



For Professionals: Exploring Science Everyday With Children



In your everyday work with children, try to identify science concepts that are developmentally appropriate. Weave the science concepts into learning centers, investigations, and book reading...

...by talking

In everyday conversations use appropriate science vocabulary such as *observe, predict, estimate, count, experiment, compare*

Talk about natural phenomena: the weather, animal behaviors, plants, clouds, etc.

Talk about characters from books who have problems and about how they solve the problems

Wonder aloud and ask questions relating to current classroom activities: *Will we be able to see our shadows today?*

Encourage children to make estimations, predictions and hypotheses

Use proper vocabulary when talking about the world around you

Allow plenty of time to discuss the investigations you are doing

Talk about the questions children have about your indoor and outdoor environment

Talk about the changes you notice in: the weather, each other, the seasons, your neighborhood

Before transitions, ask: *What do you think will happen next?*

Look for patterns and sequences in everyday activities: *After we have a snack, what happens next?*

Ask questions about new experiences: *How is this different? How is this the same?*



Talk about the connections you see between and among different objects

... with books

Borrow or buy books about science, including picture biographies of scientists and other reference books

Look at a reference book of insects, animals or trees noticing similarities and differences

Provide books that show children information about environments, diversity, growth, shadows, and other scientific ideas

Display books and science equipment in several places, not just in a science corner

Make predictions about what will happen in stories

Read game or other instructions aloud to children

After reading a book about growing plants, plant some seeds

Follow a recipe from a cookbook

Play a game based on a story, such as Shadow Tag when you read *Bear Shadow*

... with tools and technology

Have hand lenses, balances and other science equipment available

Observe and talk about scientific and technological devices such as thermometers, calculators and computers

Measure objects with standard and non-standard units

Explore a tree trunk with a hand lens

Compare the weights of different objects by hand, then use a balance

Look up a weather forecast on the Internet



Use an eyedropper to mix colors

Make shadows with a flashlight

Check the temperature outside on cold and hot days

Imagine together what life was like before telephones or television

... through documentation

Have fun making charts and lists and display them

Help children make drawings, models and books about their investigations

Describe and document changes that are taking place among the children, in the classroom and in the outdoor environment

Plant seeds, measure seedlings, make drawings at weekly intervals

Visit a special tree periodically throughout the year and document differences and similarities

... by supporting science in the home

Make families aware of their children's interests, skills and abilities

Publicize informal science opportunities in your community

Invite families on field trips

Make sure families know about the local science or children's museum

Tell families about investigations their children really enjoy



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