

# Reflections Small School – Curriculum Plan

Date: 1.9.16

Review Date: 1.9.17

*Emergent curriculum is a way of teaching and planning curriculum in response to children's deep interests and enquiries, educators' research questions, carefully considered physical environments and the dynamics of social relationships. It is an approach to curriculum-building that can be developed at any stage of education, and prioritises active learning, independence, collaboration, long-term enquiries and creative expression.*

[Jones, E. and Nimmo, J. (1994) *Emergent Curriculum* Washington: National Association for the Education of Young Children]

Reflections Small School works with an emergent curriculum and co-created learning. This means that we do not have an external set curriculum to be 'delivered'. We have rather an approach which balances observation of and responses to children's interests, reflective and 'researchful' practice amongst educators and a planning system which ensures breadth as well as depth is developed through each year of Small School.

An emergent curriculum with co-created learning means:

- Learning takes place through long-term project work
- Projects develop from children's fascinations and educators' research questions
- Projects combine individual learning and group collaboration
- Projects cross traditionally separate 'subject' areas in flexible and adaptive ways
- How children are learning is as important as what they are learning. We work with the 'many languages of children' including movement, narrative, drama, engineering, scientific observation and analysis, hypothesis testing, sculpture, design, painting... any of these languages, singly or in combination, can be part of a project.
- Project planning also focusses on the interactions between children and the roles they are adopting within a project. Their personal, social and emotional development is an integral part of project work.
- We ensure opportunities for children to review their own learning.
- As projects emerge through the year we also consider the breadth of children's learning. We make comparison with the main areas of the National Curriculum but we do not use this as an active framework for planning.
- We have an established timetable and structure of meetings to analyse our emerging curriculum for areas and ways of learning, any gaps in our provision, and to check a balanced and complete educational offer is being made.

In this Curriculum Plan we outline our approach to Language and Literacy, Mathematics and Science, recognising these as the three core subjects of the National Curriculum for Key Stage 1, and that children who leave Small School are most likely to enter schools following the National Curriculum. We also make brief reference to Physical Education.

By way of illustration of our approach we provide a detailed project example from the 4 – 5 year olds in Reflections Nursery to demonstrate how our emergent curriculum works in practice. The approach described is directly applicable to learning in Reflections Small School. However, we also outline the differences we would expect when working with older children in a project-based system.

Each child at Small School will be involved in a number of projects at any one time and from this comes the breadth of our educational offer. As an example, the oldest children in the nursery last year (those in the year before Small School) were involved in projects focussing on:

- words, letters, secret language, and coded writing
- birds, nesting, bird languages, birds as architects, reference systems, nature commentary and filming, incubating and hatching chicks, curating a 'Bird Museum'
- searching for and recording Sounds in the forest, building a Sound Machine, and investigating the physical and intangible nature of Sound
- constructing large and small scale bridges and towers, researching local architecture such as the pier, mapping local geography and exploring/inventing the language of cartography
- inventing ways to make cement, building a hotel for insects, writing instructions for other children to make cement, experimenting with static electricity, and inventing ways to make colour

As well as this, children are regularly involved in structuring their own outdoor play in the garden and forest, cooking on the fire, caring for the chickens and the edible garden, working with the elements of earth, air, fire and water, and exploring our coastal landscape.

Children in Small School spend one day a week in the forest and half a day on the coastline. Both are important spaces for all aspects of their learning but have particular value in terms of developing physical exploration, strength, resilience, agility and confidence. They are invaluable contexts for exploring the social and emotional aspects of being part of a group as well as offering many opportunities for being quiet and solitary, slowing down. Project work frequently begins in these spaces, and children also bring current ideas and interests from the School site into these wild 'arenas'.

Project-based learning and an emergent curriculum means we do not have separate 'lessons' for subject areas. Art and design, computing, design and technology, geography, history, music etc. are all embedded in projects, and there will be a fluctuating emphasis on any of these. We will not be following the National Curriculum in how these are divided into subject areas nor in the kind of material taught. However, we will ensure that children have had many meaningful learning experiences in these areas and are able to draw on a powerful range of technical and artistic languages to further their compelling enquiries. Children will leave Reflections Small School with a rounded experience of education, rooted in beautiful and varied spaces ranging from our buildings and gardens, to local museums and social spaces, to wild local landscapes in the forest and along our immediate coastline.

