Bringing the Montessori Approach to your Early Years Practice

Barbara Isaacs

A David Fulton Book

Series edited by Sandy Green
Bringing the Montessori Approach to your Early Years Practice

Have you ever wondered what the Montessori approach is all about and how it can be used to benefit the young children in your setting? This book explains how the Montessori approach works, offering guidance on planning and assessment methods alongside practical activities for practitioners to try. Throughout there are practical examples involving children of different ages in a wide range of settings to show how Montessori principles have been implemented.

This new edition has been fully updated to include:

- the revised areas of learning in the EYFS and how these link to Montessori practice
- an examination of early effective learning
- approaches to effective learning in Montessori settings
- a new chapter on Montessori approaches to the assessment requirements of the EYFS questions for reflection.

This convenient guide will help early years practitioners, students and parents to really understand what the Montessori approach means to their setting and children.

Barbara Isaacs is Academic Director at Montessori Centre International.
Bringing … to your Early Years Practice

*Series Editor: Sandy Green*

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This book is dedicated to all early years practitioners who are committed to giving children time to play, explore, investigate and to be. Today’s children need this time and the early years are the right time to give them opportunities for relaxed learning following the natural path of their development.

Thanks go to my colleagues at Montessori Centre International for striving to deliver high quality Montessori teacher training which guides practitioners to “follows the child”. I would also like to express my gratitude to my family, Tony, Adelle and Daniel, for their generous support in all my Montessori adventures.

My thanks go to the children and staff at Happy Days Montessori, Rosehouse Montessori, Seedlings Montessori for contributing to this book with photographs and also to Iverna Gardens Montessori Nursery for some of the photos in the book as well as providing the cover picture.
As I consider the third edition of this book and reflect on the developments in the early years in England since the initial publication of the Curriculum Guidance in 2000, I need to acknowledge the tremendous efforts made by so many early years practitioners in bringing the interests and needs of young children to the forefront of political debate. What started as a fundamentally voluntary movement – as represented by the many playgroups, and supported by maintained and private nursery schools, child-minders and emerging day care provision – has evolved into a strong body of professionals committed to professional development, striving to deliver high quality nursery education to three- and four-year-olds. Montessori practitioners have been part of this ever-growing professional movement, and have contributed to the debates by ensuring that children’s needs and interests remain at the heart of all discussions.

It is almost twenty years since young children and their learning and development have sparked politicians’ aspirations. The introduction of the Nursery Voucher Scheme in 1995 heralded the start of this focus. Since that time, we have witnessed several changes to the funding and gradual tightening of the regulations in the administration and delivery of the nursery education grant. Today, almost all three- and four-year-olds living in England benefit from fifteen hours of free nursery education weekly during thirty-eight weeks of the academic year. Significant investment has been made in provision of nursery education for two-year-olds and it is to be expanded in the future.
Introduction

During this time we have also seen many other developments, such as the:

- creation of Children Centres, some of which grew around the well-established maintained nurseries, evolved from neighbourhood nurseries, or were new establishments benefiting from new premises and resources;

- professionalisation of the playgroups into a vibrant Preschool Learning Alliance;

- training and registration for child-minders, with plans to establish child-minding agencies;

- expansion of reception classes in maintained schools with plans to extend this provision to two-year-olds;

- significant funding for training for early years practitioners, from level 2 qualifications to level 6 Early Years Professionals to the recent introduction of the Early Years Educator (level 3) and Early Years Teacher (level 6) qualifications, developed following the Nutbrown Review (DfE 2012);

- streamlining of the two regulatory systems into one statutory framework as represented by the EYFS (DCFS 2008) and the subsequent review led by Dame Claire Tickell on whose recommendations the 2012 review is based.

Many of the initiatives sparked discussions, as well as strong protests resulting in creation of new organisations such as the Save Childhood Movement who campaign for understanding the child, measuring what matters and promoting wellbeing. The Montessori community – represented by organisations such as the Montessori Schools Association with its 4,000 members as well as individual settings and practitioners – have participated in many of these initiatives and contributed to the national debates.

There is no doubt that Maria Montessori’s pedagogy has made an impact on today’s understanding of early years education and has influenced present-day good practice. That this contribution is not
always recognised or attributed to Montessori may lie in the fact that, over the years and through the rapid expansion of early years services, we have often forgotten to reflect on and appreciate the roots from which the early years community has grown. The work of Friedrich Wilhelm Froebel, Rudolf Steiner, the Macmillan sisters and Susan Isaacs forms the foundation of our understanding of nursery education in today’s Britain and highlights the need for an informed pedagogy that continues to evolve. Montessori herself refers in her writing to the work of Jean-Jacques Rousseau and Friedrich Wilhelm Froebel, as well as to two French educationalists, Edouard Seguin and Jean-Marc-Gaspard Itard. From her earliest writing, Montessori also makes links with developmental theorists of the day, such as Sigmund Freud and Jean Piaget. Tina Bruce makes a clear case for this considered approach:

Until we are clear about the lenses through which we view children, we cannot begin to work effectively with them, nor is it easy to work in partnership with other practitioners or multi-agency colleagues, parents or carers, because our assumptions about the child are crucial in influencing our practice.

(Bruce, 2005: 2)

The Montessori approach is possibly best known today for the contribution it makes to our understanding of the importance of learning through the senses and the development of learning materials that are today referred to as ‘educational toys’, a new concept in Montessori’s time. However, we need to understand that the materials, or apparatus as they were called by Montessori, are tools for children to reveal their ‘true nature’. I believe that the key to the continued success of the Montessori approach lies in the unique relationship between the respect and trust in the child’s ability to construct themselves within a ‘favourable environment’. According to Montessori, this favourable environment offers children the opportunity to learn by following the unique rhythm of each child and being supported by sensitive, well-prepared adults, who respect the child’s individuality. However, Montessori also highlights the important contribution all children make to our future and sees children as agents for potential social change through her vision of ‘education for peace’. This vision is an
essential part of her evolutionary approach to the education of children, which she called ‘cosmic education’.

I hope this book will help to unravel some of the complex terminology Montessori uses and make her writing more accessible to today’s readers. It is important to see Montessori’s writing from a historical perspective: most of her books consist of a series of lectures, speeches and presentations that were edited into books more than fifty years ago, and were translated from Italian. Her use of language seems somewhat archaic now and changes in our understanding and use of certain terms has contributed to uncertainty and controversy over her exact meaning as, for example, when she refers to ‘deviations’ or ‘the normalisation of the child’. In addition, some of the terminology used in the last century is provocative to the readers of today, such as Montessori’s reference (1964) to ‘working with idiot children’. Recent publication of her 1946 London Lectures provides us with a more contemporary translation and well-edited text, which offers insights into Montessori’s thinking following World War II and towards the end of her very productive life. The spirit of the child and her commitment to following the child remain constant throughout Montessori’s writing, as does her reverence for children and her understanding that children hold our future in their hands.

I also hope this third edition will provide further insight into Montessori practice, particularly in relation to the revised Early Years Foundation Stage (EYFS) (DfE, 2012) and its impact on early years practice in England today. I have included a chapter which explains observation and assessment in Montessori early years practice and also a checklist of the Safeguarding and Welfare Requirements as outlined in the revised document.

From my perspective, the principles which underpin the EYFS follow in the footsteps of Maria Montessori by advocating support for the child as a unique individual, learning and developing in enabling environments and being supported by positive relationships. These are certainly conditions which Montessori envisaged for the children of her day and in the future. The aim of this book is to explain the principle of ‘following the child’ in the context of Montessori practice in the United Kingdom today and to explore the relevance of Montessori practice to the Early Years Foundation Stage.
This chapter looks briefly at Montessori’s life and work; at her early start as a medical doctor; her first nursery, which she called ‘Casa dei Bambini’; and her training of adults as Montessori teachers. All these elements of her career contributed to the rise of the Montessori International movement, which continues to thrive in the twenty-first century.

