

Guidance on Application of Consensus Safety and Health Standards Adopted in Part 851

The Department of Energy's Worker Safety and Health Program regulation, 10 CFR Part 851, was published in the Federal Register on February 9, 2006. 71 Fed. R. 6858-6948. Since its publication, DOE's Office of General Counsel (OGC) has been asked for guidance regarding the meaning of certain terms in the regulation. The following is intended to address the limited issue of how consensus safety and health standards adopted in the regulation should be applied. OGC may issue additional guidance on other questions relating to Part 851.

Sections 851.23 and 851.27 of DOE's recently adopted regulation 10 CFR Part 851, *Worker Safety and Health Program*, require contractor compliance with specific consensus safety and health standards to the extent the standards are applicable to the hazards at their covered workplaces. For instance, § 851.23 (a) (10) requires compliance with American National Standards Institute (ANSI) Z88.2, "American National Standard for Respiratory Protection," (1992) and § 851.23 (a) (13) requires compliance with National Fire Protection Association (NFPA) 70, "National Electrical Code," (2005) (if the particular standards are applicable to the contractor's workplace). Because the standards incorporated in the regulation include specific issuance dates, a number of contractors have expressed concern that application of the modern standards to many of the older DOE facilities (in some cases, much older) would require DOE contractors to undertake expensive retrofits or to seek numerous variances from the requirements in these standards.

As an initial matter, in considering the application of these external standards in the regulation, an important concept is that, unless the regulation states otherwise, the entire standard, including its scope and any other instructions as to how the standard is to be applied, is included as part of the regulation. Therefore, if the standards adopted in Part 851 indicate that they are not to be applied retroactively or, they apply only to design and construction, as opposed to existing facilities, they would not apply to existing facilities that are not undergoing new construction.

The great majority of the referenced standards contain language indicating that they apply to "design and construction" or, in the case of the National Electrical Code, "installations"—*not* to existing facilities or existing electrical systems. In addition, many of the standards clearly indicate that they are not intended to be applied retroactively. Using individuals with the appropriate expertise to properly interpret and apply the codes is also included in the

introductory language of many of the codes. As an example, the following text, or very similar text, is included in many of the codes; “The Code sets forth engineering requirements deemed necessary **for safe design and construction** of pressure piping. While safety is the basic consideration, this factor alone will not necessarily govern the final specifications for any piping system. *The designer is cautioned that the Code is not a design handbook; it does not do away with the need for the designer or for competent engineering judgment.*” American Society of Mechanical Engineers (ASME) Code for Pressure Piping, B31, Power Piping (ASME B31.1 (2001), p. xv (Emphasis added).

As a second example, the Scope of NFPA 70 specifically indicates that it “covers the **installation** of electrical conductors, equipment, and raceways; signaling and communications conductors, equipment, and raceways; and optical fiber cables and raceways; and raceways for [specifically identified uses]” § 90.2 (A) (Emphasis added). If the contractor is not **installing** the **specified** materials or equipment or for the **specified** uses, NFPA 70 does not apply. In addition, the enforcement guidance found in Annex G of the code states that “*Additions, alterations, or repairs to any building, structure, or premises shall conform to that required of a new building **without requiring the existing building to comply with all the requirements of this Code.***” § 80.9, Applications (Emphasis added).

Three ASME codes adopted in 10 CFR Part 851 do not contain the design/construction language described above. They are; ASME B31G-1991, ASME B31.8s-2001, and ASME B31.8-2003. Of these three codes, ASME B31G-1991 (reaffirmed 2004) deals with the remaining strength of corroded pipes and, therefore, it would not be expected to apply to new construction. Similarly, ASME B31.8s-2001 “Managing System Integrity of Gas Pipelines” does not contain this language because it deals with existing pipelines. ASME B31.8-2003 “Gas Transmission and Distribution Piping Systems” contains the construction language along with additional statements regarding the “maintenance of gas transmission or distribution pipelines.” The statement in ASME B31.8-2003 “*supervisory personnel having experience or knowledge to make adequate provisions for such unusual conditions*” indicates that this code also includes the need for qualified experts. Since these three codes deal in whole or in part with maintenance of existing facilities or systems, compliance or variances is required for applicable facilities or systems.

NFPA 70E “Standard for Electrical Safety in the Workplace” “addresses those electrical safety requirements *for employee work places that are necessary for the practical safeguarding of employees*¼.” (Emphasis added). The primary focus of NFPA 70E is safety-related work practices and maintenance

requirements, safety requirements for special equipment and safety-related installation procedural requirements. Its provisions mostly address safe work procedures/processes and, therefore, compliance is unlikely to necessitate extensive backfits or variances.

Based on this information, DOE contractors should review each of the codes (standards) cited in 10 CFR 851 and apply them in a manner consistent with the defined scope found in each of the specific codes. In most cases these codes apply to new construction and remodeling or new electrical installations. There are, however, cases when the codes apply to existing facilities or systems. Further, when applying the codes competent subject matter experts (SMEs) should be consulted to the extent practicable to determine the proper application of the codes' provisions.