## 1. *Language & Literacy* at Reflections Small School

As recognised in the National Curriculum, English language is a medium for teaching and learning in the UK, as well as a subject for exploration in its own right. Reflections Small School recognises that when children are fully engaged in project work they continually reach for tools to explore and communicate their interests – language is one of the most important of these tools.

In a curriculum which emerges from their deep interests, children are highly motivated to learn spelling, vocabulary, technical and detailed terminology; ways of asking, refining and answering important questions; rules for formulating hypotheses, testing and recording observations; languages to evaluate their own and others' ideas and work.

Our teachers are skilled at realising the potential in any project to develop language and literacy, and actively look for these opportunities. Through planning and evaluation meetings we assess whether enough time is being dedicated to these areas of children's learning. When necessary we introduce adult-initiated sessions to teach language skills and understandings in addition to those developing within project work.

In Reception the emphasis is predominantly on spoken language and communication, as well as listening and the beginnings of writing and reading. In Year 1 formal literacy work is added where needed alongside the opportunities presented by project work. Year 2 consolidates language and literacy in both project-based learning and adult-initiated sessions.

### **Reception Year**

Following a model comparable to those in Scandinavian countries, children at Reflections Small School will learn to read and write in a formal way later than described in the National Curriculum. We believe this allows other strengths and abilities to develop which form the foundation for lifelong powers of communication and literacy.

<https://www.newscientist.com/article/mg22029435-000-too-much-too-young-should-schooling-start-at-age-7/>

Working with a small group of children there is great flexibility in teaching at the point of each child's interest and readiness. Individual children's learning and development will be documented and the formal teaching of language and literacy adapted to the children in the class. The exact timing of language and literacy teaching is therefore flexible.

Although formal reading and writing skills come later in the children's education every opportunity is taken to support children's desire to read, write and communicate clearly from Reception year onwards.

- Throughout the day children will be expected to use spoken language to describe what they are doing, communicate their thinking, justify ideas, negotiate a role for themselves in collaborative and independent work.

- Each day begins with a 'morning meeting' – an active discussion between children and educators, recalling past days' work and planning next steps together. Children are expected to talk about what they have already been doing, listen to and comment on each other's work, generate new ideas and plan for the day
- The morning/day ends with a review meeting, in which children and educators look back over the work done, and may include documenting new developments by scribing (educators recording children's words) or writing (children and educators)
- Visitors to the nursery and school are encouraged to ask the children themselves to describe what they are working on. Educators support children to engage in these conversations and explanations.
- Notebooks are taken to Forest School sessions for children to document the day in their own diary through words and images.
- Stories are told orally, and a wide range of written and spoken material is available for project work. Regular research trips are made to the library and museums and books and a laptop are available in school for children to research their interests and ideas.
- A research space with materials directly linked to language and literacy learning is available to the children at all times. This is used as needed during project work and can also be offered as a space to introduce particular aspects of reading and writing.

## **Year 1 and 2**

As Reflections Small School is not offering education beyond Year 2 we will introduce some aspects of language and literacy through regular adult-initiated sessions, in addition to opportunities to consolidate these in project work.

Depending on the projects children are involved in these sessions are likely to focus on:

- recognising letters
- recognising sounds
- connecting written letters and sounds
- building words and sentences
- breaking words and sentences down
- handwriting
- comprehension
- composition
- discussion

All educators in Reflections Small School are familiar with the National Curriculum for Key Stage 1 but we will not be assessing children against its criteria. Rather we will use this document and other frameworks for language and literacy teaching/learning to ensure that children leave Small School able to read and understand written language, able to express themselves fluently in spoken language, and able to write in a range of ways.

