

Session Title: Growing Renewable Energy and Grid Stabilisation

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Abstract title: Grid Integration of Variable Renewable Generation: Overview of Grid Reliability Challenges and Solutions

Wind and PV generation is growing rapidly worldwide. As variable renewable generation continues to grow, questions are arising about the ability of wind and PV power plants to contribute to maintaining grid reliability. Our presentation will demonstrate how various grid-friendly controls by wind and solar PV generation, and energy storage can provide all types of essential reliability services to the grid. We will show how advanced power electronics coupled with wind and PV generation, and energy storage can be controlled to contribute to system-wide reliability.