



You don't have to know the answers to scientific questions to be a great science guide. Parents are children's first educators and libraries' role in preschool literacy make them natural places to learn about science. Both parents and librarians should keep it simple and have fun!

Science is Child's Play

aqua.wisc.edu/waterlibrary

What? STE(A)M for preschoolers

STE(A)M is Science, Technology, Engineering, (Art) and Math. For preschoolers, it means helping them to **explore, observe, ask questions, predict** and **integrate** the wonders around them.

1. Ask a question
2. Find background information
3. Form a hypothesis
4. Run an experiment
5. Study the data
6. Draw conclusions
7. Share results
8. Re-test (try again)

A scientific method for youngsters:

Ask a question

What do you think might happen if we put this in the water? Will it sink or float?

Run an experiment

Let's see what happens when... . And give it a go.

Re-test

Have a friend or sibling try the test, too.



Why? Children are natural scientists

Research shows a strong connection between learning about science as a child and acquiring strong critical thinking skills that lead to success in many aspects of academic life. It may also increase a child's interest in studying science and possibility even a career in science.

Academic "school" learning tends to be more formal and involve memorization and practice.

Intellectual learning takes places all around us as we observe and interact with our environment.

At a very young age, children are open to and ready for intellectual learning. Leave academic learning to the school setting.

Who? Build community

Wisconsin's Water Library uses award-winning literature and science-based activities to introduce marine science concepts to preschoolers and early elementary students in many venues.

For example, the library maintains an ongoing relationship with the Head Start program in the Ho-Chunk Nation near Wisconsin Dells, one of the largest Native American communities in the state. The Neenk Chunkgra Head Start program serves children ages three through five from generally low-income families.

Library staff visit at least four times per year to read books, create crafts and do science. The Water Library works to provide an enriching experience to children who otherwise would not be exposed to marine literacy. What began as a simple literacy-based story time has evolved to include more and more STE(A)M-based activities as the children's curiosity about science behind the theme was more and more evident.



Sharing a relevant book and a craft project related to the turtle, an animal of cultural importance to the Ho-Chunk Nation (above) allows the children to ask questions, learn background information and use their observations to create their own turtles.

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