**Maria Montessori’s early life and study**

Maria Montessori’s own life is closely linked with the political, social and economic changes that resulted from the unification of Italy in the year Montessori was born, 1870. The political change also heralded social and economic change, but the process was slow as was inevitable in a country with a male-dominated electoral minority, large levels of illiteracy and driven by the Catholic Church. The economic and social status of the population contributed to the continued struggle within Italian society. The division between the small group of wealthy and educated people and the large peasant population continued to undermine the political movement and ultimately led to the emergence of the fascist state led by Benito Mussolini. So this was the Italy into which Maria Montessori was born in Chiaravalle in the province of Ancona on 31 August 1870.
Maria was the only daughter of Alessandro Montessori and Renilde Stoppani. Alessandro’s nationalistic and somewhat conservative outlook on life contrasted with the progressive and liberal Renilde, who was unusually well educated for a girl born within the region. As a civil servant, Alessandro and his family were expected to move home many times. They finally settled in Rome in 1875 when Maria was five years old. This gave the family the opportunity to join the city’s growing middle classes where they had access to the culture and intellectual energy of this growing capital.

Maria joined the public school in Via de San Nicola da Tolentino at the age of six in 1876, the year before primary education had become compulsory in Italy. Anecdotes from devoted friends paint a picture of a determined and diligent young girl, untypical of her social class. Montessori preferred to follow the technical rather than the classical stream of education, reflected in her interest and love of mathematics and the opportunity taken to follow the ‘modern curriculum’ (Kramer, 1976: 32).

By the time Montessori graduated at the age of twenty, she was interested in biological sciences and was determined to study medicine, a path not followed by a woman in Italy before. Having achieved the Diploma de License in the spring of 1892 with the high grade of 8 out of 10, Montessori was eligible to study medicine at the University of Rome. In her day, it was unthinkable for a woman to join the medical faculty where all the facilities were designed for men. It is not clear what intervention Montessori used to achieve her goal, but the fact is that in 1892, she did join the university as a medical student.

Montessori’s years of study were challenging in every aspect: her father disapproved, she was ridiculed by her fellow students and she also hated dissection, which she had to perform in the evenings. In 1894, she won the Roti prize and the scholarship that accompanied it. By 1896, she started working both with children and women as well as attending the Regia psychiatric clinic. In the last year of her studies, like the rest of her fellow students, she gave a lecture to the class. She expected to be ridiculed. Instead her talk was well attended and received, and there was an extra bonus: it was attended by her father. Montessori’s success had ended six years of rejection and criticism.
She was much admired and celebrated. Montessori herself wrote to a friend in 1896: ‘So here I am: famous! … I am not famous because of my skill or intelligence, but for my courage and indifference … This is something which, if one wishes, one can always achieve, but it takes tremendous effort.’

In the same year, Montessori started her first appointment as the surgical assistant at San Spirito’s hospital. She also helped in children’s and women’s hospitals and established her own private practice. Like many nineteenth-century women of her class, she felt social responsibility for the poor and supported them far beyond the duty expected from a physician. In 1897, she was asked to visit Rome’s asylums, and this led to meeting the ‘idiot children’, who were to change her life. Montessori’s experience of these children, collecting crumbs from the floor once they had eaten, had led her to consider the fact that perhaps they behaved in this way because they were bored. They had nothing to play with!

Montessori continued to be preoccupied with the fate of these children in the asylum and her encounter with the work of Jean-Marc-Gaspard Itard (born 1775) and his pupil Edouard Seguin (born 1812) gave some answers. Itard was and is best known for his study of the Wild Boy of Aveyron, a feral child, who was discovered running wild in the Aveyron wood. He decided to ‘civilise the young man’, to develop his senses and to gradually teach him to speak. Itard developed his own method for promoting the boy’s language skills based on sensorial experiences and matching, pairing and sorting activities. Many of these teaching tools were to be used and developed by Montessori a hundred years later when she came to work with children in the first Casa dei Bambini in the San Lorenzo district of Rome.

Montessori also found inspiration in Edouard Seguin’s work, which led her to believe ‘that mental deficiency presented chiefly a pedagogical rather than medical problem’ (Kramer, 1976: 96). In the spring of 1900, the National League for Retarded Children opened the medical-pedagogical institute, a school for what today we call children with special needs. Montessori became the director with twenty-two children attending.
One of Montessori’s co-directors of the institute, Dr Montessano, gradually became a close friend and lover. The result of this union was a son, Mario. Kramer (1976: 92) says: ‘Everything we know about her makes it unbelievable that it could have been a casual liaison.’ Mario was given his mother’s name and went to a wet nurse after birth. It is hard to imagine the psychological impact this event had on Dr Montessori. At the beginning of the twentieth century, having a child out of wedlock would have been professional as well as social suicide. ‘Deprived of the experience of caring for her own child, she was to turn her attention increasingly to meeting the needs of other children’ (Kramer, 1976: 93).

In 1900, Montessori again enrolled to study at the University of Rome. She continued her interest in psychology and pursued Seguin’s theory of educating the senses through concrete experiences. In Naples in 1902, she presented her own ideas about the possibility of the education of ‘unteachable children’. She made links between the two theories, exploring the notion of training of the senses and the importance of approaching abstraction through concrete forms a child could see and touch (Kramer, 1976). This was the basis for later development of the Montessori apparatus and sensorial materials that she called ‘materialised abstractions’.

One of her students at the time and a later friend and collaborator was Anna Maccheroni, who recalled (in Kramer, 1976: 97–98) Montessori’s lectures: ‘She was a most attractive lecturer; her language was so simple, so clear, her delivery so animated, that even the poorer students could understand her. All that she said had the warmth of life.’

The first Montessori nursery

In 1906, Montessori was asked to look after children of migrant workers, who lived in the tenements of the San Lorenzo district of Rome. The rationale for the project was simple: while the parents worked and older children attended school, the three- to six-year-olds roamed the streets and got up to mischief. The developers, who owned the tenements, decided to contain these children in a room and invited
Dr Montessori to take charge of them. As the funding for this project was non-existent, Montessori furnished the room with small tables and chairs rather than desks, a selection of modified materials originally used with her ‘idiot children’, and she employed the porter’s daughter to look after these fifty or so street urchins. Two of the revolutionary classrooms were set up and Montessori herself was actively involved for two years. Her work with these children laid a foundation for what we know today as the Montessori approach to education.

The first Casa dei Bambini opened in 58 Via dei Marsai, San Lorenzo, Rome on 6 January 1907. From the beginning, Montessori observed the children’s reactions to their new environment without any pre-conceived ideas of what would happen. These observations provided opportunities to understand better the children and the materials themselves – this was, what we would call today, action research. She modified the materials in relation to the children’s use, adapting them further for the use of children without learning difficulties. Montessori’s observations gave her a further insight into the nature of children and formed the basis of the discoveries explained in her first book *The Montessori Method*, which was published in Rome in 1912. In this book, Montessori described children as:

- being capable of extended periods of concentration;
- enjoying repetition and order;
- revelling in the freedom of movement and choice;
- enjoying purposeful activities (preferred work to play);
- self-motivated, displaying behaviours that did not require either punishments or rewards;
- taking delight in silence and harmony of the environment;
- possessing personal dignity and spontaneous self-discipline;
- being capable of learning to read and write.
It was these discoveries that made Montessori believe that these characteristics represented the potential of humanity. She advocated that all children should be given the opportunity to ‘reveal themselves’ in a developmentally appropriate environment that would facilitate their natural growth and development.

Both E.M. Standing (1984) and Rita Kramer (1976) document the history of the rise of the Montessori approach in great detail in their books. Both authors give a unique insight into this social and pedagogical experiment that Montessori herself described as follows on the occasion of the opening of the second Children’s House:

This is not simply a place where the children are kept ... but a true school for their education ... We have put the school within the home ... We have placed it within the home as the property of the community ... The idea of the community ownership of the school is new and very beautiful and profoundly educational. The parents know that the Casa dei Bambini is their property and is maintained by a portion of the rent they pay. Mothers can go at any hour of the day to watch ...

