliance with its inspection program.