

SHADOW CASTE ON RESIDENTIAL SOLAR IN TN

Towards Clean Energy Equity: Overcoming
Racial Disparities

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Kleinman Center for Energy Policy

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Caste: An artificial
construction...a hierarchy
favoring the dominant
caste..

(From *Caste: The Origins of Our Discontents* by Isabel
Wilkerson)

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ABOUT ME

Nashville

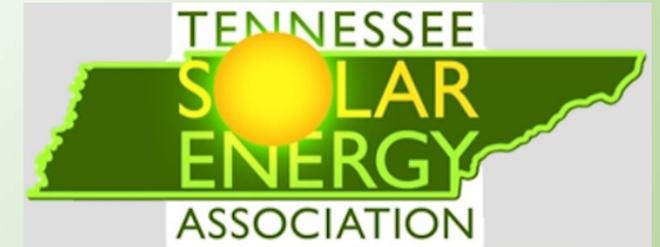
BSME

M. A. Civic Leadership

Co-Minister of OHB church of Christ

President of Tennessee Solar Energy Association

Founder of Energy Electives



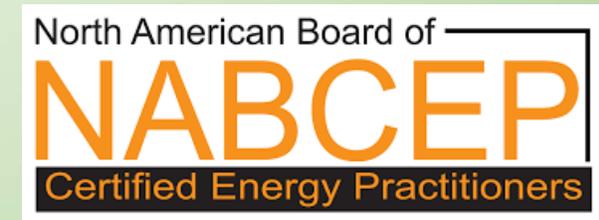
Professional Certifications

LEED AP

NABCEP

BPI

PEM



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The Dominant Caste: The Tennessee Valley Authority (The TVA)

TVA is the nation's largest public power utility.

Generates and transmits electric power to 9 million people.

TVA sells electricity to 154 local power companies and 58 directly served industries and federal facilities.

No PUC, Board appointed by POTUS



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The Artificial Construction: Solar Policy

SYSTEMS WITH > 500,000 CUSTOMERS	2019 W/C
DUKE ENERGY PROGRESSS	1,755
DOMINION ENERGY SC	807
DUKE ENERGY CAROLINAS	585
GEORGIA POWER	533
TAMPA ELECTRIC	428
SOUTHEAST AVERAGE	325
FLORIDA POWER & LIGHT	265
OGLETHORPE POWER	186
DUKE ENERGY FLORIDA	155
TENNESSEE VALLEY AUTHORITY	99
NC ELECTRIC COOPERATIVES	62
ALABAMA POWER	59
SEMINOLE ELECTRIC CO-OP	34
SANTEE COOPER	31

SYSTEMS WITH > 500,000 CUSTOMERS	2023 FORECAST
DUKE ENERGY PROGRESSS	2,718
TAMPA ELECTRIC	1,827
DOMINION ENERGY SC	1,809
GEORGIA POWER	1,435
DUKE ENERGY CAROLINAS	887
FLORIDA POWER & LIGHT	839
SOUTHEAST AVERAGE	819
DUKE ENERGY FLORIDA	722
SANTEE COOPER	664
OGLETHORPE POWER	550
ALABAMA POWER	395
TENNESSEE VALLEY AUTHORITY	303
SEMINOLE ELECTRIC CO-OP	301
NC ELECTRIC COOPERATIVES	98

Source: 'Solar in the Southeast' by Southern Alliance for Clean Energy



The Artificial Construction: Solar Policy

TENNESSEE VALLEY AUTHORITY

In 2019, TVA released an IRP promoting “up to” 14 GW, or 14,000 MW, of solar over the next 20 years. Despite these exaggerated and misleading claims, the actual plan for solar in the Tennessee Valley significantly trails the other comparably-sized utility systems in the region.