(Montessori, in Kramer, 1976: 123)

For Montessori, the Casa dei Bambini was a tool for social change for both children and their mothers, and in this inaugural speech she also referred to maternal functions and the need and opportunities for women to work and have their children in care of ‘the directress [Montessori’s name for the teacher] and the house physician’ (Kramer, 1976: 124). Here, Kramer expresses her view that Montessori may possibly reflect on her own ‘inability to mother her child’ and her concern for the quality of care to be given to children of absent mothers. This dilemma continues to haunt today’s working mothers.

There is no doubt that the children thrived and parents appreciated their children’s growing awareness of hygiene and good manners, as well as independence and opportunities to learn. The reputation of this pedagogical experiment spread rapidly, thanks to the growing affordability of newsprint. Within the next two years, the Children’s Houses
had many Italian and foreign visitors with dignitaries and teachers coming from all over the world.

**International Montessori movement**

Montessori decided in 1913 to give up both her lectureship at the university and the medical profession. From then on, she would devote her energies to the training of Montessori teachers, to the development of Montessori learning materials and to the establishment of the Montessori network worldwide. Between 1907 and 1914, when World War I broke out, interest in Montessori education flourished and many opportunities were opened to Montessori to promote her unique view of children and their learning. By 1914, there were hundreds of Montessori schools established in Europe, North and South America as well as India, Sri Lanka and Pakistan.

For the next forty years, Montessori continued to travel, lecture and promote Montessori education. She visited all the continents and left us a legacy from which thousands and thousands of children around the globe benefited. She died in the Netherlands at the end of the summer of 1952, wanting to be known as a citizen of the world.
This chapter explores what is generally understood by the Montessori approach today. Montessori describes children’s development in stages, each one unique and essential in the maturation of the child. Each stage should be supported by an environment, which supports the unique qualities of the child and which also includes adults and peers, who contribute significantly to the environment and therefore to the children’s learning. The Montessori approach to education has three key components:

- the child;
- the favourable environment;
- the teacher.

The relationship between the child, teacher and environment continues to evolve and develop because it is based on observation of children. The evolving links between all three components and their interaction represent what we know today as the Montessori approach.
The Montessori approach
The child

Montessori recognises and celebrates the unique individuality of each child and the potential that they hold within themselves. She urges adults to demonstrate trust in the child’s ability to learn and absorb the environment and the culture in which they grow up, and so become an adult. She sees the child as the possible agent in affecting social change on this planet.

Montessori believed that children develop in stages or planes and that each stage has its own unique qualities and characteristics. The child’s needs have to be reflected in the environment and in the strategies employed by the adults when facilitating their learning.

Each stage is heralded by physical changes in the body, particularly of the teeth: loss of milk teeth around six, loss of molars at around twelve and emergence of wisdom teeth around the age of eighteen, when adulthood begins. The three stages are:

- the absorbent mind – conception to six (birth to three: unconscious absorbent mind; three to six: conscious absorbent mind);
- childhood – six to twelve (considered to be calm and conducive to learning);
- adolescence – twelve to eighteen (twelve to fifteen is as unpredictable as the first stage).

The age bands are approximate and provide very flexible developmental guidelines, while recognising the uniqueness of each child.

The absorbent mind

The absorbent mind is a time of enormous potential in the development of the individual. Human beings need stimulation and opportunity to develop the brain through active learning and exploration, and refinement through our senses. The fundamental principle of this stage is recognition of the child as a spontaneous learner, driven by an inner
drive/energy that Montessori (1988a) termed ‘horme’. The Greek word refers to the child’s drive from within to learn from the environment – what Bruce (2005) refers to as self-motivation.

Characteristic of the absorbent mind are three embryonic stages or, as Montessori (1988a) puts it, ‘periods of rebirth’:

- physical embryo – when the child’s physical body is formed in the womb, the pre-natal stage of life;
- spiritual embryo – the period after birth, when the unique nature of the human being, individual to each child, emerges. Montessori often talks of the child’s emerging personality in relation to this embryonic stage;
- social embryo – when the child is ready to embrace the social aspects of their life, gradually becoming aware of the social conventions of their culture and of the needs and feelings of others.

During the first stage of life, we witness children acquiring certain skills and abilities. Montessori terms these predispositions ‘sensitive periods’. They emerge from the ‘human tendencies’ (Montessori, 1988a), the inherited traits, characteristic of all human beings, such as orientation, communication, gregariousness, creativity and imagination. The ‘sensitive periods’ (Montessori, 1966) unfold when, and if, the conditions of the child’s environment are favourable.

There are six key sensitive periods for:

- order;
- movement;
- small details;
- language;
- refinement of the senses;
- the social aspects of life.
The Montessori approach

It is the manifestations of the sensitive periods on which the prime carer or teacher should focus as they observe, so that they can provide appropriate learning opportunities for the child. Montessori believed that if appropriate support from the adult is not available, opportunities will be lost or the child will miss out on developing to their full potential. Sensitive periods are universal, evident in all children around the world. They are also present within the child at birth and can be concurrent and ‘run parallel to each other’. Each sensitive period reaches its peak at a different time during the first six years of life. For example, the sensitive period for language starts in the womb when the baby recognises their mother’s voice. Babies are pre-disposed to respond to human language. They listen attentively before their first word is uttered. Then between eighteen and thirty-six months, the child’s language explodes, from passive to active vocabulary, ability to use grammar and syntax, using language appropriately within the social context and manipulating it to demonstrate a sense of humour. However, if children are not exposed to opportunities to hear rich language used in the context of everyday life, the potential of their ability to communicate effectively will be limited by the lack of experience.

The sensitive period for order is evident from birth and reflects the baby’s need for routines that provide predictability and consistency from which sense of security emerges. As the child grows, they will be able to orientate themselves within the home through familiar arrangements and the child will adapt to them. For example, when going for a walk, we may be surprised by the toddler’s ability to ‘find the way’ to the public library. It is their sensitive period for order that helps them to absorb the route we have taken on many previous occasions when visiting the library. By the time they are two/two-and-a-half, they will be able to find toys in their room and also be able to replace them where found. The external order will be supporting their initiative as well as organisational skills and problem solving. These are just two of the above-mentioned sensitive periods. You can read more about the children’s sensitive periods in *The Secret of Childhood* and *The Absorbent Mind* (Montessori, 1966 and 1988a), Lillard’s (1972) *Montessori, a Modern Approach* and Standing’s (1984) *Maria Montessori, Her Life and Work*. 
Montessori (1988a) defines the absorbent mind as operating at two levels:

- the ‘unconscious level’ in the first three years of life, when the children are absorbing indiscriminately from the environment that surrounds them; at the time when sensitive periods for order, movement, small detail and language feature prominently in the child’s development;
- the ‘conscious level’ reflecting the child’s growing ability to organise and classify information, experiences and concepts. This stage of the absorbent mind is closely linked with the child’s sensitive period for refinement of the senses and social aspects of life. It is supported by the sensitive periods for order and small details.

**Childhood**

This is the second stage of the child’s development, which Montessori (1994) defined as the calm stage, when the child is very keen to learn and eager to belong to a group. The characteristic sensitive periods exhibited during this plane relate to the child’s moral development and acquisition of culture. (Note that from Montessori’s point of view, culture includes not only a set of social conventions and experiences. It also relates to areas of learning such as the natural sciences, history and geography.)

**Adolescence**

This third plane of development is seen by Montessori as comparable with the first stage of life, with its turbulence and unpredictability and volatility. It is further subdivided into puberty (twelve to fifteen years of age) when Montessori acknowledges the big physical changes that take place within the child’s body, and likens it to the time of the spiritual embryo when adults need to exercise a great deal of patience and
understanding in support of children of this age. The second sub-stage of this period is termed adolescence (from fifteen to eighteen). Here Montessori highlights the young person’s need to find a group of friends with whom they can identify.

