



THE NIGHT SKY



*Preserve our window to the universe
by limiting the use of excessive and
ineffective night lighting*

HUMANKIND HAS LOOKED UP TO THE STARS FOR ALL OF RECORDED HISTORY



LYME LAND TRUST CONTINUES IN THAT FINE TRADITION

Over 3,000 acres owned or under easement, with 52 trails open to the public.

Our dark skies are an integral part of our natural environment--- and so, we have designated the night sky as *Trail 53*.

www.lymelandtrust.org

Our Dark Skies - Lyme Land Conservation Trust

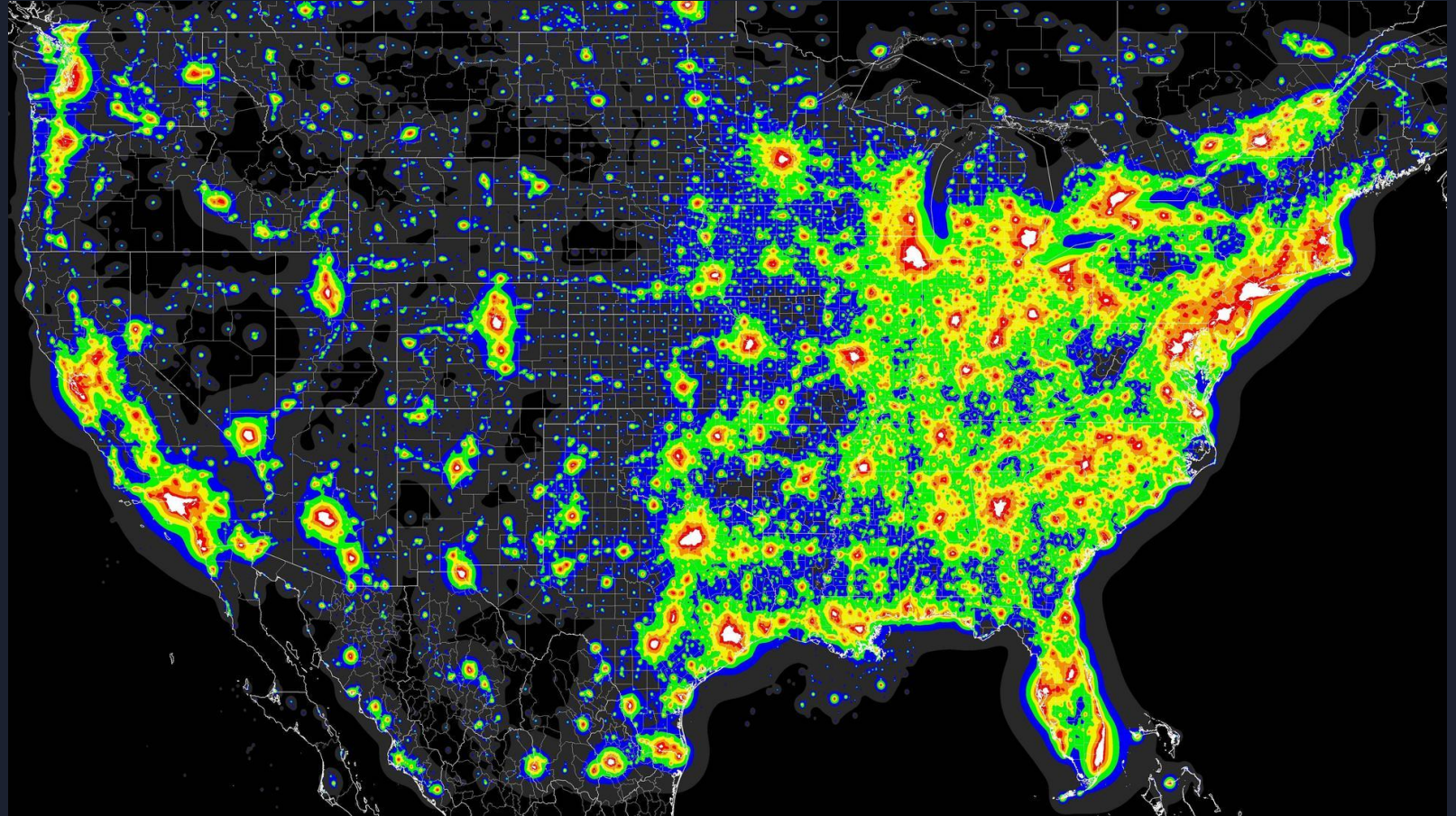
The screenshot shows the Lyme Land Trust website with a green header. The navigation menu includes: HOME, WHO WE ARE, WHAT WE DO (highlighted), PRESERVES, SUPPORT US, EVENTS, and EXPLORE. The 'WHAT WE DO' dropdown menu lists: LAND CONSERVATION, EDUCATION, STEWARDSHIP, NATIONALLY ACCREDITED LAND TRUST, LYME POLLINATOR PATHWAY, and ASTRONOMY AND DARK SKIES. Below the menu is a large image of a pond with trees and a 'Learn more!' button. The main content area features two columns: 'Tour de Lyme' (Sunday June 4, 2023, a fundraising event) and 'The Latest' (a list of events including Land Trust Building, a tour of the Nehantic State Forest Management Project, and Tuesday Treks at Thach and Selden Creek Preserves).

