Record Nr. UNISA996575000903316 "1885-2022 - IEEE Guide for Assessing, Measuring, and Verifying Volt-**Titolo** Var Control and Optimization on Distribution Systems" / / IEEE Pubbl/distr/stampa New York:,: IEEE,, 2022 ©2022 **ISBN** 1-5044-8777-X Descrizione fisica 1 online resource (58 pages) Disciplina 621.319 Soggetti Electric power distribution **Energy conservation** Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia Electric utilities are seeking to improve the overall efficiency and Sommario/riassunto performance of the distribution system while helping to achieve energy and demand savings. Distribution volt-var optimization (VVO) can play a major role in accomplishing these objectives while maintaining safety, preserving assets, and meeting all operating constraints such as loading and voltage levels. Initial studies and experience show there is significant potential for energy savings, demand management and loss reduction through improved management of distribution voltage profiles and reactive power flow. Consistent methods are needed for verifying the benefits achieved by VVO systems that have already been implemented. Guidelines for modeling system loads as well as distributed resources and their response to voltage and var changes are needed along with methods for performing the evaluations to estimate total benefits. These benefits can then be evaluated as a function of the investment requirements for the improved VVO on a feeder by feeder

developed.

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