## 2. *Mathematics* at Reflections Small School

From their earliest days at Reflections Nursery and continuing through Reflections Small School children develop mathematical knowledge and fluency in many different contexts, spaces and relationships.

Engineering and experiments in construction are frequently the focus of projects (children in the last 2 years have built a Time Machine, a rocket, a Sound Machine, a 2m high nest). Spaces are made for investigating materials and developing a language of scientific method (hypothesis, prediction, experiment, observation, recording results, generating new hypotheses). Everyday situations such as lunchtime and preparation for Forest School enable children to use mathematics in practical and social ways. A fine sense of aesthetics, proportion, design and geometric detail are supported across the curriculum.

As with Language and Literacy, formal mathematics is not taught outside project work in Reception. But every opportunity is taken to develop counting, calculation, mathematical reasoning and verification within projects. In Years 1 and 2, depending on individual readiness and interest, formal sessions to develop mathematical understanding and application are introduced by educators. These will cover:

- Whole numbers – to 100 or more, odd and even numbers, place value
- Counting – forwards, backwards, one more, one less, estimating
- Number bonds – to 20 or more
- The four processes (addition, subtraction, multiplication, division)
- Weights and measures
- Geometry – 2D and 3D
- Sorting data
- Money
- Time

The exact balance of within-project mathematics and extra adult-initiated sessions will depend on the range of projects developing at any time and on each child's involvement with these. As with other areas of learning, documentation and planning meetings are used to check what is being covered by project work and how much extra time is needed.

As with Language and Literacy, timing is flexible in terms of introducing mathematical concepts, learning and application. Children will leave Year 2 able to work with mathematical systems and languages, confidently using the four basic processes, and applying mathematical understandings and questions to within their ongoing interests as well as specific mathematical enquiries.

### 3. Science at Reflections Small School

From their earliest years children at Reflections nursery are encouraged to explore materials, experiment and test their ideas about the natural and man-made worlds around them, to observe, notice, formulate questions and hypotheses and search for answers.

As they enter Reflections Small School children's rich languages of scientific enquiry are strengthened by adding more detail, depth, comparison and ways of recording their learning. Our approach sits well alongside this description from the National Curriculum:

*The principal focus of science teaching in key stage 1 is to enable pupils to experience and observe phenomena, looking more closely at the natural and humanly-constructed world around them. They should be encouraged to be curious and ask questions about what they notice. They should be helped to develop their understanding of scientific ideas by using different types of scientific enquiry to answer their own questions, including observing changes over a period of time, noticing patterns, grouping and classifying things, carrying out simple comparative tests, and finding things out using secondary sources of information.*

*They should begin to use simple scientific language to talk about what they have found out and communicate their ideas to a range of audiences in a variety of ways. Most of the learning about science should be done through the use of first-hand practical experiences, but there should also be some use of appropriate secondary sources, such as books, photographs and videos.*

*'Working scientifically' is described separately in the programme of study, but must **always** be taught through and clearly related to the teaching of substantive science content in the programme of study.*

Our emergent curriculum means that although scientific approaches are taught through hands-on and active projects, the precise 'subject' area may vary depending on individual children's interests and group collaborations.

Science at Reflections Small School includes: botany, biology, zoology, chemistry, physics, engineering and ecology. Many projects will include more than one of these sciences, and we use our planning system to ensure that all children have experience in these areas.

As with other core subjects, regular project planning meetings track each child's involvement, as well as the spread of projects of a scientific nature. A balance of all sciences is achieved through combining our emergent curriculum approach with adult initiated experiments, theory testing, and reporting/documenting.

Children will leave Reflections Small School with a rich experience of scientific enquiry, and will be skilled at (from the National Curriculum):

- asking simple questions and recognising that they can be answered in different ways
- observing closely, using simple equipment
- performing simple tests

- identifying and classifying
- using their observations and ideas to suggest answers to questions
- gathering and recording data to help in answering questions.

They will also have a deep curiosity in the world around them, confidence in their own abilities, a willingness and interest listening to other's theories and explanations, and will have experienced scientific enquiry in multiple contexts – the garden, the school classrooms, the forest, the coast.