IN THE EASTERN USA, OUR LYME NIGHT SKY IS A
UNIQUE PORTAL INTO THE UNIVERSE

Lyme Land Trust
Dark Sky Site

Photo by Roger Charbonneau, Jr

BUT... LIGHT POLLUTION IS THE NORM IN THE
ENTIRE EASTERN HALF OF THE COUNTRY



OUR LOCAL SITUATION

Night lights satellite image



LLT Dark Sky Site

Night sky brightness map



LLT Dark Sky Site

CT dark skies for stargazing

Darkest



Brightest

Bortle scale -	1	2	3	4	5	6	7	8,9
SQM value -	22.0	21.99	21.9	21.7	20.5	19.5	18.9	18.4

Connecticut Dark Sky Parks & Places | Bortle Light Pollution Map | GO ASTRONOMY (go-astronomy.com)

We live in a unique 'hole' in the overwhelming glow of night lighting.

WE HAVE SOME MILKY WAY STRUCTURE



Lyme Land Trust
Dark Sky Site

Photo by Roger Charbonneau, Jr

WE ALSO HAVE SOME BRIGHT SKYGLOW



Lyme Land Trust
Dark Sky Site

Photo by Roger Charbonneau, Jr

RAISING AWARENESS

Young Lyme and Old Lyme
Scouts get hands-on time with
telescopes.



RAISING AWARENESS

Lyme Consolidated students learn about telescopes and the night sky.

Using a model sun, moon and earth, they experience a simulated solar eclipse in the classroom.



BRINGING IT HOME

A permanent observatory installation in Lyme, CT.

Monthly public viewing sessions showcase our dark sky, and also highlight the pockets of encroaching light pollution.



