Sustainability in Facilities Management

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About Old Dominion

- Old Dominion University
  - State-assisted, doctoral research institution
- Locations
  - Main campus in Norfolk, Virginia
    - situated on more than 188 acres
    - bounded on one side by the Elizabeth River and on another side by the Lafayette River
    - Northern section of the campus has shaded brick walkways and stately buildings
    - Southern end of the campus features newer academic buildings which line an eight-acre lawn
  - University operates centers in Northern Virginia, Virginia Beach, Tri-Cities and on the Peninsula.

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Sustainability Initiatives

- The Facilities Management at Old Dominion University working to promote sustainability vision:
  - Minimize ecological foot print
  - Become a leader with other higher education institutions
- Outdoor & water-related sustainability initiatives
  - Sustainable landscaping
  - Smart irrigation
  - Indoor water efficiencies
  - Rain catchment & underground water storage
  - Waste management & awareness

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Sustainable Landscaping Practices

- Landscaping around low water requirements
  - Low maintenance, low water, plant pallet that is used for all landscape projects.
  - Bermuda sod used widely
    - Can survive during the drought months
    - Go dormant in extreme drought but recover once there is rainfall
    - Generally takes two years of irrigation to establish
    - Low water requirements for Established Plants
- Extensive mulching and related sustainable landscaping practices

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Why Smart Irrigation?

- Need Smart Irrigation that can minimize water and operational requirements
  - Flexible, controllable irrigation systems that are easy to use and manage
  - Based on weather system that replaces water lost through evaporation specific to a zone and landscape type
  - Rain gauges that keep system off when there is adequate rain fall

WeatherTRAK®
The proven leader in smart water management.

- Selected WeatherTRAK by HydroPoint Data Systems
  - Leading provider of Smart Water Management systems
  - Chosen based off four criteria: **Technology**, **Intellectual Property**, **Team Efficiency** and **Market Potential**

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Smart Irrigation: The Solution

- WeatherTRAK ET Pro2 Central
  - Installed 37 controllers in Norfolk, Portsmouth, Virginia Beach
- How it Works
  - Zones through out Grounds are established with the controller and scheduling engine
  - HydroPoint Climate IQ Center delivers weather data to the controller
  - WeatherTRAK ET Everywhere automatically schedules irrigation based on smart evapotranspiration (ET) to address landscape needs and local weather conditions
- WeatherTRAK.net
  - Centralize tool that shows visibility into the whole system
  - No standalone PC - all information maintained in the cloud

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Achieving Operating Efficiencies

- Operational efficiency
  - Able to manage the system from the internet or smart phones, minimize travel time
  - Customizable alerts

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WeatherTRAK Savings on Water & Water-Related Costs

- Plant Management
  - Eliminates landscape over/under watering, increasing plant health
- Risks & Damage
  - Reduce hardscape damage from overwatering
  - Lower slip/fall damage from wet areas
- Sustainability Impacts
  - Reduces water runoff that would enter the urban storm drain system
  - Reduces irrigation water consumption

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