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PUBLIC POLICY

CENTER FOR GLOBAL  
SUSTAINABILITY



Maryland  
Department of  
the Environment

# Solar Photovoltaic Systems Recovery, Reuse, and Recycling

Working Group Meeting  
May 23, 2024

# Agenda

- Introduction to research team
- Statutory requirements for report

# Research Team

University of Maryland, School of Public Policy  
Center for Global Sustainability



Dr. Kathleen Kennedy



Bradley Phelps



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Dr. Steve Smith

Johns Hopkins University, Whiting School of Engineering  
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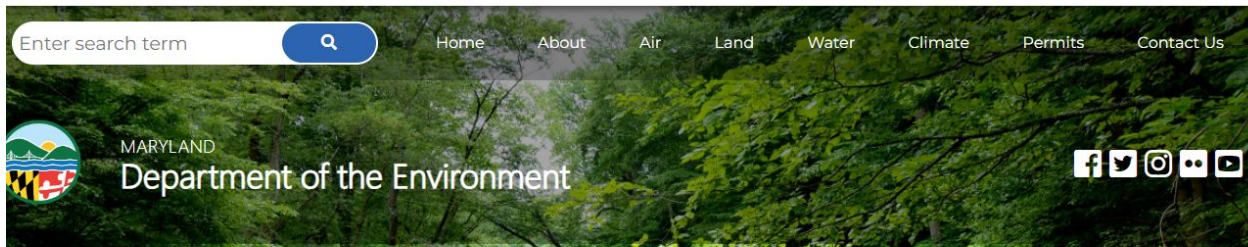


Dr. Susanna Thon



Sreyas Chintapalli

# Statutory Requirements under CSNA



Climate Change Home

Commission Annual Report

Annual Climate Change Reports

Adaptation and Resiliency Working Group

Education, Communication, Outreach Working Group

Energy Industry Revitalization Working Group

Energy Resilience and Efficiency Working Group

## The Solar Photovoltaic Systems Recovery, Reuse, and Recycling Working Group

The **Photovoltaic Systems (PV) Working Group** was created by the **Climate Solutions Now Act**. The working group will focus on options for recycling or reusing solar panels.

The Working Group will:

- Review solar photovoltaic systems currently used in the state, including:
  - Examining the expected economically productive life cycle of the systems;
  - Reviewing the materials that are used, have been used, or may be used in PV systems sold in the state,
    - including identifying materials that can be recycled or that

### Members

### 2024 Meetings

*Meetings generally will be held monthly on Mondays from 1-3 p.m. virtually. Dates and times are subject to changes. All meetings are open to the public and time is set aside at each for public comments.*

*Use this [Google Meetings link](#) each month:*

# Statutory Requirements under CSNA

- Review solar PV systems currently used in the state:
  - number of systems in use
  - expected life cycle
  - materials used (what is recyclable, what is hazardous)
  - potential impacts of disposal on the state's landfills
  
- Review best practices for managing end-of-life solar PV systems:
  - reuse
  - recycling
  - safe disposal in solid waste landfill
  - safe disposal of hazardous waste components
  
- Review other end-of-life programs for PV systems
- Identify relevant recent studies

# Statutory Requirements under CSNA

- Comparisons with other forms of energy generation
  - Analysis of end-of-life cost impacts on ratepayers
  - Life-cycle environmental impacts of end-of-life scenarios
  - Environmental and economic benefits of energy generation
- Recommend financing mechanisms that support a circular economy for PV systems
- Analyze if financing mechanisms are necessary to ensure proper end-of-life management
- Examine and recommend the infrastructure needed for transporting end-of-life solar photovoltaic modules for reuse, refurbishment, recycling, or disposal.

# Report timeline

- Provide a progress report to the working group with preliminary results on **August 19th**
- Deliver a report that covers the statutory requirements to the working group by **November 15th**



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# Thank you!

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