Lyme Land Trust
Dark Sky Site

THE LYME LAND TRUST DARK SKY SITE IS ON PRIVATE PROPERTY JUST EAST OF THE THACH PRESERVE

Thach Preserve

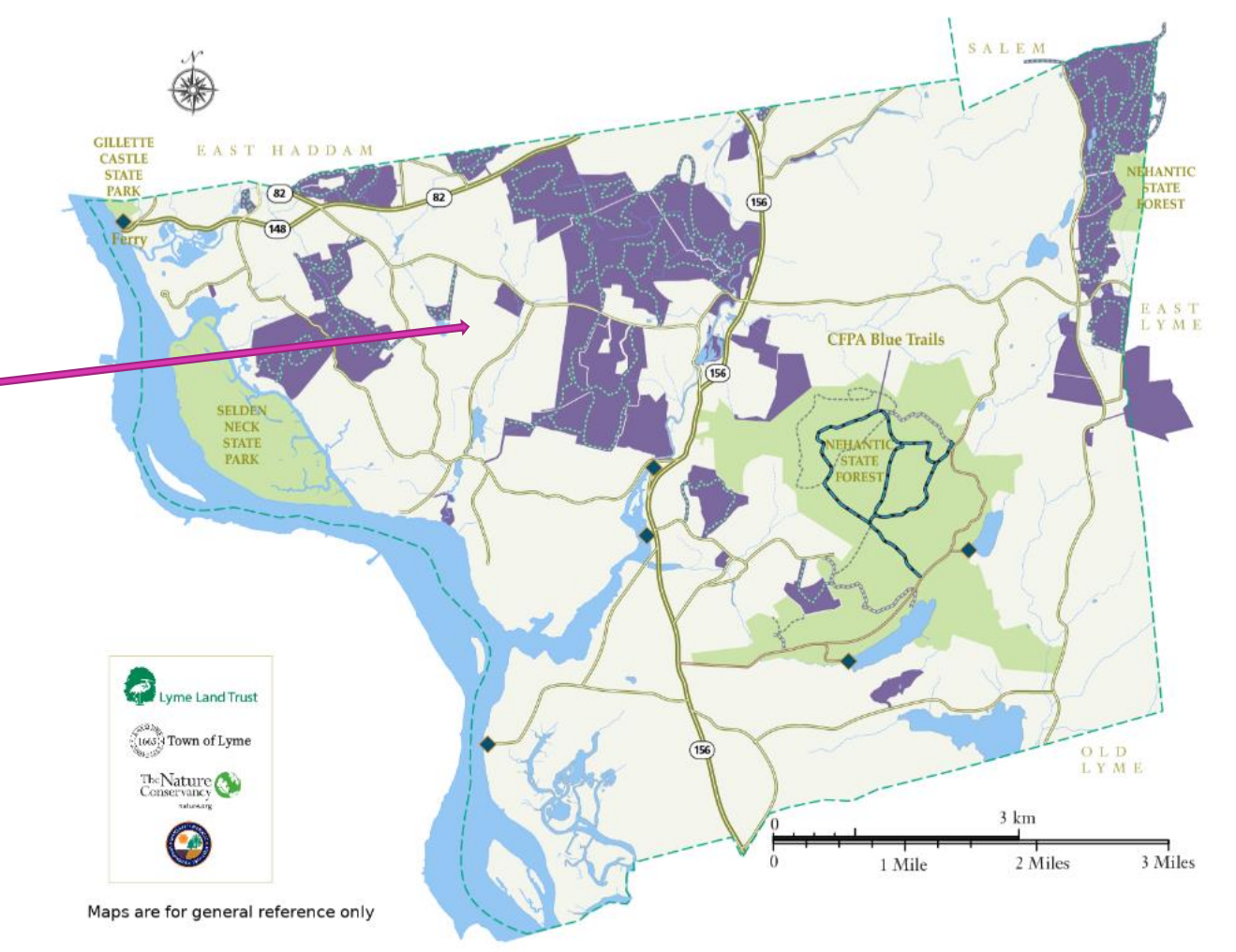


Thach Preserve: 13 acres. **Trails:** 1 mile (3 trails).

Parking: 131 Brush Hill Rd., short driveway to parking area.

[Detailed Trail Map and brochure.](#)

Description: This gem contains a variety of vibrant natural habitats in a 1-mile round trip walk over a rocky prominence to an active beaver pond that attracts an abundance of wildlife. A bench on an overlook and a picnic table by the beaver pond provide perfect picnic spots.



Map showing the location of the Thach Preserve (indicated by a pink arrow) relative to other landmarks in Lyme, CT, including Gillette Castle State Park, Selden Neck State Park, NEHANTIC STATE FOREST, and CFPA Blue Trails. The map also shows major roads (82, 148, 156) and surrounding towns (SALEM, EAST HADDAM, EAST LYME, OLD LYME).

Logos: Lyme Land Trust, Town of Lyme, The Nature Conservancy.

Scale: 0 to 3 Miles / 0 to 3 km.

Maps are for general reference only

TRAIL 53 OBSERVATORY

LOCATED AT THE DARK SKY SITE

Sessions are open to the public via registration at lymelandtrust.org

The public is welcomed to the site along a path of red lights that preserves their night vision.

Teaching about night vision increases awareness of how much we miss because of exposure to excessively bright lights.



Lyme Land Trust
Dark Sky Site

THE BEAST

The principal telescope affords wondrous views of the moon, planets, galaxies, star clusters and nebulae. Additional telescopes are set up all around the observatory.

Attendees experience the night sky with professional-grade equipment in a comfortable setting. All come away inspired.