Montessori’s (1994) views on education during childhood and adolescence can be found in *From Childhood to Adolescence*. Montessori teachers in the United States and Sweden have developed her ideas on education of teenagers further and David Khan has written extensively on this topic for the North American Montessori Association, whilst Lillard (1996) explores the education of primary age children in *Montessori Today*.

Montessori also refers to a fourth stage of development that relates to the early stages of adulthood (eighteen to twenty-four years of age). However, she does not discuss any new or significant insights into the lives of young adults. In this book, I will focus on children between birth and the age of six in the absorbent mind plane of development, with particular emphasis on the second stage of this plane, the three- to six-year-olds.
The Montessori approach

The favourable environment

Rationale for the favourable environment

Montessori, just like Piaget (1962), saw the environment as a key factor in children’s spontaneous learning. She believed it should be favourable to the development of the whole child, and should offer opportunities for the development of the potential of each individual. When Montessori described the favourable environment, she saw the child as an active agent of this environment, and the teacher as the facilitator of the child’s learning and development. It is the role of the teacher to ensure that the environment provides for the developmental needs of each individual child. Observation serves as the key tool for identification of these developmental needs.

As the child responds to the stimuli within a given environment, be it home, school or nursery, the adults present should observe and interpret behaviour according to the sensitive periods and maturation of the child. With this in mind, they should ensure that the activities, materials, objects and occupations in the environment are brought to the attention of the child to facilitate, scaffold and extend learning opportunities for the child. Adults, as well as the child’s peers, act to some extent as a catalyst in the maturation process, while the materials, objects and occupations within the environment scaffold the child’s learning (see the work of Bruner (1960) and Vygotsky (1978) for more detail about scaffolding).

Qualities of the favourable environment

Now that we have looked at Montessori’s view of the characteristics of children in different age groups, we can examine the Montessori favourable environment. This environment must be, above all, safe for the child. Here, the nursery will follow given government guidelines, and in the English context, the Early Years Foundation Stage (DfE, 2012) document provides ‘the statutory framework’ for safeguarding of children.
The Montessori approach

From the Montessori perspective, the favourable environment is characterised by:

- accessibility and availability;
- freedom of movement and choice;
- personal responsibility;
- reality and nature;
- beauty and harmony.

Accessibility and availability

The first Children’s House was designed as the house of children, therefore everything in the room is prepared with children in mind. Some aspects of the environment such as the lack of desks and a teacher’s table, and the child-friendly size of the furniture, which were revolutionary in Montessori’s day, have become accepted features of all good early years provision. It is also recognised that many children of this age benefit from open floor space that can be used for a variety of individual or group activities, as many young children do not particularly enjoy sitting at a table. Montessori also advocated that the garden or outdoor space has a covered terrace that would give children opportunities to be inside or outside in any weather conditions – this was her contribution to the currently popular model for the outdoor classroom.

The organisation of the materials, activities and occupations on open shelving, according to areas of learning and representing the areas of learning as defined by the Montessori early years curriculum (further explained in Chapter 3), is another aspect of the favourable environment that offers availability and accessibility. These materials are usually arranged in a specific order, setting out a possible sequence that the child may or may not choose to adopt. This sequence follows the growing complexity of the activities and the gradual building of specific skills and so scaffolds the child’s learning. Each activity is presented on a tray, in a basket or in a box, with all the resources
complete and available in a self-contained manner. Once a child selects it from the shelf, they should have all the resources necessary for that activity. This completeness provides for focused work and lack of distraction once the occupation has been chosen. Generally, each activity has its place in the classroom in order to support the child’s freedom of choice and the sensitive period for order. This facilitates consistency and predictability within the environment. It is the teacher’s role to ensure the consistency and predictability of the environment are maintained.

**Freedom of movement and choice**

The favourable environment that provides children with a wide range of accessible and available activities, designed to meet their individual needs, will also support the child’s need for freedom. To facilitate freedom, teachers need to have trust and respect the child. Only if this trust and respect are embedded in the daily routines can the children have true freedom of movement and choice; these two freedoms are inseparable. Children can only make appropriate choices if they have the opportunity to move around the room and find what they need to satisfy their inner drive, or ‘horme’ (Montessori, 1988a).

The environment needs to be predictable to facilitate the plans and choices made by the child. When children decide to do what they need to do, they are also able to take as much or as little time to do the activity as they choose. Many children will choose to repeat the same task over and over again, either on the same day or on subsequent days. This need for repetition often relates to the child’s sensitive periods and is integral to the freedoms offered within Montessori classrooms, as is freedom from interruption. It is considered inappropriate to disturb a child deep in concentration on a specific self-chosen activity and according to Montessori (1988a and 1988b), it is the duty of the teacher to protect this child from interruption.

We must not forget that the child, who is ‘free to do’ also needs to be ‘free not to do’. There are those children who prefer to learn by watching others. Giving a child the time to sit and watch, or to contemplate a ray of sunlight, reflects our respect for the individual as much as the
freedom to repeat an activity or the freedom to engage in an activity or play without interruption does.

Children also have freedom of speech, which relates directly to the sensitive period for language. The child’s ability to express and communicate thoughts and ideas is considered to be an essential part of all pre-school provision, bearing in mind the stages of language development. The calm, purposeful atmosphere in a Montessori classroom contributes greatly towards children’s developing communication skills.

**Personal responsibility**

The freedom of the nursery does not mean limitless licence for the children to do as they please. It is generally considered that freedom carries personal responsibility, and therefore there are some expectations the adults and peers have of the children who access the freedoms of the favourable environment. The collective interest of the group must be considered first, so that children will be actively discouraged from any dangerous or hurtful acts that may endanger them or others.

The teachers and other children model appropriate and polite behaviour, both in communications and when using the activities available in the classroom. Children are expected to return their chosen activities back to the place where they are kept, complete and ready for another person to use; in other words, how they found them. This ability to return materials to the shelf may take quite a lot of modelling and consistency of expectation. A patient and creative approach from the adults, alongside the positive example set by older children, will be beneficial to the younger children, who may initially find it difficult to remember what is expected of them.

It is these responsibilities that also guide the child towards social awareness, the ability to share and what Montessori (1988a) calls the ‘cohesion of the social unit’. Children mature into their social awareness, not only through the modelling of adults, but also from examples given by the other children in the group. The favourable environment supports children’s individual progress, but it does not mean that the social aspects of life are unimportant. For Montessori the
Children’s House offers family groupings of children, allowing the older, more settled children to model behaviour. They also have the opportunity to become ‘teachers’ when a younger child needs help or wants to know how to use an activity. The older children are often the first ones to remind the younger ones to put away their activity, or to help them with tasks such as putting on shoes or a coat.

In the Montessori classroom, we witness many displays of attentive empathy as well as younger children being given time to try things on their own. This peer support spontaneously emerges and is seldom prompted by the adults in the classroom. From the point of view of the younger child, it seems so much more sensible to be able to follow the lead of a peer whom you admire rather than be guided by the adult. It is quite common for the older children to share activities with the younger ones and to help them where appropriate. From this spontaneous support for one another grows a unity of the group, which heightens awareness of courteous behaviour, kindness and generosity among the group. ‘This unity born among the children, which is produced by a spontaneous need directed by an unconscious power, and vitalized by a social spirit, is a phenomenon needing a name, and I call it “cohesion of the social unit”’ (Montessori, 1988a: 212).

**Reality and nature**

It is imperative that the materials and activities available on the shelves reflect the children’s growing developmental needs as well as their interests, and are real or three-dimensional models rather than two-dimensional pictorial representations. For example, if we speak about shells, plants, skeletons or stethoscopes, it is best to have these objects actually present in the classroom to encourage their exploration through the senses and the extension of vocabulary. This approach is also advocated by *First Hand Experience, What Matters to Children* (Rich et al., 2005) and as part of the rich learning opportunities offered by the ‘Forest Schools Programme’ now practised by many Montessori and other nurseries and primary schools in the UK.

