

Xcel Energy's Downtown East Distribution System
Upgrades and Changes required to Serve the new US Bank Stadium and Related Projects

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The new US Bank Stadium, as well as the Wells Fargo Towers and related projects comprise nearly 15 MW of new load all located in the Downtown East Area of Minneapolis. Downtown Minneapolis has seen several billion dollars of new development in the last several years.

Because of the curb to curb urban development of this area, very little public right of way exists for installation of utilities, requiring the use of manholes and duct lines for electric facilities. Infrastructure of this nature is very expensive to install. In addition, the City places a ten year moratorium on utilities unless the utility pays for complete resurfacing of disrupted streets.

Since Xcel Energy is a public utility, it is required by the Public Utilities Commission to provide equivalent levels of service reliability to all customers. To cost effectively and consistently provide such service, Xcel Energy has developed internal engineering guidelines.

US Bank Stadium is a unique project, requiring high service reliability and redundancy. The project timeline is very tight for both the building itself and supporting infrastructure.

As a result of these conditions, it is important for Xcel Energy to get the design right the first time, providing excellent service reliability while minimizing capital expenditures.

The existing distribution circuits in the area are being extensively reconfigured, while maintaining service reliability to existing customers in the area and adhering to internal and external rules. All these potentially conflicting demands are being met.

This presentation describes the process being used and the end result.