



TAEBC Lunch and Learn

Jeannette Mills, EVP and Chief External Relations Officer
November 18, 2020

Service

Our Mission

To serve the people of
the Tennessee Valley
to make life better.

COVID-19 Response

\$200 Million **Pandemic Relief Credit**

2.5% Rate Credit

Regulatory Relief and Flexibility

for Local Power Companies

Community Care Fund More Than

\$4 Million

in Matching Funds Disbursed

Investing Additional

\$2 Million

Community Care Fund

Investing More Than

\$10 Million

In Back-to-Business

Incentive Program

Economic Development

ATTRACTED | RETAINED

341,000



JOBS

\$45.4 BILLION
DIRECT
Investment



VALLEY
FY16-FY20

Advanced Energy as ED Driver

- Lithium Ion Battery market driving Original Equipment Manufacturer expansion
- TVA generation mix and renewable solutions driving recent Electric Vehicle and EV OEM announcements
- TVA ED partnering with Oak Ridge National Laboratory

Valley Partners

Long-Term Partners

142 LPCs

93% of LPCs

*As of 11/1/20

Multiple Benefits Including

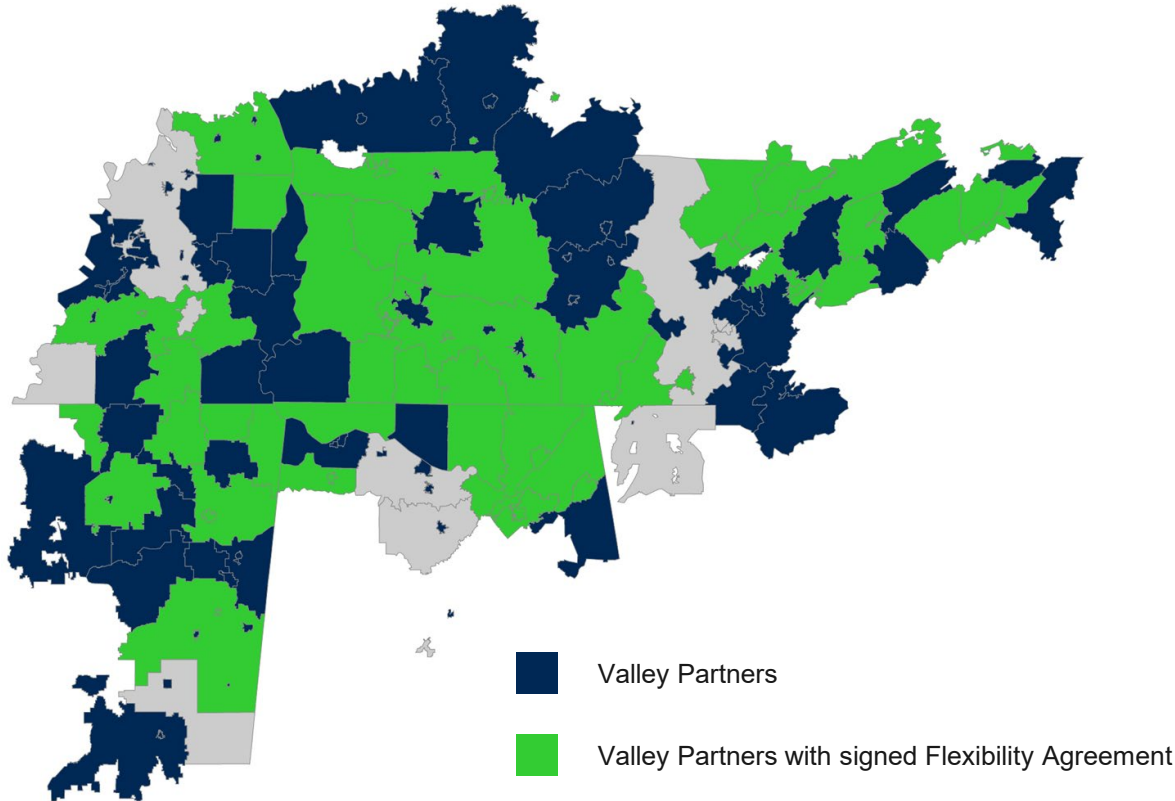
Self Generation

3.1% Bill Credit

**20-Year
Commitment**

To Plan and Work Together

Valley Partner Flexibility Option



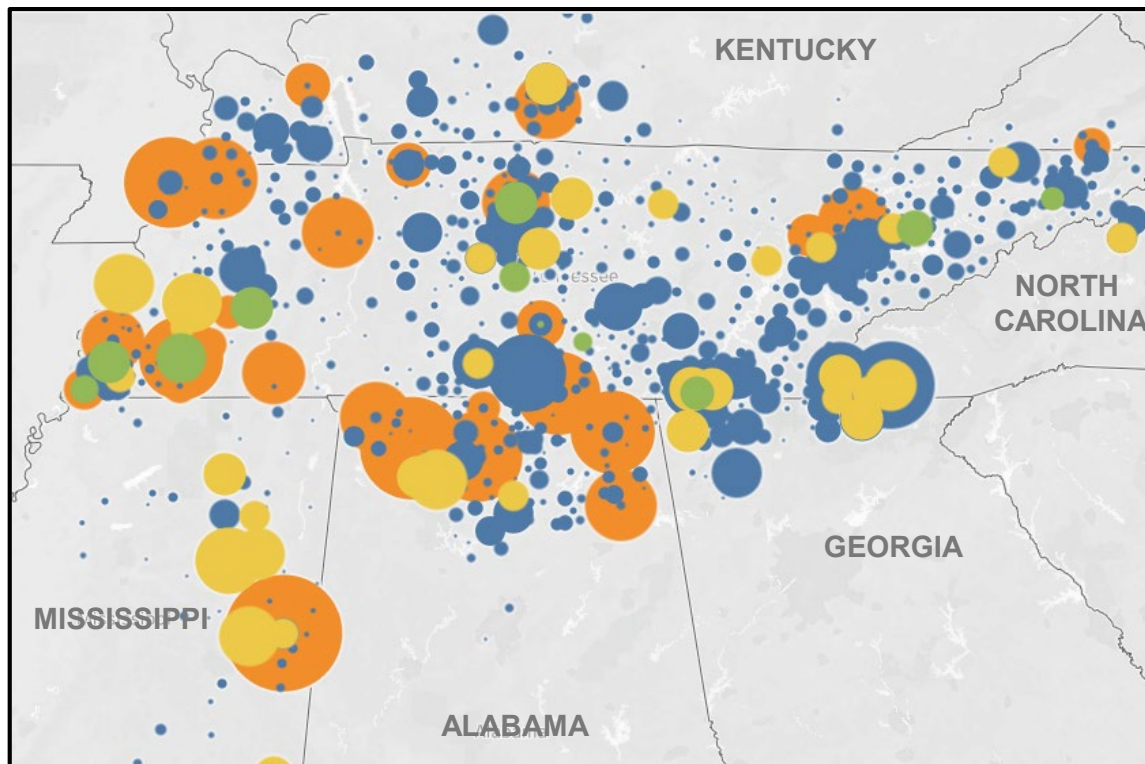
Tennessee Valley Solar

October 2020

1,608 MW_{AC}
Total Capacity

4,190
Total Installs

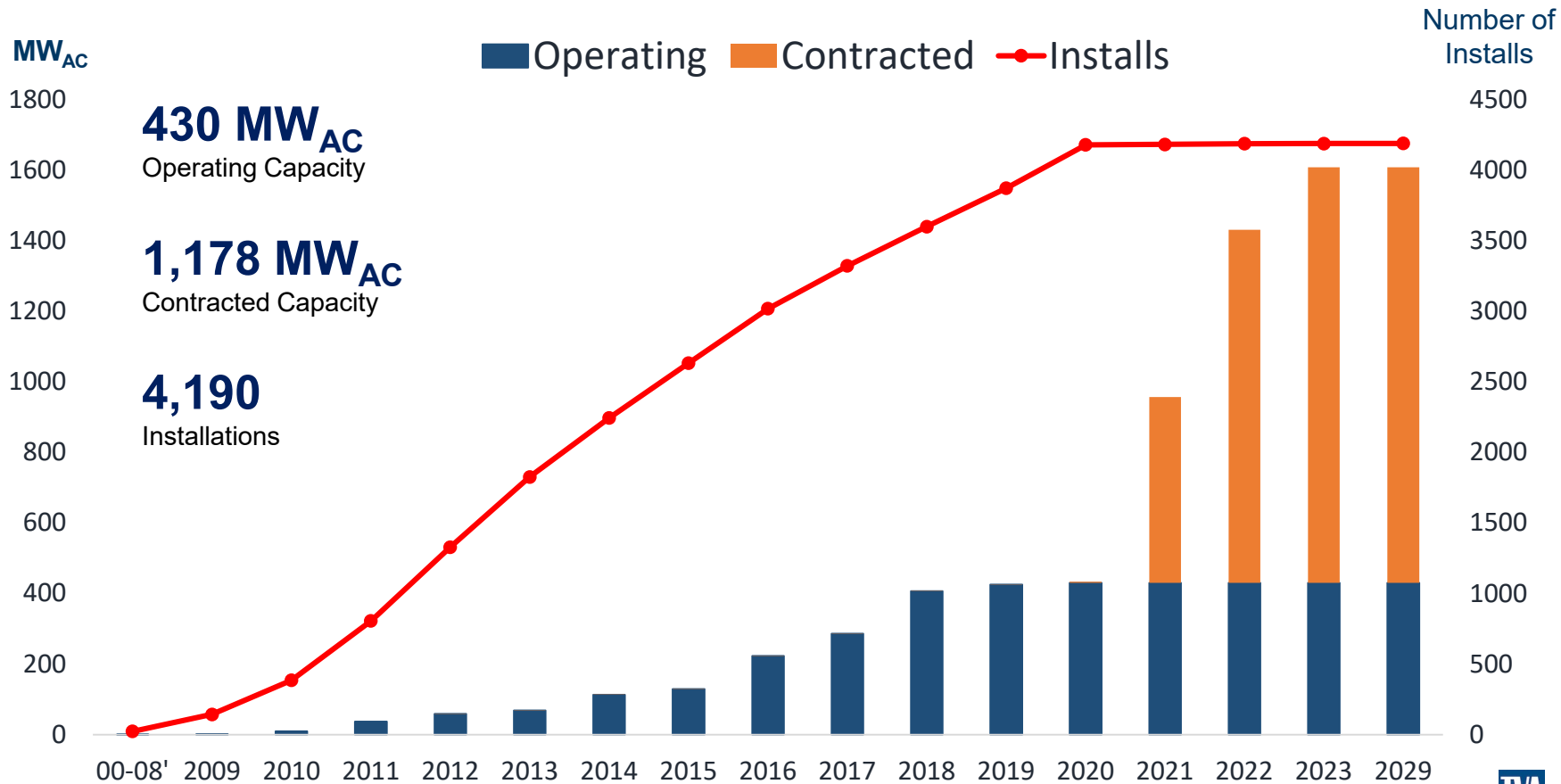
- Private Scale Solar
- Mid Scale Solar
- Community Solar
- Utility Scale Solar



* Includes both operating and contracted sites

Tennessee Valley Solar Growth

October 2020



First TVA-owned battery storage



- Stores energy when demand is low for use when demand is higher
- Multiple uses
- Test bed supports preparations to meet future energy needs
- Lithium-ion batteries – same technology as most electric vehicles
- Enough energy to power over 10,600 homes for three hours
- The TVA IRP calls for adding up to 5 gigawatts of energy storage capacity through 2038

Proposed Location: **Vonore, Tennessee**
Estimated Life: **10-15 years**
Characteristics: **20 MW, 2 hour rating**
Footprint: **< Football field**

Electric Vehicles Market Opportunity

Electric Vehicles: Transportation electrification presents a substantial opportunity for utilities



Lead the Charge – innovation leadership, driving sustainability



Reduce the largest source of CO₂ – and other air pollutants



Attract economic development prospects – EV production and suppliers



Grow sales – largest electrification opportunity



Balance the power system – off-peak charging helping keep rates low

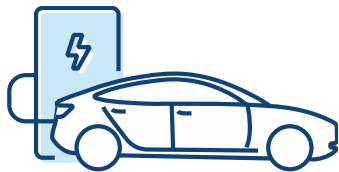


Invest locally – economic benefits of more locally produced fuel

The growing EV market is a significant opportunity for TVA and the Valley as a whole