To cite another example, the Montessori sensorial materials include a selection of solid (such as a cube, cone and pyramid) and flat shapes
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(such as a triangle, square and circle), all made of wood, which the child can explore and use to absorb the properties of these shapes. These materials serve as a springboard for exploration of everyday objects with these properties, both found in the classroom as well as at home and in the wider environment.

As it is the teacher who is the custodian of the environment, they ensure that the classroom reflects nature by finding ways of including fresh flowers in the classroom, by offering opportunities for observation of nature both inside and outside the classroom, and by ensuring that the nature table reflects not only the seasons, but also the interests of the children; that it is vibrant and alive and enticing. The nature table (sometimes referred to as the project table) should also offer opportunities for children to contribute towards the daily life of the classroom. Children should be given regular opportunities to explore nature through gardening and nature walks, and the ‘outdoor classroom’ should offer these activities as part of the learning programme.

**Beauty and harmony**

Another important feature of the favourable environment is its beauty and harmony. Montessori (1988b) felt very strongly that the environment has to be pleasing, so as to invite the child to activity. She also felt that the materials, activities and occupations should entice the child and for this reason, all other decorations within the room are kept very simple, so as not to distract the child’s attention. This simplicity also means that the child is able to act autonomously within the environment, not only choosing activities, but also having the ability to wash up after snack time, clean the easel after painting, wipe the table should anything get spilled and so on. The child’s ability to contribute towards the care of the environment is seen as one of the contributing factors to freedom with responsibility and creation of a cohesive social unit.

The harmony of the environment is represented by the organisation of the classroom and also by the purposeful, quiet atmosphere in which children are engaged in self-chosen activities corresponding to their needs. This is one of the fundamental differences between a Montessori
classroom and other early years provision – the calmness of the classroom is often commented upon by visitors and teachers are asked how it is achieved. It is the self-directed nature of the activities that promotes this harmony; if the children are truly free to choose what they need to do and are not coerced into doing things simply because adults ask them to, it is more likely that they will be engaged, able to concentrate and ultimately satisfied with the outcomes of the activities. Generally, the Montessori classroom is a hum of activity; not silent, but not loud and chaotic, characterised by children engaged in activities working on their own, with a friend or in small groups, depending on their age, interest and abilities.

The beauty of the environment symbolises the teachers’ commitment to the respect for the children in their care. The adults ensure that materials are kept in excellent condition and that their own behaviour is gracious and polite. In fact, the classroom for three- to six-year-olds should truly be a Casa dei Bambini (Children’s House): a place in which children are comfortable, relaxed and feel at home so that they can reveal their true nature (Montessori, 1988a).

**Outcomes of the favourable environment**

Montessori observed children in the classroom working on their own and in small groups, some being quick and others taking time to repeat an activity several times, each following their own rhythm. Bearing in mind that within one classroom in England today there are likely to be two-, three- and four-year-olds, we also need to acknowledge that any timetable for the morning would be inappropriate because it would disturb the natural rhythm of the individual children. The span of the morning, usually a three-hour period, is what Montessori termed the *work cycle* (best described in the language of the EYFS as continuous provision).

During this time, children will engage in a variety of activities, and if this period is not interrupted by an arbitrary adult-imposed schedule, the child will have time to reveal their natural tendencies and sensitive periods. It is wonderful to observe settled children entering the
Montessori classroom in the morning. As soon as they have got themselves ready for the day and said goodbye to their parents and carers, they select an activity. For some, this first task is always the same; it may be painting, a puzzle, a book or a writing task. It may be that way for a week or two, perhaps a month and then it changes, reflecting the child’s growing interests and developing sensitive periods. Usually this activity helps children to ‘settle into the routine of the day’.

The child then proceeds to select other activities, each following the same pattern – making a conscious choice, taking the activity to a chosen place, working with it, putting it back into its container and replacing it on the shelf. This we call the cycle of activity. Within any morning, the child will conduct many cycles of activity and will do some of them on their own, others with friends and others with the adults in the environment. As the morning progresses, the child usually gets involved in one or two activities that will particularly engage their concentration, and there will be also times when the child begins to wander, finding it more difficult to make a choice.

Montessori (1991) believed it was important to give the child the time to find what they need. She warned adults against interrupting the child during ‘the false fatigue’ (the time of search for the next activity). The child needs to be able to select the subsequent activity by themselves in order to be able to get involved in an activity that meets their individual needs, to help them become absorbed and engaged in what they are doing. Montessori (1988a) speaks of the child demonstrating their volition. These periods of concentrated work interspersed with times of searching are described by Montessori as the curve of work. Careful observations of each child should produce evidence of a particular curve of work unique to the individual. The more focused and settled the child is, the longer the periods of engagement are and the shorter the false fatigue is. Montessori warns teachers against stepping in and interrupting the false fatigue as this undermines the child’s ability to make decisions for themselves. The teacher who is afraid of losing control of the class (in other words, who does not trust the children) replaces the children’s will with their own decision to do something with a group or suggests having a snack or going outside, so imposing their own ideas on the natural rhythm of the individual.
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children. The curve of work is an ideal tool for recording of any free-flow of activity.

The child, who benefits from the extended work cycle and the freedom within the limits of the favourable environment, will gradually be able to exercise a certain amount of self-control. First, by putting an activity away; then, by thinking of others as they clean the snack table ready for others to use; and finally, by having sufficient self-control to be able to share a game with a child, or be able to say ‘You have it now, I am happy to wait’. This process of maturation takes time and could be compared to trekking in the mountains, up and down, with some days being easier than others. Gradually, over a period of time, the child develops self-discipline, having experienced the richness of the environment, compassion, generosity, trust and respect of the adults and peers, having had the time and the opportunities to know themselves. It is the child with these characteristics whom Montessori (1988a) calls the ‘normalised child’. She used this term, with its admittedly problematic connotation in today’s usage, to describe a child who follows the normal/natural path of development; a child who has developed physically; who has had the opportunity to develop their personality; and who has also experienced rich learning opportunities as well as the benefits of being part of a social group and benefits from loving and caring relationships at home and at nursery.

The teacher

The learning materials developed by Montessori represent the foundation of the favourable environment, prepared for children. However, it is the teacher’s duty, based on their observations of individual children, to add, complement or cultivate these activities to meet the individual’s needs. It is incredible that these materials, developed almost one hundred years ago, remain relevant and engaging for children today. However, they must not be seen as the only requirements of the classroom; just as Montessori modified and continuously developed the activities offered to the children of her day, so the Montessori teachers of today have a duty to extend the range of
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materials on offer. These additions should reflect and complement the principles on which the original materials were developed. This requires well-informed practitioners, who have a sound understanding of not only the materials, but also of child development, both from the Montessori perspective as well as from the point-of-view of current developmental theory.

It is also expected that Montessori teachers reflect upon their work with children and are able to share their thoughts and understanding of children with their colleagues and parents. It is my understanding that this reflective practice is an aspect of what Montessori (1988a and 1988b) herself called the spiritual preparation of the teacher. Further elements which, according to Montessori (1988b), contribute towards this preparation are humility, and respect for humanity and the planet. Wolf (1996) offers further insights into the spiritual nature of the Montessori approach including the preparation of the teacher.

All children have potential, curiosity and interest in participation in social interaction, establishing relationships, constructing their learning and engaging with much of what the environment offers them. Teachers need to be deeply aware of the children’s potential and ensure the environment responds to the children’s needs and interests.

When considering the ‘normalised’ child, we must also reflect on the role of the teacher as a key factor in preparation and maintenance of this favourable environment and so indirectly helping the child follow their natural path of development. Throughout this chapter, I have already referred to aspects of the teacher’s role in the preparation of the favourable environment and I will now reflect on the unique nature of the teacher as a facilitator of the child’s learning.

