BOOK REVIEW

The Assessment of Structural Safety

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REFERENCE: Leporati, E., The Assessment of Structural Safety. Research Studies Press, Forest Grove, OR, 1979.

At present many U.S. researchers are developing appropriate bridge and building design criteria based on probabilistic concepts. Such theories have various degress of complexity and the first-ordersecond-moment (FOSM) probabilistic theory is generally used to account for uncertainties of the resistance of the section and loads.

This text describes in detail the mathematical formulation of the FOSM theory and semiprobabilistic concepts. Also given are the statistical relationships necessary to apply the probabilistic techniques.

The book is completely mathematically oriented with all variables well defined. Some examples are given to describe the relationships between the parameters and their domains. This book would be suitable for use in graduate teaching but not for the practicing engineer.