Lyme Land Trust
Dark Sky Site

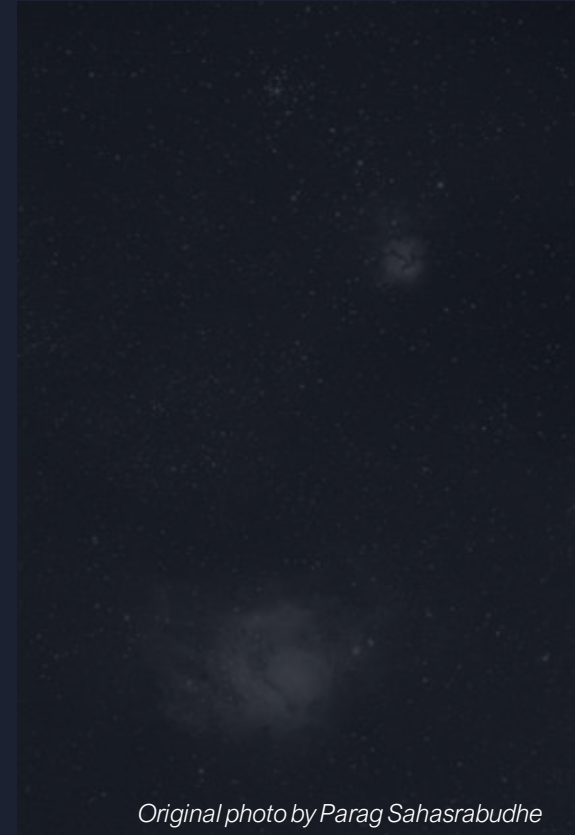
CAPTURING THE WONDERS IN THE NIGHT SKY

Our dark skies permit
astrophotographers to image
faint but beautiful natural objects
hanging out in and beyond our
home Milky Way.



Photo by Parag Sahasrabudhe

MANY OBJECTS CAN BE SEEN IN THE TELESCOPE



SAME OBJECTS CAPTURED AS ASTROPHOTOS



LONG EXPOSURE TIMES IN LIGHT-POLLUTED
SKIES WILL WASH OUT.



THE JOY OF FINDING



THE JOY OF RECORDING



TELL-TALE MARKER OF LIGHT POLLUTION

The Andromeda Galaxy is the closest and brightest galaxy in the northern hemisphere sky.