Montessori (1988a and 1988b) described the teacher as the director/directress; as the one who, like the film director, oversees all that is happening in the classroom in order for the child to be able to learn spontaneously. While Montessori may have had this focus in mind, it is also evident that many current Montessori teachers see their role today as facilitators; they guide and help children’s access to the classroom resources. This is where the teacher makes the link between the environment and its materials and the child. This link is understood to be an active one in terms of the preparation and accessibility
of the classroom, but a passive one in terms of the conventional teaching role.

Montessori saw the child and their spontaneous interest in the environment as the key to the learning process. Therefore, she speaks of the child’s auto-education or the child’s ability to teach themselves through the carefully prepared environment. This approach requires a change in the attitudes of the adults who work with small children. First and foremost, it requires implicit trust in the child’s ability to select activities relevant to their stage of development and also trust and understanding of the materials available to the child. The teacher must be confident in knowing that whatever is on offer in the classroom has a specific purpose that will benefit the child in some aspect of their development.

It also requires an adult, who will be able to help the children settle into the environment, to show them how it works and what it has to offer, and then to withdraw when the child is able to access the activities on their own. This approach gives children the opportunity to observe, explore and investigate the activities in the environment. This does not mean that the teacher abandons the child; they continue to observe and will lend a hand should the child need it, possibly suggesting a different approach or asking another child to offer help. The teacher may also join the child once an activity has been completed, so that they can talk about what the child discovered or why they approached the problem in a certain way, or admire the outcome. However, Montessori warns us about interruption of the child, who is concentrating on a task as this interruption may disturb a train of thought or the moment when a problem is just about to be solved. Montessori sees this interruption as undermining the child’s efforts.

As the child settles, the teacher’s role changes from an active one to that of a more passive facilitator. This is referred to by Standing (1984: 302–304), rather confusingly, as ‘transference of activity’. The teacher continues to modify the environment for individual children through observation and occasional lessons. The lessons are offered when the child is ready to be introduced to new areas of the classroom or aspects of their learning.
Alongside consistent and skilful observation, this change of role is the biggest challenge for the Montessori teacher: at any one time, there are children in the classroom, who require more active interactions, while some will be less dependent and others will themselves become the teachers of the younger children. This is where the teacher’s ability to observe, reflect upon and interpret children’s behaviour will be their most useful tools. These observations will also serve as a means of record-keeping and assessment and to inform any planning and modification of the environment.

Many adults are attracted to Montessori teaching by her vision of the child as an autonomous learner and our own desire to share what we know with children. It is inevitable that these two aspects of our motivation will be in conflict with each other and how each teacher resolves this conflict results in the quality of Montessori provision.

The preparation of the teacher that Montessori talks about in her writings (1964, 1966, 1988a, 2012) requires sound knowledge of the Montessori philosophy as well as pedagogy, incorporating aspects of these two disciplines to developing observational skills and teaching strategies, as well as knowledge and understanding of how children develop and learn.

The Montessori teacher will also engage in supporting the families of the children attending the setting. A close partnership is required if the child is to benefit from the Montessori approach. Montessori herself recognised that both the nursery and the home have to share the values of ‘following the child’ if we are to nurture the true potential of the whole child.

Inevitably the teachers of today, and of the future, will also need to know about the current legislation and requirements for caring for young children, as well as being familiar with the current trends in early years education and care. Like all teachers, the Montessori teacher will have to be committed to continued learning, as teaching also means on-going learning.

Montessori’s vision of future Montessori teachers was that of well-trained individuals, committed to continuous learning. She also wanted teachers to be humble and open individuals, respecting each child as a unique human being.
This chapter focuses on the Montessori early years curriculum and describes Montessori’s views of children’s learning as intrinsically linked with their development. It also identifies the key areas of learning found in Montessori early years settings. These areas of learning are defined by the activities and occupations identified and designed by Montessori (1965 and 1988b) as significant or essential in the development of children’s skills and capabilities.

**Learning is holistic**

For Montessori (1988a and 1988b), learning is a key to children’s development and education as the main contributing factor to the child’s preparation for life. However, she also recognises that young children do not learn subjects, but that their learning is integrated and holistic in its nature. The child’s ability to observe, explore, investigate, ask questions, share ideas and so learn about the world is not necessarily organised into lessons or subjects. The child observes and explores when they become interested, when they are able to engage in an activity which involves their whole being.

This child needs an adult, who is able to respond to their investigations wherever and whenever they occur – be it during bath-time, while listening to a story, on a walk, when digging in the garden or during a lesson. A responsive adult will try to answer, question, wonder
or observe with the child and together they may discover some of the answers. The child may also need adults who listen to their hypotheses, discoveries and investigations and simply smile or nod in response, or adults who model skills and behaviours.

Therefore, if we wish to define the early years curriculum, we need to recognise that in the early years, ‘learning occurs constantly whether intentionally or incidentally’ (MacLeod-Brunell, 2004: 45). We need to examine not only what the child learns but also how, in order to appreciate the complexities of learning in the early years.

**Play is the best tool for learning**

It is also generally agreed today that play is the most effective tool for the child’s learning (Bruce, 1991; Jenkinson, 2002; Moyles, 2005). Here, we have to try to unravel one of the big Montessori conundrums. Early on, in the first Children’s House, Montessori discovered that children preferred work to play, and so throughout her writings, she refers to children working rather than playing.
This emphasis on work as opposed to play has constituted one of the key criticisms of the Montessori legacy by the early years community. It is important to try to understand what Montessori herself meant. Her observations of children led her to the understanding that the nature of the child’s work is fundamentally different to the nature of the adult’s work. According to Montessori (1988a), the child is interested in the process whereas the adult is interested in the product. The child is happy to repeat the process; they are perfecting their skills through repetition. Just think of a three-year-old who is helping to wash up, standing at the sink and washing the same plate over and over again. They wash it, put it on the draining board and then take it back off and wash it again. The result may not be perfect. However, the repetition serves as a tool of achieving competence and, in turn, of the construction of the human being.

‘A child is also a worker and producer. Although he cannot share in the work of adults, he has his own difficult and important task to perform, that of producing a man’ (Montessori, 1966: 193). This quotation reflects another perspective on the work-versus-play debate. Montessori recognised the enormous task all children undertake within the developmental process of growing-up and maturing. She saw this to be the child’s work. According to Montessori, all the activities within the classroom contribute to the child’s development. So when children engage in these activities, they are working towards ‘the creation/construction of man’.

This philosophical perspective on the nature of the child should be considered every time Montessori speaks in earnest of the child’s work. I believe Montessori’s emphasis on work needs to be seen as the child’s need to do, to be active, to manipulate and so to learn – it does not negate the importance of play. For her, play is the child’s work, but we must also acknowledge that children enjoy doing work and young children do not usually distinguish between work and play. Adults usually associate work with effort, and play with fun. However, we must also acknowledge the enormous effort evident in sustained high quality play, which engages the whole child and culminates in feelings of satisfaction, joy, competence. This sense of well-being is also associated with well-accomplished tasks related to work.
We also need to consider the historical perspective of Montessori’s writing. Her discoveries, on which the majority of her writing is based, were made in the early twentieth century. At this time, there was little psychological knowledge about children. Montessori’s ideas were formulated before Melanie Klein (1882–1960) and Anna Freud (1895–1982) developed their thoughts about play therapy; before A.S. Neil (1883–1973) set up the Summerhill school, or John Holt (1967) wrote *How Children Learn*. When we consider the research and writing of Jean Piaget (1896–1980), Lev Vygotsky (1896–1934) and Erik Erikson (1902–1994), which were not available to Montessori in the early part of the twentieth century we can discover many of her principles reflected in their research, thus providing a theoretical research based foundation for her intuitive view of the child.

Montessori’s own life bears testimony to the importance of diligence and hard work if we want to achieve anything as individuals. Therefore, it is not surprising that she focuses so much on work and the task of self-construction and means of self-fulfilment.

Furthermore, it is important to highlight that many of today’s Montessori practitioners acknowledge the importance of play in the lives of children. The present-day training of Montessori teachers explores the issues relating to the nature of the child’s work and play. Children themselves relate to work in their play such as when pretending to be their parents or when they come to early years settings ready to do ‘work’.

