



TEXAS A&M UNIVERSITY

Department of Electrical  
& Computer Engineering

TRANSFORMING ENGINEERING EDUCATION

# ENERGY & POWER GROUP SEMINAR

## Using Power Flow Application Capabilities to Visualize and Analyze US Energy Information Administration Generation Data

### Abstract

The electrical generator data across the United States with a minimum capacity of one megawatt is publicly accessible via the US Energy Information Administration form 860 (EIA-



860). It is a valuable resource, holding significance for power and energy researchers as well as industry professionals. This paper describes the development and application of a power flow model utilizing the EIA-860 dataset. Beyond the model development process, this research emphasizes the critical role of effective data visualization techniques in communicating essential information about electricity generation. By showcasing the dataset's versatility and analytical power, this paper allows users to make informed decisions to advance power flow and generation adequacy studies.

**Jordan Cook**

Ph.D. Student  
Texas A&M University

**Friday, February 9**

**11:30 am**  
**241 ZACH**

### Biography

Jordan Cook received her B.S. degree in electrical and computer engineering from Baylor University in Waco, Texas in May 2022. She is currently in the second year of pursuing her Ph. D. degree in electrical engineering at Texas A&M University in College Station, TX. Her research interests include synchronous grid connections and methodology for correcting data in PowerWorld cases.

#### FACULTY CONTACT:

Adam Birchfield  
abirchfield@tamu.edu

TEXAS A&M ENGINEERING | [engineering.tamu.edu](http://engineering.tamu.edu)