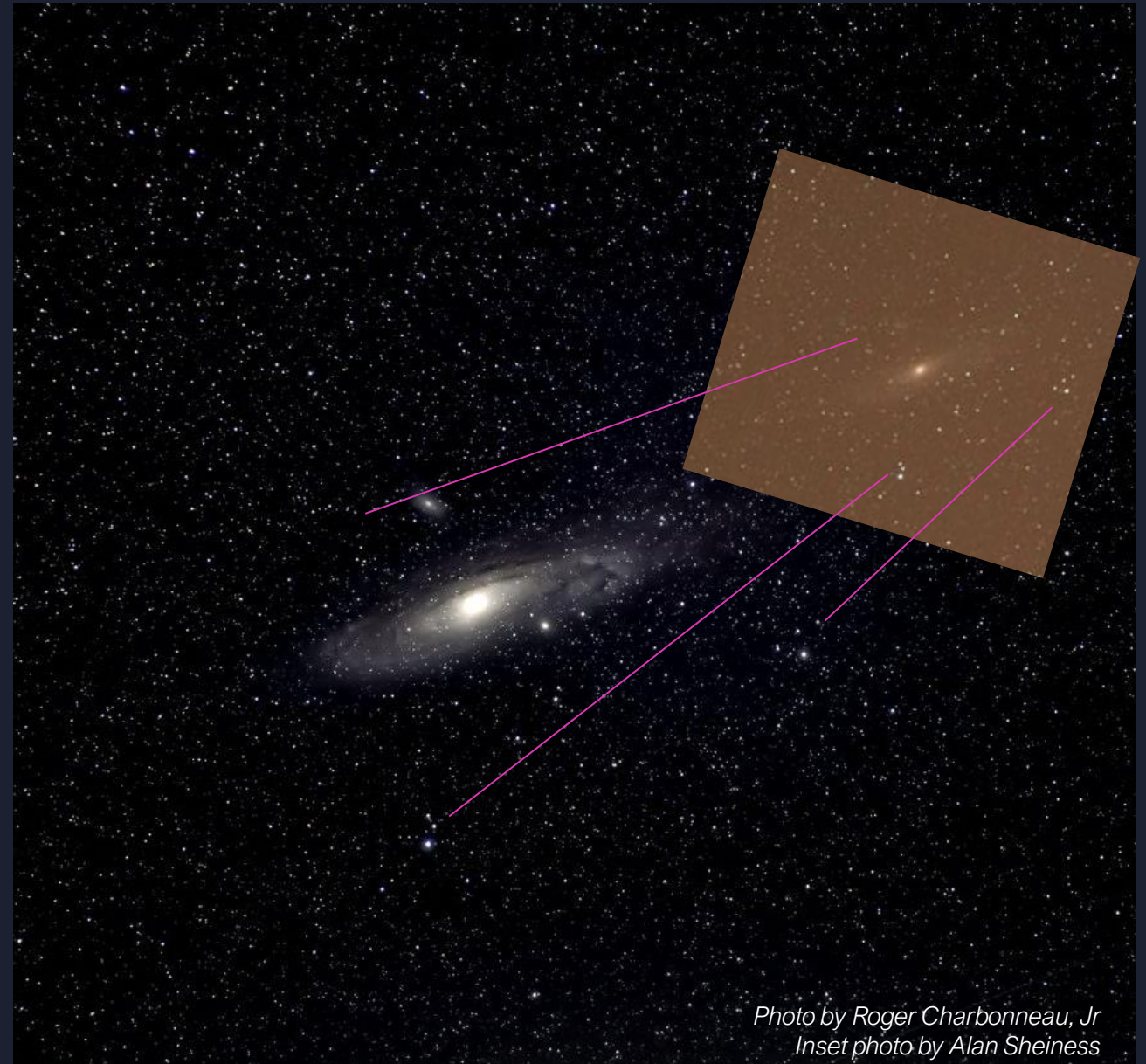


Photo by Roger Charbonneau, Jr

AND WHERE IS IT?

The bright image of Andromeda was taken recently here in Lyme, CT.

The inset image of the same galaxy was taken years ago in light-polluted skies in suburban New Jersey. (Could be even worse now!)



*Photo by Roger Charbonneau, Jr
Inset photo by Alan Sheiness*

SO... WHAT IS THAT SKYGLOW AND CAN IT BE REVERSED?



Lyme Land Trust
Dark Sky Site

Photo by Roger Charbonneau, Jr

THE NIGHT SKY IS OUR
PRECIOUS PORTAL TO
THE REST OF THE
NATURAL WORLD

Preserve this sacred window to the universe

Limit the use of excessive
and ineffective night lighting
at home
and in your home-town!