Source: ‘Solar in the Southeast’ by Southern Alliance for Clean Energy

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The Artificial Construction: Residential Solar Policy

Premium Paid by TVA Above Retail

12 cents – until 2012

9 cents – in 2013

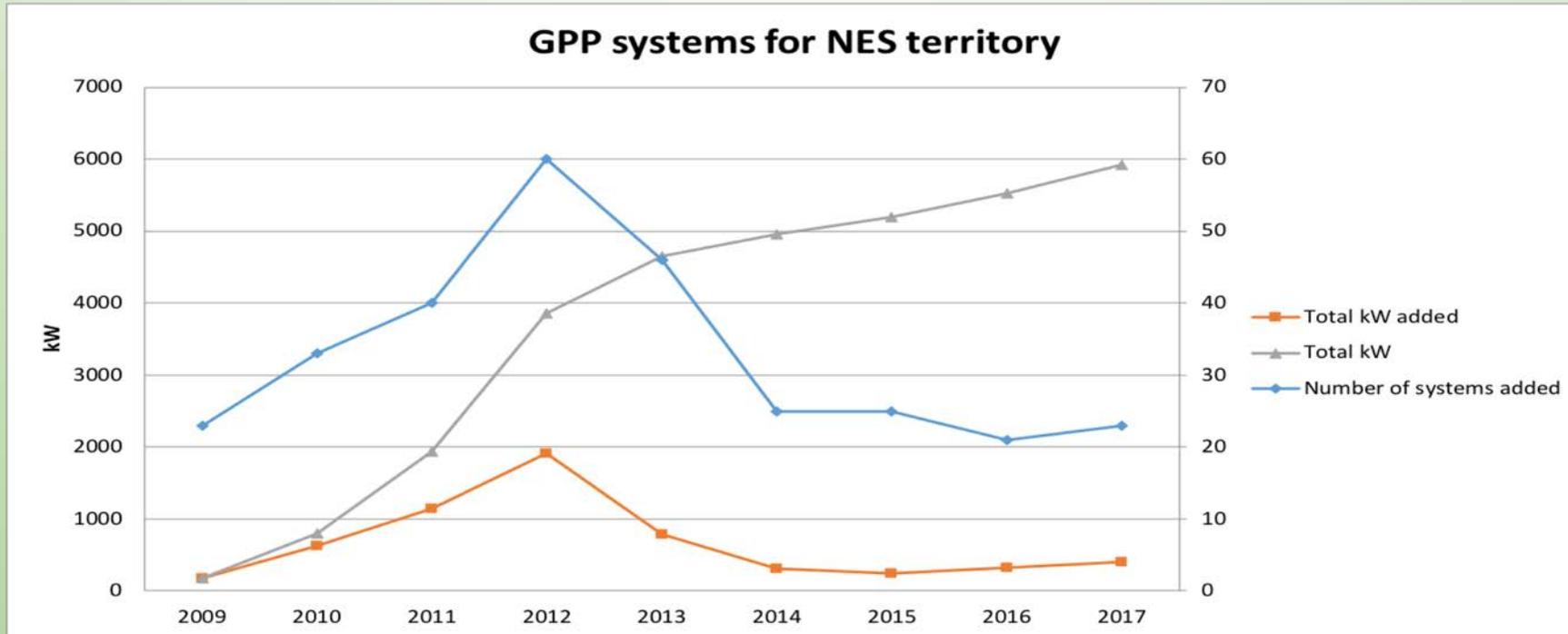
2 cents – in 2015

0 cents – in 2017 (net metering)

No residential program in 2020



The Artificial Construction: Residential Solar Policy



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The Artificial Construction: The Results

Demographics of TN Solar Worker

	<u>2015</u>	<u>2019</u>
Women	20.3%	31.7%
African Americans	0%	7.4%
Latino or Hispanic	2.2%	7.2%
Asian	2.2%	0.2%

Source - The Solar Foundation: Solar Jobs Census



The Artificial Construction: The Results

Even when controlling for income and homeownership, African-Americans do not adopt solar at the same rate as white.

~Dr. Deborah Sunter, Tufts University

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The Artificial Construction: The Results

ACEEE - 36% of Black households (6.0 million) experience a high energy burden (above 6%).

