

# MONROE COUNTY ENVIRONMENTAL MANAGEMENT COUNCIL

March 20, 2024

## In Attendance:

### EMC

At Large - Tom Dooley; EMC Chair  
At Large - Deb Muratore  
Town of Chili - Larry Lazenby  
Town of Gates - Charles Johnson  
Town of Henrietta - Bill Santos  
Town of Honeoye Falls - Andy Less  
Town of Penfield - Cynette Cavaliere  
Town of Perinton - Mark Gaul  
Town of Pittsford - Caroline Kilmer  
Town of Riga - Greg Adams  
Town of Webster - Charles Zlotkus  
Ex Officio Alternate - Clement Chung; MCDES  
Ex Officio Alternate - Steve Olufsen; MC  
Planning & Development  
Ex Officio Alternate - Yasmin Guevera; MCDES  
Recording Secretary - Ryan Parra-Merrell

### Guests

Jessa Fisher- Presenter  
Madison Quinn - MCDES  
Loretta Morrell - FMCE  
Dick Spade  
Noelle Conderman – Irondequoit  
Conservation Board

## Meeting location:

- Monroe County Fleet Center, Building 1 Conference Room  
145 Paul Road, Rochester 14624

## Call to Order:

- Meeting was called to order at 4:01pm by Chairman Tom Dooley.

## Introductions:

- Introductions were made from all present

## Review of Minutes:

- Motion to approve February minutes by Cynette Cavaliere; seconded by Mark Gaul. All in favor; approved.

## Meeting Topic(s):

The 2024 Solar Eclipse

Jessa Fisher, Naturalist Educator with the Helmer Nature Center

- The Helmer Nature Center is part of the West Irondequoit School District.
- Monroe County will experience a total solar eclipse on April 8, 2024.

- There are different types of eclipses, which occur when the Earth, Sun, and Moon are aligned in different ways. This alignment is referred to as a syzygy.
  - Lunar: Occurs when the Earth moves between the Sun and the Moon. The shadow of the Earth (the umbra) falls on the Moon, causing a lunar eclipse during a full moon.
    - These occur 1-2 times a year, and usually a few weeks before a solar eclipse.
    - Red color is due to the refraction of sunlight around the Earth.
  - Solar: Occurs when the Moon moves between the Sun and the Earth.
    - A total solar eclipse is possible on Earth because the Sun and the Moon have the same apparent size in the sky; the Sun is 400 times larger than the Moon, but also 400 times farther.
    - Solar eclipses occur during the new Moon. Total solar eclipses can only be seen by those in the umbra, or direct shadow of the Moon. Those in the penumbra (portion of the Moon's shadow that doesn't completely obscure the Sun) will only see a partial eclipse.
  - Annular: A solar eclipse that occurs when the Moon is further away from the Earth than normal, so the Moon cannot completely cover the Sun.
- The last total solar eclipse in Monroe County was on January 4, 1925. The next won't occur until October 26, 2144. Some places in the world see solar eclipses more frequently.
- NASA can hindcast solar eclipses from the past several thousand years, as well as predict them into the future. However, they cannot be hindcasted or predicted for longer lengths of time because of the precession (or wobble) of the Moon.
- Historical records of eclipses go as far back as 2137 BCE in China. Ancient cultures from around the world came up with different myths to explain the phenomenon. They perceived eclipses as a "disappearing Sun" and imagined monsters or deities consuming it.
- The Moon's orbit around the Earth is inclined 5° relative to the Earth's orbit around the Sun, so not every new moon causes a solar eclipse. (Sometimes, the Moon is too high or low to fall directly between the Earth and Sun.)
  - Alignment that can cause a solar eclipse will occur twice a year, but at different points in the world.
  - Saros cycle – a period of roughly 18 years between similar eclipses.
- Monroe County's Solar Eclipse:
  - Once-in-a-lifetime occurrence for us.
  - Will begin at 2:07. It will take roughly an hour for the Moon to cover the Sun; totality begins at 3:20 and lasts 3 minutes.
  - Air temperature can drop by 10° F.
  - Nocturnal and crepuscular animals may become active as it becomes darker.
  - Effects will be observed even if the day is cloudy.
  - The sky will not appear as dark as it does at night, but closer to dusk. Planets and stars may become visible.
- Safety:
  - You must wear solar viewing glasses to view the eclipse directly for most of it.
    - Only safe to view directly during totality.
  - Do not point telescopes or cameras directly at the sun! These magnify the light.
  - Eclipse can also be viewed safely and indirectly using pinhole/optical projection.

### **Committee Reports:**

- **Program and Presentations**
  - Next meeting April 17, 2024 – Dr. Kristy Tyler, RIT – High Acres Nature Area
- **Nominating and Community Liaison**
  - Next committee meeting will be March 27.
- **Natural Resources**
  - Still awaiting GIS database.

### **Monroe County Staff Reports:**

- Steve Olufsen: Passed out safety tips and information regarding solar eclipse. Glasses as well as lifejackets recommended.
- Yasmin Guevera: Continuing to work on reports for permitted facilities and for food scraps program
  - Beginning to schedule events for the year after COVID hiatus.
  - Recycling plants have been finding more sharps than usual; these must be taken to EcoPark.
- Clem Chung:
  - The notice of intent for MS4 Operators to comply with the new General Permit was February 20, 2024.
  - Non-essential Monroe County staff have been asked to work from home on the day of eclipse due to the expected traffic volume. School districts other than Brighton will also have the day off.
- Madison Quinn: Had stakeholder meeting for Climate Action Plan. Draft should be ready around Earth Day, and schedule will be shared with EMC.
- Tom Dooley for Starr O’Neil:
  - Boil Water Notice sent out this week to areas supplied by the Highland Reservoir.

### **Other Business/Announcements**

- EcoPark open until 6:30 on Wednesdays.
- Jeff Meyers (RAC) sends thanks for joint meeting earlier this year.

### **Privilege of the Floor**

- Charles Johnson (Gates): Property owner has given approval for the Gates Farmer’s Market, and would like it ready by May. Also, Keep Gates Clean community service has cleaned up 123 bags worth of garbage since January 1.
- Cynette Cavaliere (Penfield): Penfield is havening an electric vehicle car show on April 20 for Arbor Day.
- Honeoye Falls-Lima School District having an Environmental Fair on March 27.
- Bill Santos: Monroe County Planning Board holding Capital Improvement Program vote tomorrow (3/21). Scout troops will be going to pick up parks on Earth Day.
- Water Education Collaborative – Money to update the H2O exhibit at the RMSC. Planning throughout 2024, and implementation in 2025.

### **Adjourn:**

Meeting was adjourned at 5:21.