Photos by Alan Sheiness

LEARN MORE



www.lymelandtrust.org

<https://www.lymelandtrust.org/our-dark-skies/>

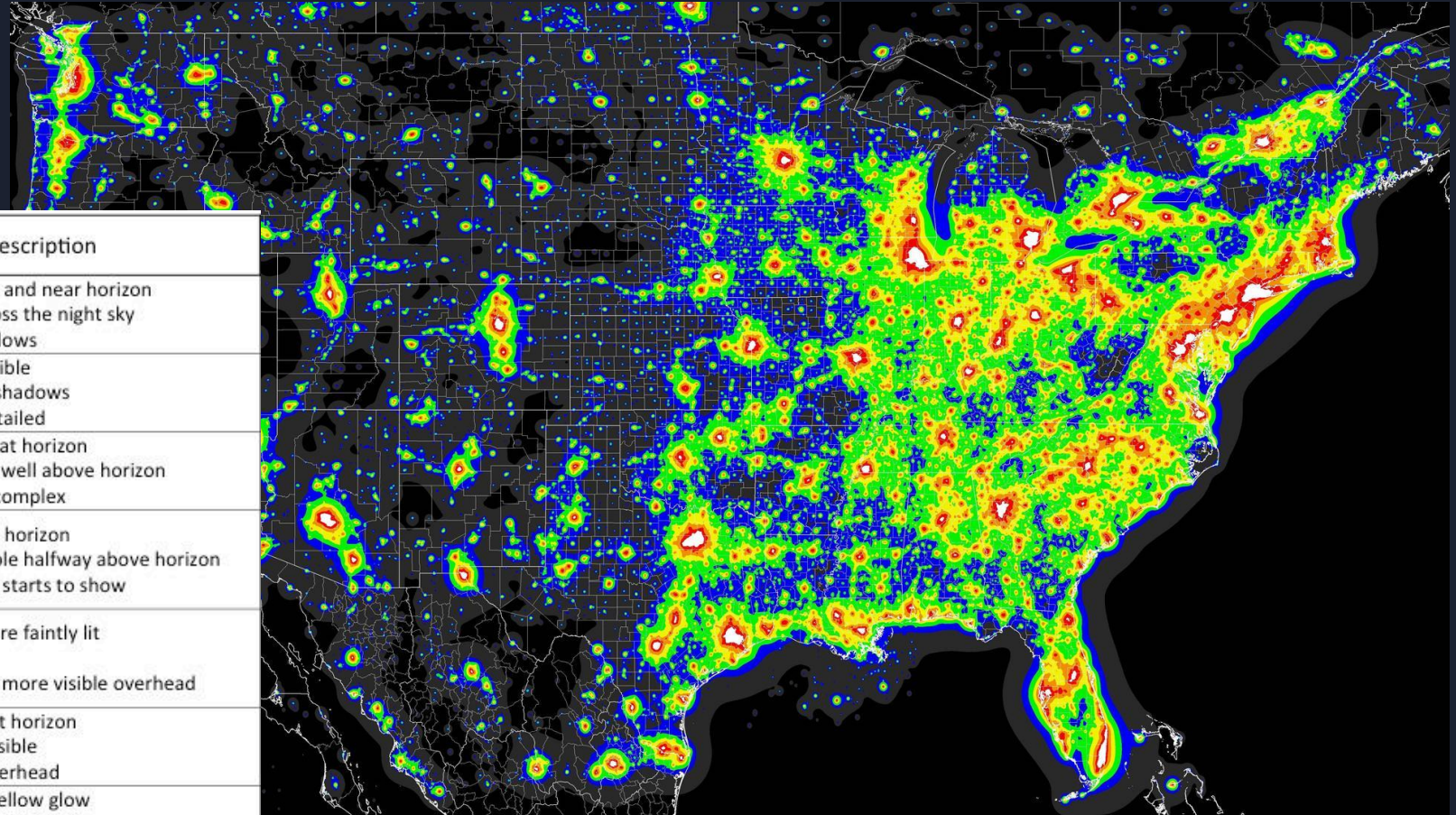
[LLT ASTRONOMY JOURNAL | @sheinessam | Flipboard](#)

[Total Eclipse of the Sun August 2017](#)



LIGHT POLLUTION IS THE NORM IN THE ENTIRE EASTERN HALF OF THE COUNTRY

Bortle Scale Number	Color on Map	Limiting Magnitude	Sky Type	Description
1		8	Excellent Dark Site	Airglow is very weak and near horizon Zodiacal Light is across the night sky Milky Way casts shadows
2		7.5	Dark Site	Airglow is weakly visible Zodiacal Light casts shadows Milky way is very detailed
3		7	Rural	Clouds are faintly lit at horizon Zodiacal light visible well above horizon Milky Way appears complex
4		6.5	Rural/ Suburban	Clouds are lit only at horizon Zodiacal Light is visible halfway above horizon Milky Way structure starts to show
5		6	Suburban	Clouds and ground are faintly lit Some Zodiacal Light Milky Way is slightly more visible overhead
6		5.5	Bright Suburban	The sky glows gray at horizon Constellations are visible Milky Way visible overhead
7		5	Suburban/ Urban	The sky has a gray/yellow glow Bright constellations are visible No Milky Way
8		4.5	City	The sky has an orangeish glow Brightest constellations are visible No Milky Way
9		4 at best	Inner-City	The sky has a bright glow Only bright stars are visible No Milky Way



The Milky Way is one of the give-aways for how much of the sky is being blocked by night lighting.