Nashville's 37207 – Cities Highest energy burden

Nashville's 37208 – Nations most incarcerated

Memphis – Nations highest energy burden



Lifting the Shadow: WCHS

<http://energyelectives.com/wchs/>



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Lifting the Shadow: WCHS



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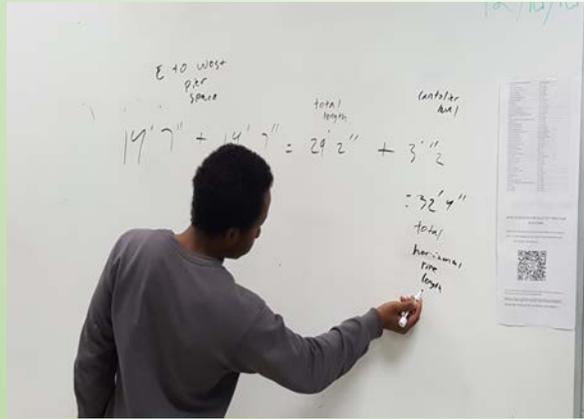
Lifting the Shadow: WCHS



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Lifting the Shadow: WCHS



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Lifting the Shadow: WCHS



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Lifting the Shadow: WCHS

- **13.2 kWdc**
- **40 panels – 330W**
- **Overhead distribution**
- **Fronius 11.4 kW Inverter**



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Lifting the Shadow: ENERGY ELECTIVES & TSEA



Energy Efficiency



Solar PV



Advocacy

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Lifting the Shadow

NPR - <https://www.npr.org/2019/07/23/741952615/stepping-into-the-sun-a-mission-to-bring-solar-energy-to-communities-of-color?fbclid=IwAR0dm7WhGws-ZUpoc0Li8oHbEwNvdhWiOTnIfvWjcxAIMSbonNMgeGFcRHs>

River Talks- <https://podcasts.apple.com/us/podcast/here-comes-sun-solar-energy-conversation-jason-carney/id1481985339>

SACE- <https://cleanenergy.org/blog/my-story-jason-carney-solarpv/>

<https://cleanenergy.org/blog/sace-staffer-makes-powerful-statement-on-energy-justice-at-naacps-17th-annual-legislative-day-on-the-hill/>



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Allowing the Sun to Shine

Better (& needed) policy

PACE legislation

Community Solar

PAYS financing

Round-It-Up

The Green New Deal



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Allowing the Sun to Shine

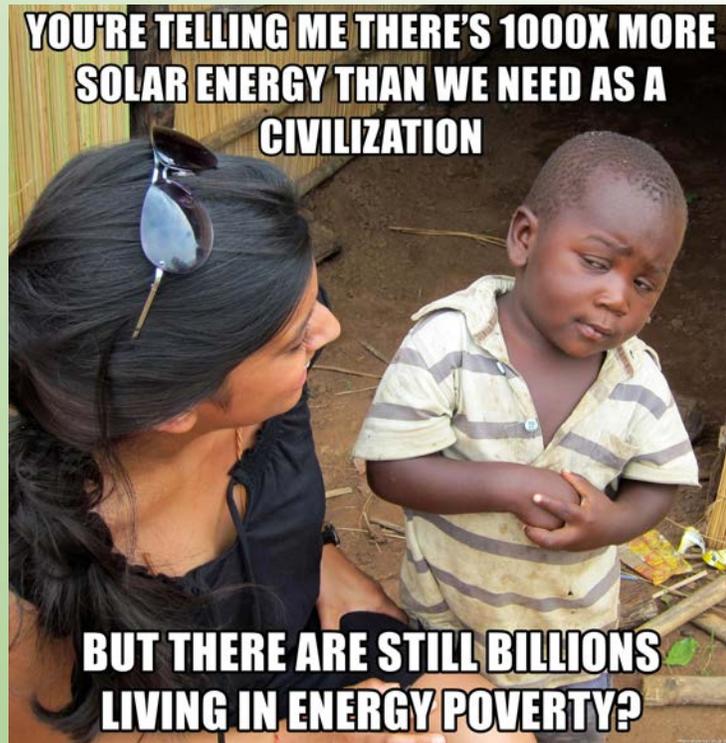
In a world without caste, we would all be invested in the well being of others in our species if only for our own survival, and recognize that we are in need of each other more than we have been led to believe.

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THANK YOU!

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