



- ✧ **Advanced composting**
- ✧ **Renewable energy**
- ✧ **Organic food production**

Project Update: Prince William County Integrated Organics Processing Facility

Metropolitan Washington Council of Governments
Recycling Committee

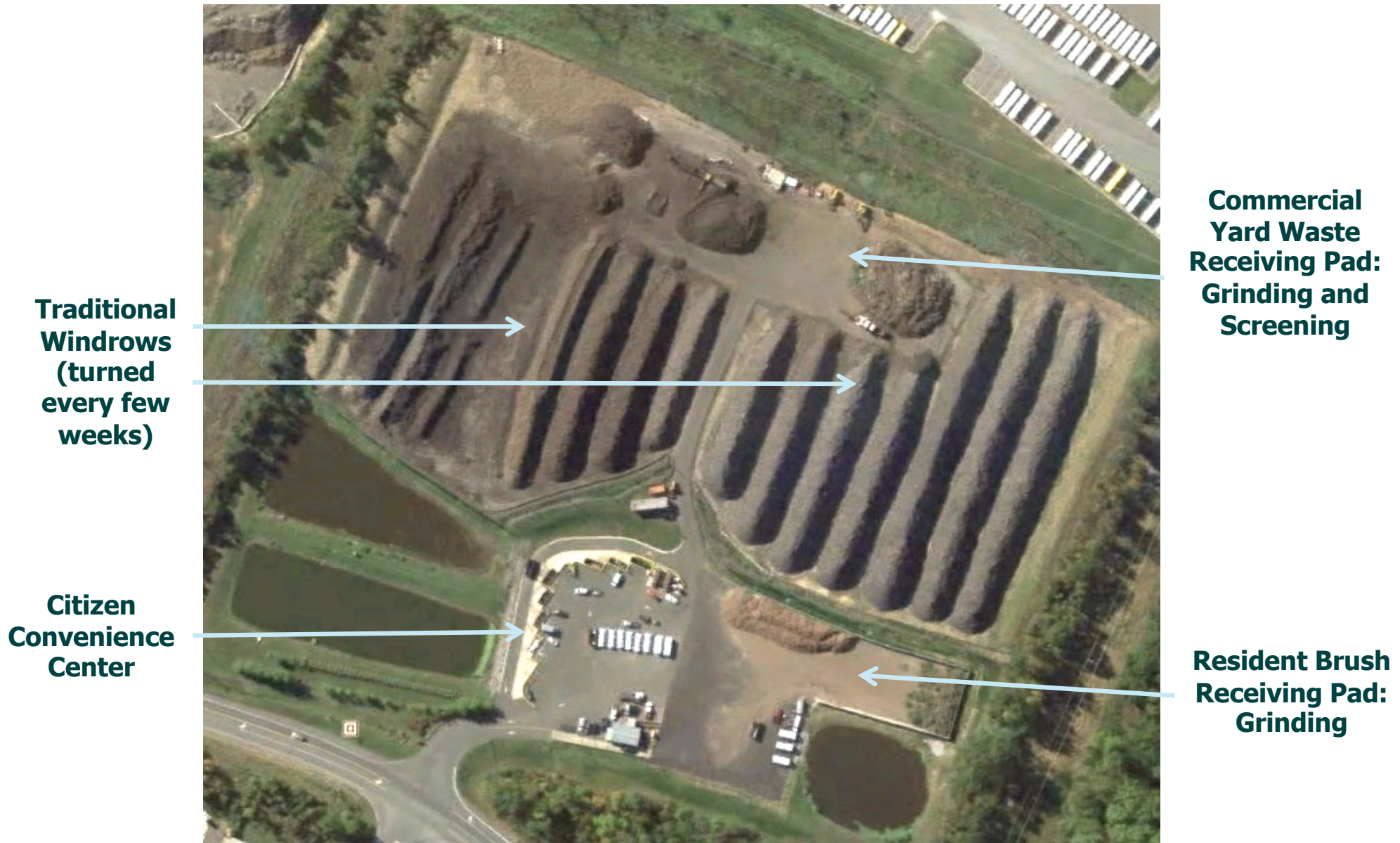
September 19, 2019

Key Project Information



<p><u>Phase 1</u></p> <p>Advanced Aerated Compost System</p>	<ul style="list-style-type: none"> ✓ Expansion of throughput capacity from 35,000 tpy of yard and wood waste (via traditional composting and mulching) to 88,000 tpy of food, yard, and wood waste (via advanced aerated composting and mulching) ✓ Permitted for and capable of handling up to 20,000 tons per year of mixed post-consumer food waste 	
<p><u>Phase 2</u></p> <p>Anaerobic Digestion System</p>	<ul style="list-style-type: none"> ✓ Additional 80,000 tons per year food waste via anaerobic digestion ✓ Installation of 1 MW biogas-fueled combined heat and power (CHP) generator to provide electricity and heat for the facility, with excess electricity sold to grid ✓ Additional biogas likely to be cleaned and injected into natural gas pipeline ✓ Controlled environment agriculture (CEA) in repurposed shipping containers with CO₂ injection for increased yields 	

Legacy Operation Balls Ford Site – Manassas, VA



**Traditional
Windrows
(turned
every few
weeks)**

**Commercial
Yard Waste
Receiving Pad:
Grinding and
Screening**

**Citizen
Convenience
Center**

**Resident Brush
Receiving Pad:
Grinding**

Future Operation Integrated Freestate Site Plan



Construction Status: Advanced Aerated Composting System





Thank You!

Chief Executive
Douglas Ross

www.freestatefarmsva.com