In the context of the Montessori classroom, it is up to the practitioners to understand the nature of the child’s self-construction and not to differentiate between play and work, just as the child does not – they are simply keen to do things! Competent practitioners should be able to interpret the child’s learning and development as documented in their observations. They should be able to explain the value and benefits of all the materials, activities and occupations available to the children in the classroom. These activities could be teacher-led or child-initiated. They could also evolve spontaneously or with support from the activities available on the shelves, demonstrating creativity and imagination.
Montessori areas of learning

Whether we call it work or play, the activities in the Montessori classroom have clearly defined aims and so contribute to the child’s development and learning. For Montessorians, these activities represent the curriculum; a curriculum which is led by the interests of the individual, supported by peers and adults in the environment.

Montessori learning for babies and toddlers

In most Montessori environments for babies and toddlers, you will find children engaged in activities, which support development of physical skills, sensory experiences and their emerging independence. Heuristic play is encouraged using treasure baskets and heuristic bags, freely available to encourage spontaneous engagements. Songs, rhymes, stories and books are part of the daily routines, as are opportunities to be independent at meal times, basic hygiene and getting dressed. The children spend much time outside the classroom playing with water, sand, pushing trolleys, bicycles and climbing slides. Simple puzzles and manipulative toys such as posting and sequencing boxes are available on open shelves. Toys which encourage walking, such as trolleys and prams, are available alongside walking platforms accessible from two or three steps. All these activities promote walking and balancing skills at an early age. From the range of traditional Montessori materials, early practical life and sensorial activities and language activities, supporting development of vocabulary, are available to the older toddlers.

Practitioners should respect the children’s natural rhythms as reflected in their individual routines. There should be opportunities for spontaneous nap time, quiet play, independent snack and outdoor play throughout the day.

Learning is planned on an individual basis with daily routines, such as nap time, rest time and meal time, contributing significantly to the child’s learning about their world and about the relationships with adults and peers.
Currently, there are not many Montessori environments for babies and toddlers in the UK which adhere to Montessori practice for babies and toddlers described by Montanaro (1991) and Lillard and Lillard Jessen (2003) as infant communities. However, interest is growing in this area of practice and many of the principles have been introduced into home-based childcare delivered by child-minders.

Many Montessori day-care settings with provision for three months to five-year-olds adopt mainstream practice in their baby and toddler rooms, whilst focusing on Montessori provision for the two- to five-year-olds. This trend has been reflected in the accreditation of Montessori nurseries as delivered by the Montessori Accreditation and Evaluation Board since 2008.

Montessori learning for three- to six-year-olds

During the past fifteen years, we have seen a significant change in Montessori early years environments. The government’s funding of pre-school provision for all three- to four-year-olds has resulted in the majority of maintained schools offering reception class places to children in the September after their fourth birthday, mirroring the trend of the successful independent pre-preparatory schools. Combined with the compulsory school age, which in England is in the term after the child’s fifth birthday, we find that most Montessori nurseries now offer places to two-year-olds and see these children leave at the age of four. However, the curriculum described below relates to the education of children from two-and-a-half/three to six/seven years of age.

As mentioned in Chapter 2, in the description of the favourable environment for three- to six-year-olds, the Montessori areas of learning broadly correspond with the physical organisation of the classroom for:

- practical life (or activities of everyday living);
- refinement of the senses;
- communication, language and literacy;
The Montessori early years curriculum

- numeracy and arithmetic;
- cultural aspects of life (or ‘understanding of the world’ in the foundation stage curriculum);
- creativity.

**Practical life**

The activities in this area reflect the children’s need to model behaviours reflecting their family life. They also allow children to contribute towards the cultural and social life of the classroom, offering them the opportunity to experience a sense of belonging.

One of the aims of the practical life activities is to make a link between the home and the new environment of the Montessori classroom. This is done by representing tasks and activities with which children may already be familiar from their home environment such as pouring, dusting, getting dressed, sweeping the classroom or leaves in the garden and so on.
While they are carrying out these activities, the children perfect basic skills that will aid their independence both in the classroom as well as at home. They learn to pour their own drinks, serve food, tidy their own activities, wash their hands, wash up after their snack, water and tend to the plants inside and outside the classroom, feed the pets and many more skills. The main aim of any practical life activity is to develop and perfect skills that will contribute towards the child’s autonomy.

Another aim common to all practical life activities is their active nature. Children manipulate and so perfect their gross and fine motor skills as well as co-ordination of movement, hand–eye co-ordination, dexterity and pincer grip. Just imagine the range of physical skills required to use pegs, scissors, tongs or tweezers, to plant a seed, to rake the lawn or to offer a snack to a friend. These skills contribute further to their autonomy.

They enhance the child’s sense of belonging by providing them with skills which contribute to the daily routines and upkeep of the classroom – such as washing their plate and glass after a snack or sweeping leaves in the garden.
The Montessori early years curriculum

The orderly nature of these activities supports the child’s need to exert control over their environment and enhance their sense of wellbeing by the predictable and consistent nature of their organisation.

All the activities in this area of learning enhance children’s ability to concentrate, to organise, sequence and order the activity, and to pay attention to detail, such as replacing utensils at the end of an activity.

Consider the following example of a two-and-a-half/three-year-old deciding to have a snack. They will know the routine of what is required. For example:

- first check if there is a space available at the snack table;
- wash hands;
- select from the food on offer such as fruit, raisins, biscuit, cracker or a rice cake;
- select a drink and pour it into a glass;
- take the plate with the snack and the glass with the drink to the snack table;
- eat it while chatting to a friend;
- when finished, wash it all up, dry it; and
- dry hands, ready to do something else.

This routine illustrates well how self-contained individual practical life activities contribute to the complex routine of having a snack and how much the child learns from every such routine and how a physical activity contributes to the holistic development of the child in the following ways:

- The sequence requires memory, problem solving and estimation when choosing the snack and drink and when washing the dishes.
The social interaction at the snack table contributes towards growing social awareness and communication skills. Often, two friends will decide to have a snack together and will be helpful to each other as well as have some fun while eating.

When all is finished, imagine the sense of achievement for the three-year-old, who has managed it all by themselves including the washing up!

There are many examples of such complex routines in the Montessori classroom that build on the individual skills practised in the practical life area of the classroom.

Generally, the practical life activities are divided into three distinct groups (Gettman 1987):

- exercises for refinement of movement – such as pouring, transferring, cutting, gluing, folding, opening and closing of boxes/bottles, and threading.
- exercises for care of the environment – such as sweeping, polishing, dusting, washing up, and looking after plants, pets and the garden.
- exercises for care of self that include activities and skills supporting personal independence – such as washing hands and blowing one’s nose, putting on shoes or wellingtons, as well as activities promoting grace and courtesy – such as greeting visitors, offering a snack to a friend, and asking for help.

The practical life activities are often the first area of interest for the newcomer to a Montessori classroom because of their familiarity, relative simplicity and self-contained nature. However, as children become more competent, the skills acquired in this area will be used daily in supporting the organisation and maintenance of the classroom. They become the daily life of the classroom as children will offer to wipe tables after an activity, sweep up after lunch, wash the dishes or dirty polishing cloths. The activities take on social importance and give children opportunities to contribute to the wellbeing of the group, and
in the process boost their self-esteem and reflect their responsibilities within the group – a positive illustration of the ‘cohesion of the social unit’ we have discussed in the previous chapter.

The practical life activities also often act as the ‘secure base’ (Bowlby, 1988) for children, who may be worried or anxious; their simplicity will offer security and predictability as well as opportunities to be successful at achieving the chosen tasks. Whilst children carry on with their practical life activities, you will often overhear their monologues reflecting symbolic play (Piaget, 1962). As they pour water from a jug to a glass, they are preparing a cup of tea for a friend, or medicine for their sick dolly. In this way, the activities act as a catalyst for spontaneous imaginative play, which usually takes place in the ‘home corner’ of mainstream settings.

