

Development of a Remote Monitoring and Control System for Nuclear Power Plants

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Abstract

Nuclear power plants (NPPs) will be highly connected network enabled system and need to be monitored and controlled round the clock for high safety and availability. Using the network and web enabled tools, NPPs can be monitored remotely by operators at anytime from any place connected to the network via a general web browser. However, there are security and performance issues associated with such tools, as will be further discussed further. We developed a web-based remote monitoring and control system (RMCS) that uses prevalent web technology. This work, as a preliminary study, performed the conceptual design of the web-based RMCS and developed the prototype.