#### 4. An Emergent Project example: *'This is what it looks like to think'*

Below is a description of how the four year olds' *'This is what it looks like to think'* project (see Curriculum Approach) was developed and supported. It was part of a year-long focus on *Sculpture* as an expressive language and was influenced by an educator's desire to develop philosophical discussion amongst children.

This example shows how we develop curriculum through educator observations, documentation and discussion, materials and spaces, scale and expressive languages. It is an approach that can be brought to any 'subject' area or project in the curriculum.

- i. Educator's observation  
During the *Sculpture* focus educator Becki Smith noticed that the children were interested in making sculptures of themselves and that this in turn provoked discussion about individual identity and how we recognise ourselves and other people.
- ii. Extension of children's interest through materials, time and dialogue  
Becki offered mirrors alongside the clay so the children could study their own faces as they worked. She supported their discussions by asking questions to help the children clarify, argue, defend, explain, and adapt their thinking about 'what makes me, me?'
- iii. Documentation of the children's ideas and creations  
The children's conversations were recorded in notes and photographs were taken regularly of their developing sculptural work. These were shared with the children so they could re-visit their ideas as they developed. The documentation was also brought to meetings with other educators for reflection and discussion.
- iv. A second language of expression was offered to refine the children's powers of representation  
Drawing with fine black pen on white paper alongside mirrors, and using tracing paper to draw over portrait photographs of enabled the children's ways of seeing and representing themselves to become more detailed and physically accurate. The new materials also extended the opportunity for discussion about identity on the outside and inside.

v. Structured philosophical discussion

Time was made each morning for focussed conversation about identity, and Becki posed some difficult questions for verbal debate:

- *You used to be babies and now you are much bigger, are you still the same person?*
- *If two children have the same name and the same hair colour, are they the same?*
- *What can and what can't change about myself for me still to be me?*
- *What is it that makes me, me?*

Becki supported the children to voice their opinions, to explain their thinking, to listen to each other, to compare their ideas. She recorded responses and brought these to planning meetings to share with other educators for discussion – What was surprising? What was new thinking in the group? How were the children listening to and engaging with each other's ideas as a group? What needed to be offered next?

vi. Meeting with pedagogical lead

Reviewing all documentation so far, and making a decision about next steps. Deciding to offer the children's ideas of the brain and thinking about 'what makes me, me?' back to them for further work and discussion.

vii. Re-visiting familiar materials and techniques to explore the brain

Through the expressive languages of drawing and clay sculpture, children debated and represented the structure of the brain and its internal connections. A very large image of the brain was projected onto a blank wall covered in paper. It was big enough to get inside and journey around – a physical exploration of its structure

viii. Educator adopting a child's idea to investigate 'thinking' as well as the structure of the brain.

Lenses and torches were offered to the children following Ronnie's suggestion that they would help see inside the brain. The children's created work and talk began to focus on thoughts, memory and thinking

ix. New materials offered to investigate the idea of 'flow' and 'connection'

Becki offered wires and tubes to join the clay and make connections. The children had proposed that the brain and heart are connected and that blood was important. That thoughts and blood travelled round the body.

x. Change in scale and location for exploring flow through 'physical thinking'

The sculptural and experimental work was extended on a much larger scale in the garden using tree stumps, large piping, and connectors. The children took specific roles for themselves and collaborated to build a blood flow system together.



## 5. Physical education at Reflections Small School

Our way of learning and teaching is active. Our premises are large with two large gardens offering much opportunity for physical development. Children move around their classrooms, between classrooms, and push their physical limits and development in the garden spaces and the forest and beach environments. They work with large scale materials, often in a physically strenuous way.



In addition, all children in Small School attend yoga sessions one morning each week, and will be instructed in a second movement-based discipline - we offer Capoeira sessions in the nursery and are likely to offer this in Small School.

Children are naturally competitive with themselves, pushing to get better and better at physical tasks. We allow long periods of time for these physical explorations and encourage mastery in individual physical capacities and as part of group experiences.