TVA's Approach to Electric Vehicles

Accelerate EV adoption through partnerships to remove key market barriers



Charging Infrastructure
Availability



EV Availability
and Offerings



Innovative and
Supportive Policies



Consumer
Awareness

Removing market barriers in key areas

TVA is working with stakeholders to make these initiatives
available throughout the Valley region

Consumer education: *TVA.com/EV*



Business & Industry

Residential

Electric Vehicles

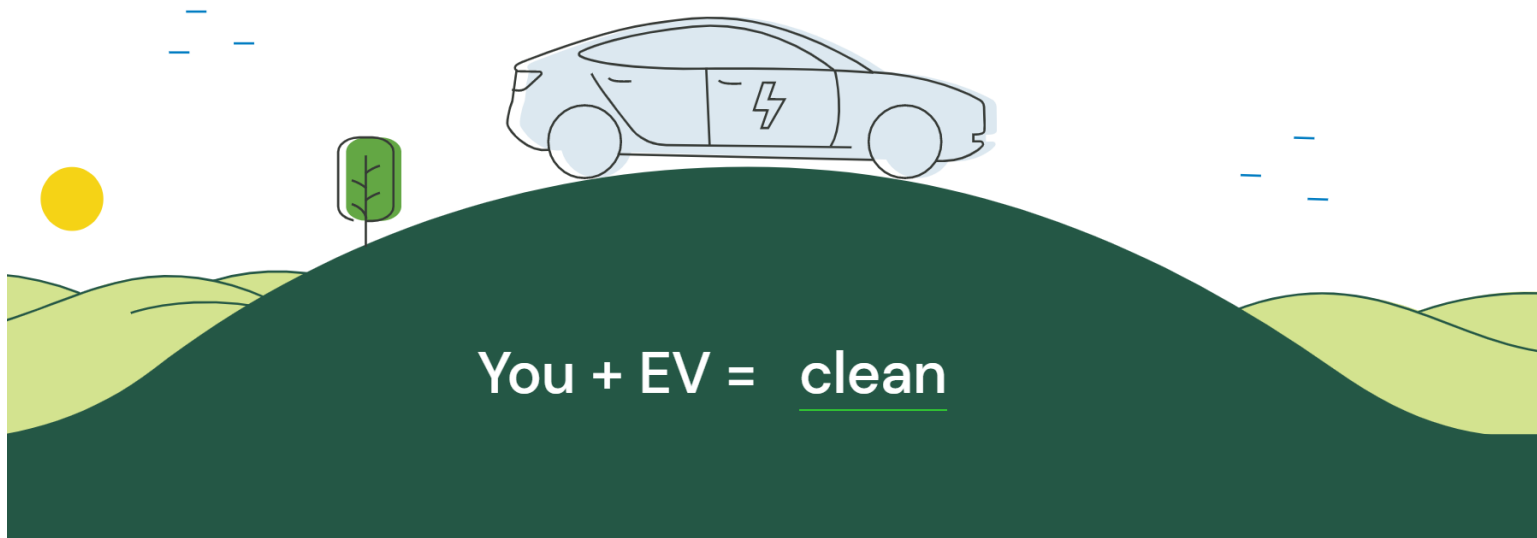
EV Basics

Explore EVs

Compare Vehicles

Find a Charger

Resources & Events



Transformative Innovation Initiatives



Storage Integration

- Implement a long-term strategy to integrate energy storage into the electric grid



Electric Vehicle Evolution

- Accelerate the TN Valley EV market to create load growth and benefits for Valley communities



Grid Transformation

- Develop an interconnected, intelligent grid to support a dynamic and flexible energy network



Connected Communities

- Expand smart technologies with communities to efficiently manage energy and services



Advanced Nuclear Solutions

- Explore advanced technology, cost sharing, and risk reduction



Decarbonization Options

- Reduce and offset carbon emissions via emerging technologies

Join us: 2019 IRP Update for Stakeholders

- December 9, 12:30-3:00 p.m. EST
- Updates on:
 - Near-term actions in the 2019 Integrated Resource Plan
 - TVA's fleet
 - Grid transformation
 - Energy usage
 - Renewables & TVA Green
- Register at ***TVA.com > Get Involved***

