



11TH ANNUAL
Nebraska
Wind & Solar
CONFERENCE & EXHIBITION
PRESENTED BY **NEXtera**
ENERGY 
RESOURCES

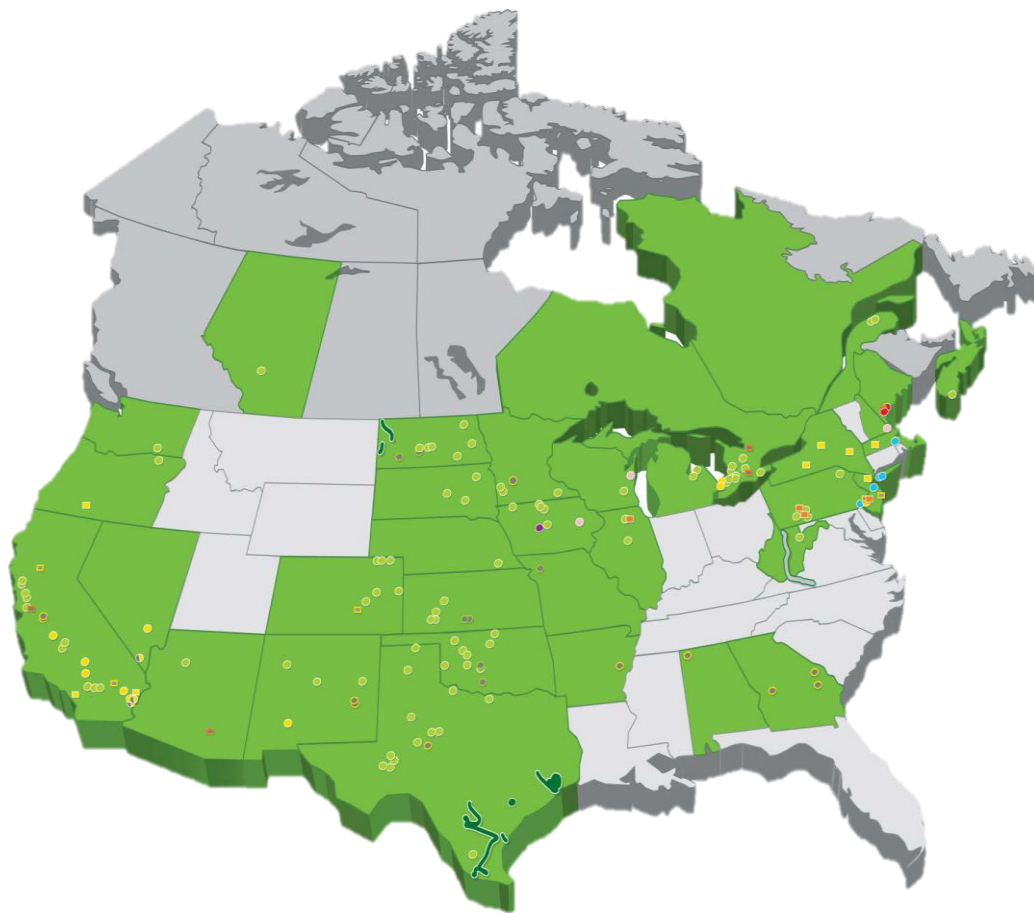
11th Annual Nebraska Wind & Solar Conference Battery Storage Update

