



## **Balancing Agriculture and Solar Committee Statements**

**STATEMENT: A Solar Project Scorecard should be developed as a prerequisite for utility-scale solar applicants.**

- The scorecard should require a minimum threshold score, prioritize long-term soil health, and encompass the entire solar project area including both the array zone and surrounding buffer areas.
- Scoring emphasis will be placed on vegetative management and agricultural impact mitigation strategies that incorporate the appropriate use of deep-rooted native plant systems, habitat and wildlife corridors, stormwater capture and infiltration, soil compaction avoidance, minimization of disturbance to existing soil profile and innovative Agrivoltaics strategies.

**STATEMENT: A minimum solar panel height of 32" for the array zones should be required.**

- The panel height requirement is necessary to maximize the diversity of native plant species, reduce on-site maintenance needs, enable sufficient infiltration of stormwater and ultimately maintain a healthy soil ecosystem prepared for future agricultural production.
- The likelihood of maintaining or improving long-term soil health throughout the life of the project is highly reliant on a robust and diverse ecosystem of deep-rooted native perennial vegetation.

**STATEMENT: A Vegetative Management Plan should be submitted as a required document.**

- Primary components of the plan should include at a minimum: specified threshold for diversity of native plant species, limits on use of non-native species and a corresponding maintenance plan. The intent of the maintenance plan is to promote a high likelihood of plant stand persistence and habitat development through the use of recognized establishment and maintenance practices for native plant communities.
- It should also include a weed and pest management component that describes selected herbicides and/or insecticides, application methods, and avoids products and practices detrimental to wildlife, pollinator habitat and aquatic systems.

**STATEMENT: An Agricultural Impact Mitigation Plan should be submitted as a required document.**



- Primary components of the plan should include at minimum: drain tile survey and mitigation, pre and post soil health analysis, long-term soil health monitoring, compaction avoidance, detailed narrative discussing surface grade changes, site stabilization, and stormwater management methods to be implemented both during and after construction.
- Mass grading is incompatible with the current solar ordinance as restoration to pre-construction surface grades and soil profile appears unreasonable and highly unlikely.
- Changes to existing surface grades (cut and fill) should be limited to 12 inches or less to avoid unnecessary soil compaction and disruption to the existing soil profile, maintain opportunity for future agricultural productivity at current levels, and lessen the likelihood of negative impacts to offsite natural resources and properties.

**STATEMENT: A Wildlife / Habitat Assessment and Mitigation Plan should be submitted as a required document.**

- Primary components of the assessment should include at minimum: protection or creation of wildlife corridors including 300 feet of separation from roadways, consideration for established migration patterns, emphasis on habitat segmentation avoidance, and allowance for wildlife movement into and through array zones via wildlife friendly perimeter fencing designs.
- A fenced-off array area should be limited to a maximum of 160-acres before establishment of a wildlife corridor is required. Fencing through drainageways should be prohibited as they serve as established wildlife corridors.
- Threatened and Endangered species avoidance should be highly weighted within the scorecard.

**STATEMENT: A Stormwater Management Plan, Stormwater Pollution Prevention Plan and Erosion and Sediment Control Plan should be submitted as a required document.**

- Stormwater Management Plan should be designed for reduction and elimination of compacted soils, greater soil depth, establishment of native deep rooted vegetated ground cover and increased gap between panels rows for greater infiltration opportunity.

**STATEMENT: A Woodland Inventory, Avoidance and Mitigation Plan should be submitted as a required document.**

- The current tree removal ordinance language is vague and inadequate for effective woodland protection of desirable trees or forest.
- The woodland inventory should include the species, location, number and maturity of trees or forest within the project area.
- Alternative mitigation strategies may be considered if identified desirable trees must be removed.

**STATEMENT: The solar applicant should be required to submit an annual project performance report regarding the effectiveness of the vegetation, habitat, agricultural impact, and stormwater management plans.**

- The county should designate the employee/department responsible for review and approval of the performance report. That employee/department should have enforcement authority over the project and predetermined recourse if performance standards are not being met.

**STATEMENT: The solar project signage ordinance should be amended to allow for “educational / informational” signage in areas designated for pollinator protection, Agrivoltaics, and wildlife habitat corridor protection areas.**

**STATEMENT: A Disaster Management Plan should be submitted as a required document.**

- It should outline specific procedures should the project site be impacted and require mitigation steps in order for future agricultural production to remain viable.

