REQUEST FOR COMMITTEE ACTION

HENDERSON COUNTY

TECHNICAL REVIEW COMMITEE

MEETING DATE: September 18, 2012

SUBJECT: Major Site Plan Review

PRESENTER: Toby Linville

ATTACHMENTS: Staff Report

SUMMARY OF REQUEST: Major site plan review for a Solar Energy

Generation Facility.

Suggested Motion: I move that the TRC recommend approval of the major site

plan for Innovative Solar 7, LLC on Jackson Rd.



1. Board Request

- 1.1. **Applicant:** Innovative Solar 7, LLC
- 1.2. Request: Major Site Plan Review for a Solar Energy Generation Facility
- 1.3. **PIN:** 9662-07-7984
- 1.4. **Size:** 15 acres +/-
- 1.5. Location: The subject area is located at 215 Jackson Road in Fletcher, NC
- 1.6. Supplemental Requirements:

SR 9.9. Solar Energy Generation Facility

- (1) Site Plan. Major *Site Plan* required in accordance with §200A-299 (Major Site Plan Review). The site plan shall include ground level profile drawings of the typical structures proposed and the designed wind and ground snow loads.
- (2) Dust Reduction. Unpaved *roads*, *travel ways* and/or parking areas shall be treated to prevent dust from adverse affects to adjacent properties.
- (3) Perimeter Setback. All structures and components shall be a minimum of twenty (20) feet from property lines. Necessary ingress and egress for vehicles and utility & transmission lines may be located within the perimeter setback. Fences may be placed within the perimeter setback.
- (4) Height. Systems, equipment and structures shall not exceed twenty-five (25) feet in height when ground mounted. Roof mounted systems shall not exceed the maximum height for the applicable zoning district.
- (5) Screening. Screen Class One (1), Two (2), Three (3), or Four (4) shall be provided along sides of the facility which are adjacent to a residential use (as identified in Section 1 of 200A-62, Table of Permitted and Special Uses) on a separate parcel, consistent with 200A-182 (Screen Classification). Where screening is required, screening shall be placed on the exterior side of fencing. Buffer Requirements, as specified by Article V Subpart A, shall not apply to Solar Energy Generation

Facilities unless the Solar Energy Generation Facility is not permitted in the zoning district adjacent to the site.

- (6) Scenic Byways. Solar energy Generation Facilities shall not be permitted on sites visible from Scenic Byways as designated by the North Carolina Department of Transportation or Henderson County.
- (7) Security. Solar Energy Generation Facilities shall be completely enclosed within:
- a. a woven wire fence; or
- b. a masonry wall; or
- c. a wooden fence that contains spacing no greater than six (6) inches.

Such fences shall be at least six (6) feet in height.

- (8) Power Transmission Lines. To the extent practical, all new power transmission lines to any building, structure or utility connection shall be located underground. Existing above ground utility lines shall be allowed to remain in their current location.
- (9) Electrical Disconnection Switch. The electrical disconnect switch shall be clearly marked and unobstructed. Switches are permitted to be secured within a fenced area or building.
- (10) Wind and Snow Loads. All equipment and structures shall comply with the N.C. State Building Code requirements for survival wind speeds and ground snow loads for buildings. Although the N.C. State Building Code may require such load designs for only buildings, all structures and equipment associated with this use shall meet those same wind and snow load requirements. Note that such requirements vary based on the elevation and location of the site. The Zoning Administrator shall require a certification from a structural engineer, licensed in North Carolina as a professional engineer, stating the designed wind and snow load standards for equipment and structures have been constructed according to the State Building Code and will meet the following:
- a. Structures and buildings will meet a minimum wind survival speed of 90 m.p.h.; and
- b. Structures and buildings will meet a minimum snow load of 15 lbs. per square foot.
- (11) Principal Structure. A principal structure, other than the solar collectors, is permitted but not required.
- (12) *Special Flood Hazard Area*. No structures, equipment, storage or buildings shall be located within the *Special Flood Hazard Area*.
- (13) Lighting. Lighting Mitigation is required.