October 16, 2018 | Marriott Cornhusker Hotel



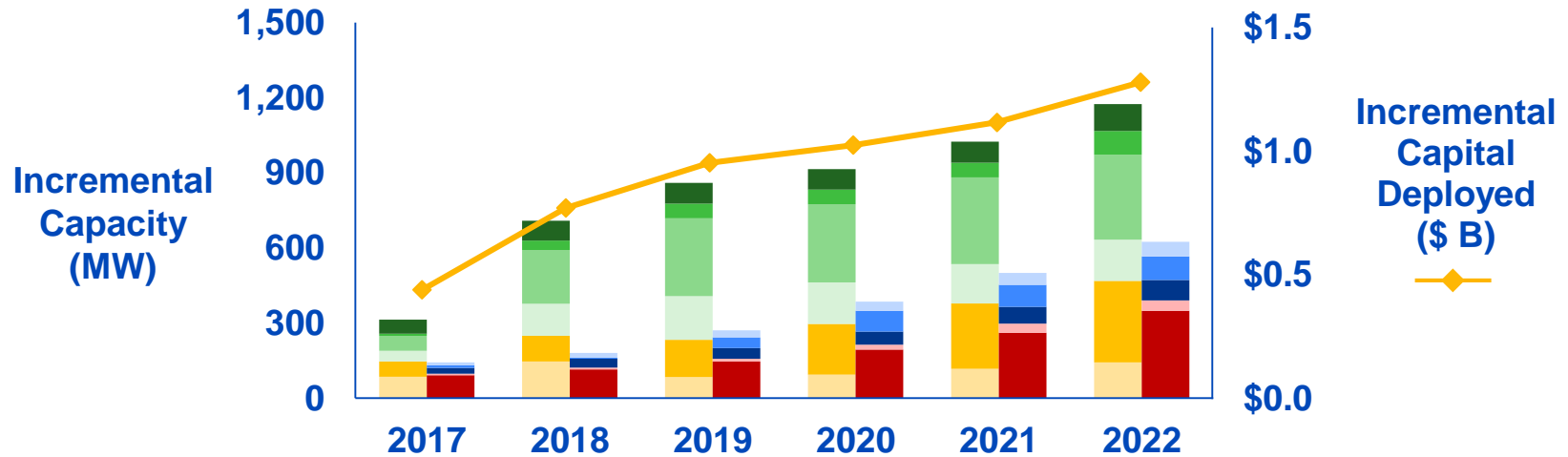
NextEra Energy Resources

- ▶ **Operating portfolio:**
 - ▶ **14,000 MW of wind**
 - ▶ **2,260 MW of solar**
 - ▶ **155 MW Battery Energy Storage Systems**
 - ▶ **33 U.S. states and 4 Canadian provinces**



Industry estimates are that 4.7 GW of utility-scale storage and 2 GW of behind-the-meter storage will be installed in 2018-2022, an incremental \$5 B market opportunity

Energy Storage Market (annual)⁽¹⁾



Utility-Scale

- Long-Duration Peaking Capacity (8+ hours)
- Regular, Cycling Peaking Capacity (4-8 hours)
- Peaking Capacity (1-4 hours)
- Occasional Peaking Capacity (1-4 hours)
- T&D Deferral
- Frequency Regulation

Behind-the-Meter

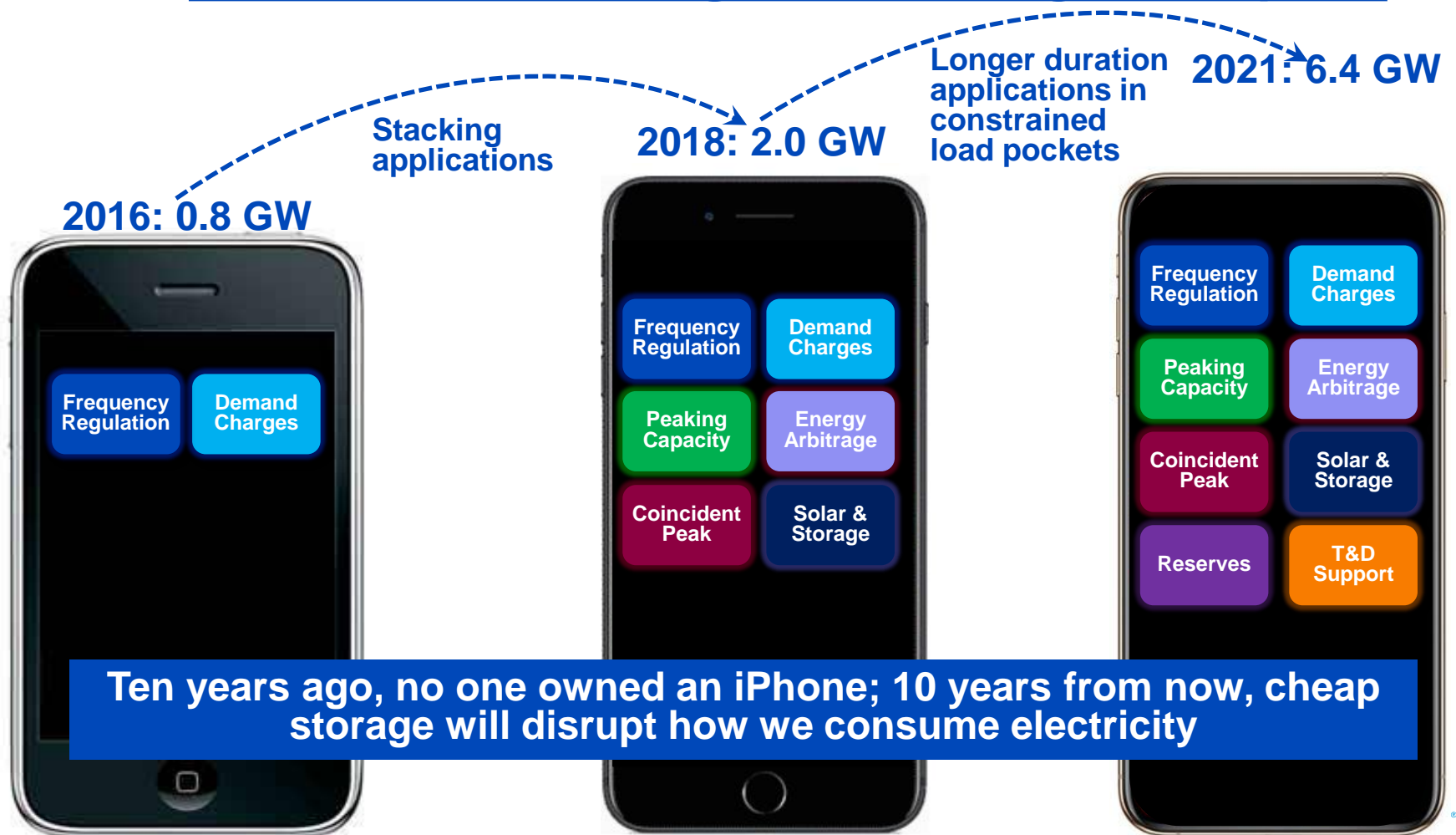
- Grid Services (Utility contracted)
- Capacity (Utility contracted)
- Coincident Peak Management
- Demand Response
- Demand Charge Management