### **Balancing Agriculture & Solar Committee Research/Sources:**

#### **Solar/Agricultural consultants invited to join the committee meetings:**

Brian Ross AICP, LEED GA  
Vice President, Renewable Energy  
[Great Plains Institute](#)

Colleen Hollinger  
[Director, Business & Industry Development](#)  
[Natural Resources Services](#)

Rob Davis  
[Communications Lead](#)  
[Connexus Energy](#)  
Chair of National Renewable Energy Lab’s InSPIRE study into low-impact solar

Mike Rettinger  
[Rights-of-Way & Energy Program Manager](#)  
[Pheasants Forever](#)

#### **Solar Scorecard Research**

- [Pollinator-Friendly Solar Scorecards](#)
- [Pollinator-Friendly Solar Scorecard Study Results](#)
- [Can Solar Energy Fuel Pollinator Conservation?](#)
- [Habitat Friendly Solar Site Assessment Form for Established Plantings \(After Year 3\)](#)
- [Indiana Solar Site Pollinator Habitat Planning Scorecard](#)

- [Virginia Pollinator-Smart Bird Habitat Scorecard](#)
- [Maryland's Initial Solar Site Pollinator Habitat Planning and Assessment Scorecard](#)
- [Illinois DNR Solar Site Pollinator Scorecard](#)
- [Fresh Energy: Pollinator Friendly Solar Scorecard](#)
- [Michigan Pollinator Habitat Planning Scorecard for Solar Sites](#)
- [Missouri Pollinator Habitat Planning Tool for Solar Sites](#)
- [Ohio Solar Site Pollinator Habitat Planning and Assessment Form](#)
- [Northern California / Oregon Pollinator Friendly Solar Scorecard](#)
- [EPRI Pollinator Friendly Solar Scorecards: Comprehensive Analysis of Scorecard Attributes](#)
- [EOR / Great Plains Institute Scorecard Research Question #3](#)

### **Agrivoltaics Research**

- [Solar Grazing Checklist for Shepherds and Solar Site Managers](#)
- [Solar Grazing FAQ](#)
- [Emerging Agrivoltaic Regulations and Contractual Considerations: A Review of Solar Grazing](#)
- [Developing Conservoltaic systems to support biodiversity on solar farms](#)
- [Agrivoltaics: Coming Soon to a Farm Near You? | USDA Climate Hubs](#)
- [InSpire Agrivoltaics Map](#)

### **Stormwater Management on Solar Projects Research**

- [Brian Ross Presentation slides / The Solar/Water Nexus: Solar Stormwater](#)

### **Vegetative Management Research**

- [USDA Iowa Native Prairie Planting Guide](#)
- [Overview of Pollinator Friendly Solar Energy](#)
- <https://fresh-energy.org/toolkit>
- [Solar PV and the Importance of Asking for High Performance Ground Cover](#)
- [Guidance for Developing a Vegetation Establishment and Management Plan](#)
- [Vegetative Management Plan: Tobacco Valley Solar Project; Simsbury Connecticut](#)
- [Vegetation Management Plan: Hoot Lake Solar; Otter Tail County, Minnesota](#)
- [Rethinking Acreage and Rural Tree Plantings](#)
- [Feasibility of Co-locating Solar PV and Pollinator Habitat](#)

### **Wildlife & Habitat Management Research**

- [Windbreaks for Wildlife](#)
- [Minnesota Habitat Friendly Solar Program](#)
- [Making Solar Wildlife Friendly](#)
- [Principles of Low Impact Solar Siting and Design](#)
- [USDA Conservation Buffers](#)

## **Agricultural Impact Mitigation Research**

- [Environmental and Social Considerations of Land Conversion to Solar Generation](#)
- [USDA Conservation Practice Standard: Soil Carbon Amendment](#)
- [Considerations for Transferring Agricultural Land to Solar Panel Energy Production](#)

## **Solar Zoning/Land Use Research**

- [Planning & Zoning for Solar Energy Systems: A Guide for Michigan Local Governments](#)
- [Land Use Considerations for Large-Scale Solar](#)
- [Brian Ross You Tube Presentation: Planning and Zoning for Solar Energy](#)