



## Programme 3 - Early Mathematical Experiences

### Introduction

At home in the garage with his yellow van, the Hurley-Burley man has to sort through a collection of objects of different shapes and sizes and pack them into his van. We see local pre-school children sorting their toys and tidying them away in shelves and cupboards, rounded off with a song on our theme of sorting.

### Learning Opportunities

#### The Arts

- making pictures using a variety of shapes;
- singing action/number songs.

#### Early Maths

- sorting objects;
- understanding mathematical language including positional and directional words;
- ordering objects by size;
- copying patterns;
- counting objects;
- comparing shapes.

#### Language Development

- talking about and comparing objects;
- answering questions;
- following instructions;
- listening to stories.

#### Personal, Social and Emotional Development

- sharing and co-operating;
- building up confidence to carry out a task;
- persevering with activities.

#### Physical Development

- developing hand-eye co-ordination and manipulative skills;
- using gross motor skills during outdoor play.

#### The World Around Us

- learning about ponds;
- finding out about caterpillars and frogs;
- respecting living things.

**Programme 3 - Early Mathematical Experiences****Suggested Activities**

- Encourage the children to make pictures and models using a range of "safe" scrap materials.
- Explore shape by looking at a collection of boxes which can be then be used for modelling. Ask the children questions such as, How are boxes made? What do you think was in this box? Will the boxes roll or slide?
- Encourage the children to recycle materials at home and in school
- Look at things that keep food safe, e.g. tin foil, Clingfilm, cans, containers.
- Secure three different coloured sacks with masking tape against a wall or desk in the classroom or outdoors. Provide a collection of materials to be sorted into metal, paper or plastic. (The children will enjoy this activity and it also reinforces the concept of tidying up.)
- Organise a box or display area where the children can compare a variety of objects of different sizes. Ask the children to find the biggest and smallest. Encourage new vocabulary e.g. huge, enormous, tiny, light, heavy, long, short.
- Suggest that the children set the table in the house corner for a particular number e.g. 5, using coloured cups plates and cutlery. Ask questions such as How many more cups would you need if another person came to tea?
- Use a teddy and a chair to reinforce positional words e.g. Ask questions such as, Where is Teddy? Is he on the chair or under the chair?, Can you put him behind/beside the chair?
- Use the traditional stories like The Three Bears or The Three Billy Goats Gruff to reinforce differences in size. Gather up props or make displays that the children can play with at their leisure and retell the story time and time again.
- Provide blue shiny paper and natural materials e.g. sand and small pebbles and encourage the children to use them to make a model of a pond.....ready for the frogs to visit!!