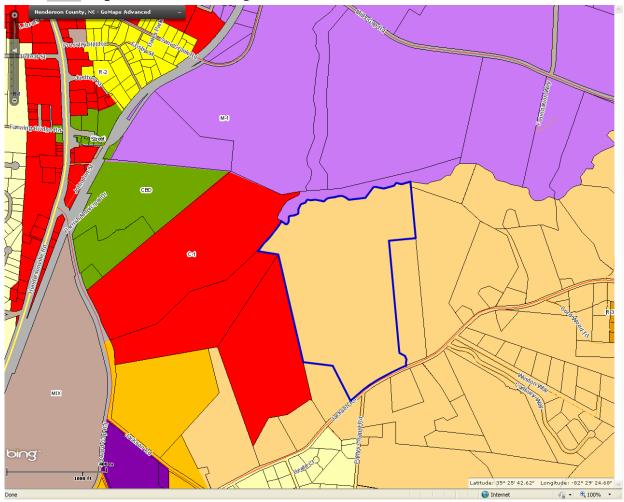
Map A: Aerial Photo



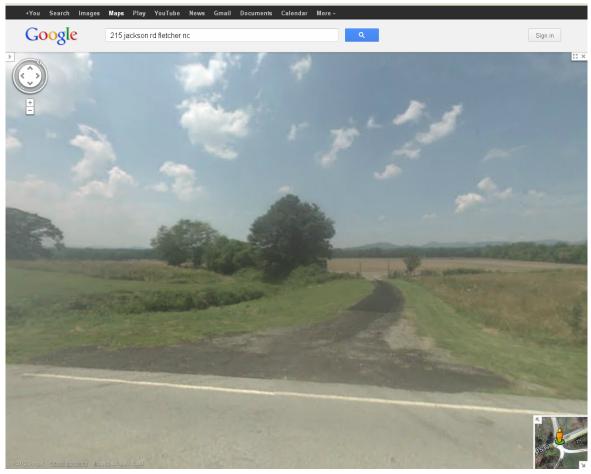
2. Current Conditions

- 2.1. **Current Use:** The property is currently in residential and agricultural use.
- 2.2. **Adjacent Area Uses:** The surrounding properties primarily consist of rural and recreational uses.
- 2.3. **Zoning:** The current and surrounding property to the north is located in the Town of Fletcher. It joins a golf course and Fletcher Park to the west zoned Fletcher C-1. Along Jackson Rd, the properties are zoned (R2R) Residential to Rural. The surrounding property to the east is split zoned the Town of Fletcher and R2R.

2.4. Map B: Current Zoning



2.5. Current Conditions –Looking North into property



Looking West towards barn and home



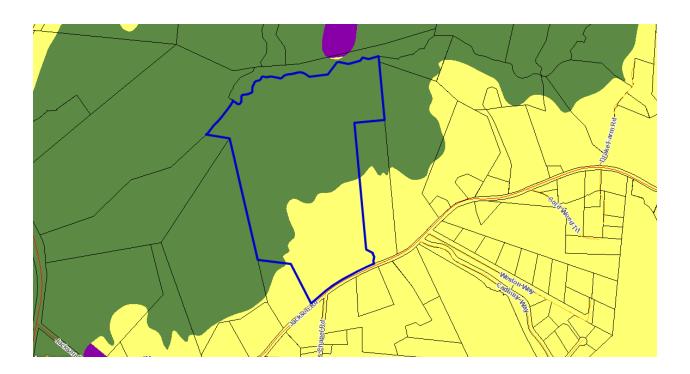
5. <u>Floodplain /Watershed Protection</u> -The property is located in a Special Flood Hazard Area zone AE. The panels will not be located in the SFHA.

6. Water and Sewer

6.1. **Public Water:** Utilities not required for this use.

6.2. **Public Sewer:** Utilities not required for this use.

Map C: CCP Future land Use Map



7. <u>Comprehensvie Plan</u>

The 2020 CCP: The CCP Future Land Use Map places the Subject Area split between "Conservation" and in the "Urban Service Area" classification. The text and map of the 2020 CCP suggest that the portion of the Subject Area that is in "Conservation" should include land areas that are intended to remain largely in their natural state, with only limited development. Such areas should be targeted for protection through regulations and incentives. Conservation areas are lands that generally include: Sensitive natural areas such as steep slopes, floodplains, major wetlands, forest reserves and wildlife conservation areas, and key watersheds, Areas of historic and archeological significance, local, state or federally managed natural areas, managed for agricultural or forestry land uses and other areas yet to be defined.

The remaining portion of the property located on the south end is located in the "Urban Service Area" classification. The text and map of the 2020 CCP suggest that the Subject Area would be suitable for high-density residential, commercial or industrial development. The CCP indicates that the USA may be suitable for commercial

development provided the development is in keeping with the surrounding community.

8. Staff Recommendations

8.1. Staff's position at this time, under the guidelines of current plans, policies and studies, is to approve the major site plan because it is consistent with the current surrounding land uses and future land use recommendations.

