## Five key principles of heuristic play

by Shelley Auld

Heuristic play sessions are one way that young children can explore the properties of everyday objects or cultural artifacts in a safe, supported, open-ended manner. Through heuristic play a child has the opportunity to determine their own actions and make choices.

The word 'heuristic' comes from the Greek word 'heurisko', which means 'serves to discover or reach understanding of' (Goldschmied & Jackson, 1994). Heuristic play is the play that allows children to experience and put together objects in a way that engenders the excited feeling – 'I have found out about this object'.

There are five principles to play being viewed as 'heuristic'.

*Principle one:* The type of equipment used in heuristic play.

For play to be termed 'heuristic', according to Goldschmied & Jackson (1994), the equipment offered to children should be everyday objects and/or cultural artifacts. Perhaps heuristic equipment could be regarded as an organised equivalent of potcupboard play. Children playing with real things that adults busy themselves with.

When putting together heuristic play equipment you should gather a variety of objects with different properties and uses. Try to find objects such as:

- wood, glass, metal, wool, cotton, plastic, cardboard and stone;
- large and small objects, heavy and light, clear and opaque;
- objects from the kitchen, laundry, bathroom and bedroom; and
- objects that will fit inside each other and make different sounds.

Heuristic play equipment should only be used in the programme during heuristic play sessions as these items have the potential to be unsafe if not closely supervised. This focused time



Madeline McCann, 13 months, exploring objects in a treasure basket at Otago University nursery.

also gives adults the opportunity to closely observe what children are doing with the items during this time. Because the items may be regarded as 'junk', they can disappear into the programme and tend to become messy and lose any specialness.

Principle two: The role of the adult.

It is important to recognize the unique role the adult plays during a heuristic play session. The adult sets up the play experience then positions themselves in a place that they are not directly included in the play but can observe the session and be available to intervene and redirect play if necessary. This 'hands-off' role is seen as valid because of the need for infants to make their own discoveries in their own way.

*Principle three:* The timing of the play sessions.

Heuristic play sessions will not work if the children are hungry, tired, have uncomfortable nappies or clothes, or are unwell. Choose a time when children have been fed, changed and are not tired – a time when they are likely to be more settled. Heuristic play sessions may, therefore, only be offered a few times a week.

*Principle four:* Setting up play sessions.

Heuristic play sessions should be set up away from distractions and noise. This allows the children to concentrate on and explore the equipment. A room away from the main play area is ideal, or you could try screening off a small area within a large play space.

Principle five: The amount of equipment available.

During heuristic play sessions, children do not have to share or take turns.



Selecting an item from the treasure basket.

There needs to be plenty of equipment and sets of the same thing, so that there is no need for children to negotiate equipment use. The wider programme in a centre will promote children's development of social skills such as sharing, taking turns, and negotiating. Heuristic play sessions promote the skills of concentration, exploration and problem solving.

## Treasure Baskets and 'islands of play'

These five principles of heuristic play have been used in centres by teachers to create play opportunities for infants by the use of treasure baskets.

Treasure baskets are a large selection of heuristic play objects presented in a flat bottomed low sided basket close to infants who can sit independently. One or two infants are positioned comfortably alongside the basket so they can easily access and explore the objects in the basket.

Islands of play are large selections of objects presented to toddlers. The objects are arranged on the floor in at least as many groups – or islands – as there are children that are involved in the play session. Care is taken when arranging the islands that there are similar types of equipment in each island and that the islands look attractive.

## **Ending the session**

At the end of a heuristic play session toddlers can help put away the equipment. They quickly learn that one type of object gets put into a container if there is a picture of that object on the lid. Talking to children while they are putting the items away introduces children to an exploration of mathematical concepts such as groups and sets, larger and smaller, in and out. Involving children in tidying up also encourages their ability to contribute to caring for equipment and helps build the notion of belonging to a group.

## Conclusion

Heuristic play gives children the opportunity to make their own discoveries in an environment where they may develop different ways of exploring properties of objects and be creative in the way they combine objects together. The New Zealand early childhood curriculum document, Te Whariki (Ministry of Education, 1996), acknowledges the capacity of young children to pay attention, maintain concentration and be involved, and heuristic play can facilitate this. Heuristic play gives children the opportunity to experience an environment where they can develop different ways to be creative and expressive in their handling of a variety of objects. It is an effective way of encouraging children to explore artifacts from our culture and to develop their thinking further.

Reference

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