

Study on Multi - Network Traffic Modeling in Distribution Communication Network Access Service

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Abstract—Network traffic model is the basis for network performance analysis, dynamic allocation of network bandwidth and network planning and construction. A good traffic model and prediction method is great significance for the design of a new generation of network protocols, network management and diagnosis, design of high performance routers, load balancers Network hardware equipment and improving the quality of the network services. With the construction of energy smart grid, especially in the distribution network is particularly evident. Increasing the variety of electrical equipment, which make distribution and communication network structure more complex and changeable, including a variety of communication systems, more Equipment, a larger scale and communication traffic characteristics. It can cause a great impact on the backbone network capacity. Considering the reliability and security of the power grid, this paper analyzes the characteristics of conventional traffic model based on the traffic characteristics of the distribution network and establishes a multi-convergence traffic prediction model to be used in the distribution network to improve the accuracy of network traffic prediction. Provide a reliable theoretical basis.

Keywords—Distribution Network; Traffic; Prediction Model; electrical equipment; backbone network



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