

Toddler, Preschool, Kindergarten, and School-Age Activity: Puzzling Shapes. Geometric shapes can be carefully drawn with a ruler on poster board. Use a different color for each shape for younger children. Older children will not need the color clue. Cut each shape into a number of pieces. Color-code the pieces on the back if necessary. Laminate individual pieces, and trim the excess. Match the number and sizes of the pieces with your age group. For example, a square cut in half diagonally will challenge a toddler but bore a kindergartner.

Preschool, Kindergarten, and School-Age Activity: Sew a Shape. Trim the raised edges off plastic foam trays. Cut each into a different geometric shape. Sturdy cardboard could also be used. Use a hole punch to carefully punch an inner outline of the shape. Encourage children to sew the shape by following the line of holes outlining the shape. They can use a shoelace or thick yarn rather than thread. Use a large plastic needle, or tape the beginning end to get it through the holes. Tie a large knot, button, or bead at the end so that it will not pull through. Some children will sew with an over-under, in-and-out motion as one would do with needle and thread. Others may prefer to loop or lace around the edge.

A piece of pegboard with the outline of a shape drawn through the holes could also be used. The children could use golf tees rather than yarn to complete the shape outline.

Preschool, Kindergarten, and School-Age Activity: Safety Shape. An awareness of shape serves many purposes beyond mere aesthetic beauty. Different shapes are used on signs that help people live, walk, and drive safely. The same is true for colors. Even if one cannot read a sign, the shape and color tell us what to do. Take a short neighborhood walk and look for safety signs, such as STOP. Safety shapes include the octagon, triangle, diamond, and circle. Children may want to make red, green, and yellow circles and paste them in the proper order against a black background to make a traffic light.

Toddler, Preschool, Kindergarten, and School-Age Activity: Shape Stamps. Children enjoy placing objects on an inked stamp pad and stamping that impression on a piece of paper. Find items that have round, square, rectangular, and triangular shapes. The round edge of a plastic hair roller is ideal for a round shape. Find hair rollers in different sizes. Encourage children to creatively combine the shapes into a design or picture.

Preschool, Kindergarten, and School-Age Activity: Shape Spatter Paint. Cut geometric shapes out of sturdy cardboard. Place a sheet of paper into the lid of a box. Place one shape on the paper. Place a thin

screen over the top. Dip an old toothbrush in paint. Carefully brush across the screen, making sure that the paint is spattering around the edge of the shape. Remove the screen and carefully lift up the shape. The outline of the shape will appear on the paper. Repeat the process, combining shapes at different sittings as separate activities.

There are many standard activities that are appropriate for learning about color as well as shape. Some are described here.

Infant, Toddler, Preschool, Kindergarten, and School-Age Activity: Signs. Signs or displays of colors and color names as well as shapes and their corresponding names help children learn these concepts. A color caterpillar can have a body made up of different colored sections. Each circular ball of the body is a different color. A shape train can have a regular locomotive but cars of different geometric shapes. The names can be neatly printed above or below the items in each. Remember to post these at children's eye level rather than up high.

Kindergarten and School-Age Activity: Manipulative Games. Traditional games can be specifically designed and adapted to learn about shapes and color. Recommended examples include the following:

- bingo
- lotto
- dominoes
- card games, including old maid, rummy, hearts, and go fish

Browse through a toy store website or catalogue, noting board games and manipulative materials. Then, creatively adapt your own versions.

Preschool, Kindergarten, and School-Age Activity: Match and Memory. Make pairs of colors or shapes on index cards. Encourage children to match pairs. Older children enjoy turning all the color or shape cards face down and trying to find the matches. Players get another turn if two matching cards are turned up.

Kindergarten and School-Age Activity: Classify. Children can be challenged to find different ways to classify an array of cards. Index cards can be grouped on the basis of color, shape, and size. Older children will enjoy playing with a total deck of 12 cards per color. For example,

Red: circle, square, rectangle, triangle; small, medium, large

Using this formula for each of the three primary colors makes a deck of 36 cards.

Preschool, Kindergarten, and School-Age Activity: Gone Fishing. Cut a piece of index card into a fish shape. Use a paper clip at the tail end and a string to make a fishing line. Encourage children to catch the color or shape fish.

Preschool, Kindergarten, and School-Age Activity: Partner Mat. Give each child a piece of paper or color to hold with shapes. Hold the circle, holding around to find the shape. Exchange.

Kindergarten and School-Age Activity: Books. Find books with shapes. Find wire. Neatly arrange the items. Or you can make a top a the same book. Have a top a sides, four in red page in red in the up the word red right page. Divide it between left side. Encourage children to use various pages. For example, in red (lower left) apple or

6-1e Ma:

Mass and volume. Find three-dimensional shapes and widths. A sphere is a three-dimensional shape. Mass or weight is the amount of matter in an object. Bodies. An object's volume is the amount of space it occupies. Be portrayed.

- heavy
- solid,
- geometric
- static
- hard
- large
- static