Energy Storage is poised for a rapid acceleration of installed capacity over the next 5 to 7 years, a sizeable share of which may be in SPP

1) Greentech Media

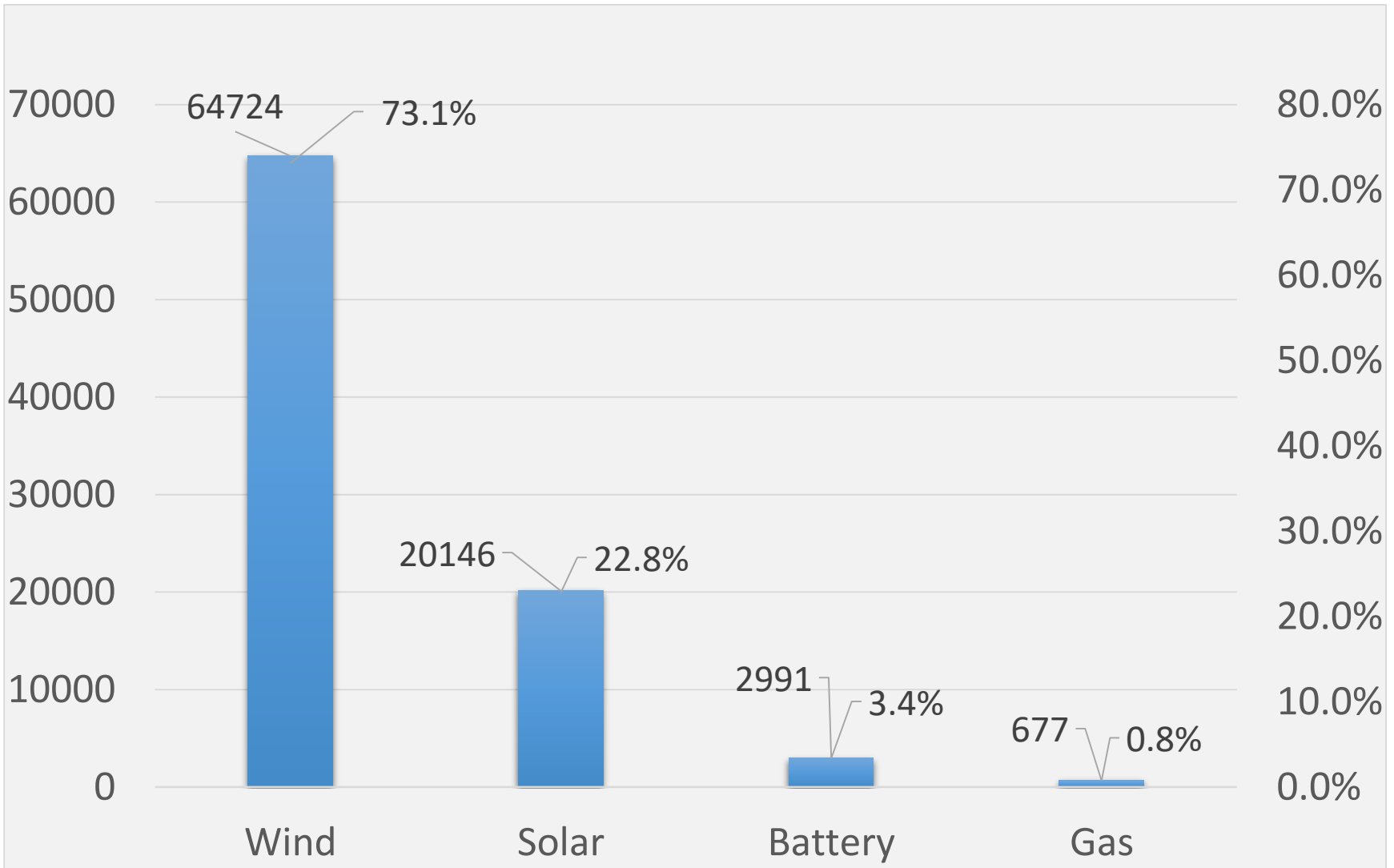
While the ancillary services market drove initial growth in storage, we expect long duration applications and project capital deployment to grow significantly through 2021

The iPhone is Analogous to Storage Disruption



Ten years ago, no one owned an iPhone; 10 years from now, cheap storage will disrupt how we consume electricity

2018 GI Queue Capacity By Fuel Type and Fuel Type Percentage of Total MWs



Renewable Integration Challenges

Ramp
Events

Wind
Forecast
Error

Load
Forecast
Error

Short Term
Capacity
Deficiency