

The Wayne Regional STEM Network 2023-24 Impact Report



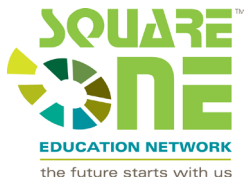
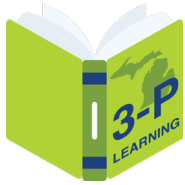
Wayne Regional STEM Network

- One of 16 MiSTEM regional sites across the State

3-P Learning

3-P Learning encompasses problem-, project- and place-based learning. These are student-centered approaches designed to engage learners through experiential learning.

- Components of 3-P learning are included in all initiatives
- County leadership attended PBL professional learning
- Leadership team developed county-wide 3-P support plan



Drone Competition

- Over 300 middle and high school students, 10 new schools added
- New curriculum to prepare students for FAA Pt. 107 drone pilot certification
- Teacher professional learning with new drones and sensors

Geospatial Technologies Talent Consortium

- Since 2021, over 180 students participated in university coursework
- 74 student interns completed paid internships at 15 companies and agencies
- Dual enrollment resulting in 9 college credits, industry certifications, and paid internships
- Frederick Douglass Academy received NAF Distinguished Recognition (first in Michigan) and conducted 4 GIS/Drone summer camps



Computer Science Professional Learning

K-12 Computer Science Teacher Professional Learning including curriculum resources and teacher stipends.

- 66 Wayne County educators trained in 2023-24
- [Elementary CS Bootcamp](#)
- [Code.org CS Discoveries](#)
- [Code.org CS Principles](#)
- [Code.org AP CSA](#)
- [AI for Educators \(New!\)](#)
- [Bootstrap: Data Science](#)
- [Bootstrap: Algebra](#)



Modeling Instruction

Modeling pedagogy is integrated with an engaging technical component around one of Michigan's leading industries, *mobility*.

- Teacher professional learning includes insight from industry professionals
- Equipment provided: micro:bit microprocessor, robotic vehicle and sensors
- 12 teachers and over 2,000 students impacted





Chief Science Officers (CSO) (New)

CSO is an international student leadership network that advocates for student voice and innovation in their communities.

- Students grades 6-12 serve as STEM leaders and ambassadors in their schools and communities
- Students create a STEM action plan
- Wayne County students attended the Youth Congress at SVSU



Growing Researchers of Environmental Equity Network (G.R.E.E.N.)

GREEN is an environmental justice, place-based summer program for high school students and teachers.

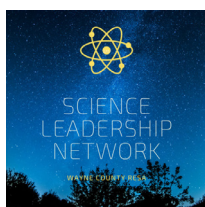
- Teams create advocacy projects rooted in the Disciplinary Literacy Essentials
- Since 2023, participation has included science, social studies, and English teachers



OpenSciEd

Curriculum and content specific teacher professional learning along with support for coaches and PLCs

- Implementation/Pilot support for Instructional Leadership
- Opportunity for participation in Network Improvement Community
- 43 participants attended from 10 districts and impacted over 4,000 students



Science Leadership Network

Leadership Network to support excellence in K-12 Science Teaching and learning

- 36 participants from across Wayne County including teachers, coaches, and instructional leadership
- Hosted speakers on important topics in Science education



Master Science Teacher Fellowship

MSTF is an intensive teacher training program that develops teacher efficacy and leadership.

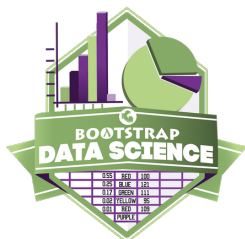
- Each fellow participates in a 3-year professional learning program
- Fellows earn a Wayne County Master Science Teacher Certification



Next Generation Science Teacher Training

Professional Learning to support K-12 science teaching.

- 976 teachers trained since inception, virtual options created and kits provided.



Data Science

Five-day professional learning series to help integrate mathematics and computer science.

- Two course options available: traditional data science and data science with algebra
- 15 new high school teachers were trained in the two courses
- 27 teachers have been trained over 2 years impacting over 5,000 students



Moving Literacy Outdoors

Moving Literacy Outdoors projects engaged teachers and students in observing, building, reading, and writing about the natural world in their local school environment.

- 15 Wayne County Districts, 43 teachers and their students
- Rebuilt 4 school-based outdoor native plant gardens
- Moving Literacy Outdoors program implemented, including the creation of a Storybook Trail.