It is important to add that just as these activities reflect everyday life, Montessori believed it was very important that they also reflect the culture of the children. Today’s Montessori classrooms are often as international as the approach and so you may well observe the use of chopsticks, preparation of Arabic dishes, or re-enactment of a Japanese tea ceremony as well as the use of African beads in threading activities or making of bread for a harvest festival.

As part of this area of learning, you may encounter a game called Walking on the Line. Fundamentally, this is a balancing game, focusing on following a line drawn on the floor. Children can make this game more challenging by walking on the line whilst carrying different objects such as a flag or a glass with water. This activity also offers challenges in negotiation if several children take part in the game at the same time.

Another game often played in Montessori classrooms is the Silence Game. This game has been inspired by a baby visiting a Montessori classroom. The baby’s stillness prompted Montessori to urge the children to listen to the stillness and quietness created, not only by everybody’s adoration of the baby, but also by the baby herself. Montessori developed this activity further to encourage children in moments of stillness to be shared by the whole group. The Silence Game gives children the opportunity to demonstrate their self-discipline during the shared moment of peace. This game is not played as a
means of settling or calming a group of children. Only those children who are mature enough to control their movements and have the necessary self-discipline will benefit from the social experience of the Silence Game.

**Refinement of the senses**

Activities in this area of the classroom represent the early materials developed by Montessori. Some of these were inspired by Froebel’s Gifts, such as the geometric solids, while others can be linked with Seguin and still others are Montessori’s own inventions.

The main purpose of these activities is to help the child organise and classify the impressions of the environment gathered during earlier stages of their life. Opportunities to use treasure baskets, engage with heuristic bags and explore nature all contribute to real experiences of the world, which are developed further whilst using the equipment and activities in this area of learning. Sensorial materials offer systematic refinement of the five senses as well as the child’s stereognostic and
kinaesthetic sense, which represent the exploration of three- and two-dimensional forms (in the Montessori context, the geometric solids such as cubes, prisms, cones, pyramids, and outlines of squares, circles and triangles respectively).

For Montessori, these materials hold the key to the understanding of fundamental concepts and the possibility of the expansion of the child’s cognitive capabilities. The materials respond to the child’s sensitive period for refinement of the senses (Montessori, 1966), offer opportunities for manipulation and the extension of vocabulary and further exploration and application beyond the realm of the Montessori classroom. With their frequent focus on matching, pairing, sorting and grading, they are also integral to building the foundation for mathematical understanding (Liebeck, 1984).

The activities for the refinement of the senses focus the child’s attention and learning on each of their different senses:

- The visual sense: the child explores the properties and relationship of cubes, prisms, cylinders and rods, as well as the relationship of colours and their shades.

- The stereognostic sense: the child builds on the tactile and visual experiences of geometric forms as they explore the properties of the solid shapes by grouping them according to same/similar properties (such as whether or not a shape rolls), comparing them to the two-dimensional shapes of their bases and matching pairs of solid shapes. An activity in this area, which focuses on the tactile aspects, without using visual discrimination, is the mystery bag. This bag contains sets of matching objects; the child is expected to pair them by feel. The child also has an opportunity to learn about flat shapes, using both the visual and kinaesthetic senses. They explore them further as they come to work with the binomial and trinomial cubes. The knowledge of flat shapes is extended by giving children opportunities to make patterns.

- The tactile sense: the child explores varying textures of sandpapers, fabrics and papers.
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- The baric and thermic sense: the child also has the opportunity to work with tablets of varying weight and temperature.

- The auditory sense: the child engages in a range of activities that heighten listening skills using sound boxes. In addition, the child is introduced to the tonic sol-fa and notation using the bells.

- Taste and smell: the child does activities involving food, including cooking, and learns about flowers, fruits and vegetables in cultural lessons.

The activities available in the sensorial area offer children keys to the universe (Montessori, 1988a) – points of reference to key concepts such as shape, size and so on. They are organised in such a way as to support assimilation and accommodation of schemas, and so contribute towards concept formation through the manipulative nature of the activities. For Montessori, vocabulary expansion has a specific purpose in the context of these materials and in order to teach new vocabulary, the Montessori teacher uses a technique developed by Seguin called the three-period lesson.

The sequence in which we work with the sensorial materials focuses first on exploration of qualities, then on systematic identification of properties of the materials followed by vocabulary expansion that serves to ‘polarise the child’s attention’, as Montessori (1988a) called it, and so to maximise the child’s learning potential.

From the point of view of Montessori education today, the sensorial activities still form the foundation of later academic learning. It is also important to understand that like all foundations, the opportunity to extend the child’s knowledge of these concepts and apply them to contexts that are familiar and meaningful to the child is very important. Through the application of these concepts in a social context, we can see what the children learned and understood by using the sensorial materials. For example, it is important for Montessori teachers to offer opportunities for open-ended exploration of the qualities and properties of shapes by offering children opportunities to use unit blocks (Gura, 1992). They can also make patterns using collage and drawing. We can also encourage immediate extensions of classroom learning.
into the outdoor environment by applying the tactile classroom experiences to finding rough and smooth surfaces in the garden or on a nature walk. Equally, outdoor experiences can be applied to activities available inside the classroom such as looking up a bug in a book or playing sound lotto, which relates to sounds from nature such as bird song or thunder. The older child can extend their knowledge of the Montessori bells and music notation to playing an instrument or being encouraged to compose original music.

Sensorial activities prepare children for academic learning later. It has been pointed out that by working with the geometric forms and other materials, the child learns to classify and organise information by matching, pairing and grading objects; this will be beneficial when exploring the one-to-one correspondence between quantities and symbols in mathematics, and when sequencing numerals. Many of the sensorial activities will also serve as beneficial preparation for other areas of learning, such as listening for small differentiations in sounds, which will tune the ear to listening out for letter sounds. The child will use visual, auditory and tactile experiences when they are introduced to sandpaper letters or numerals (as described on pp. 00 and 00) when letter/numeral shapes will be absorbed kinaesthetically, using all three senses as well as muscular memory.

The practical life and sensorial activities are usually offered to children from the age of two and will be the main focus of the children’s learning in the Montessori nurseries in England where children usually enter into reception classes of primary schools soon after their fourth birthday.

**Communication, language and literacy**

Montessori was surprised by children’s ability to learn to write and read much earlier than generally expected when she started to explore the possibilities in this area of learning. This was at the request of the parents whose children attended the first Children’s House. It is important to understand and appreciate that introducing reading and writing in the Montessori classroom is possible because of the
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foundation laid in the practical life and sensorial areas, but should only take place if the children show interest. The activities and materials such as insets for design and sandpaper letters should not be used as tools for accelerated learning. Listening to stories and rhymes, engaging in conversations as well as hearing rich use of language are the essential stepping stones, which prepare children for later literacy activities.

Availability and use of a good range of books, and the increased phonological awareness of the child (achieved through games such as *Odd Man Out* or simplified *I Spy*) play a crucial role in laying the foundation for learning to read and write. However, it is also important to remember that not all children will be ready or interested in being introduced to letters and writing in nursery; the key to identifying the child’s readiness remains in the adult’s observations and conversations with the child.

The journey towards reading and writing is often initially motivated by personal interest, such as recognition of one’s own, a friend’s or sibling’s names. It is vital that we acknowledge that in the early years this journey is likely to be longer and not as clearly defined as it is when the child is five, six or seven.

Ever since the early days, Montessorians have approached this area of learning through phonics, focusing on letter sounds and shapes using the sandpaper letters. They provide a multi-sensory approach to absorption of the letter sounds and shapes by visual, auditory and tactile means.

Children are prepared for use of writing implements early, both through the refinement of their fine motor movements within the practical life areas of the classroom and within the creative area. Their ability to control a pencil is further refined by the use of insets for design.

The child first learns to build words using cut-out letters (many children do this at home using magnetic letters to form their names and familiar words on the fridge) and by careful listening to letter sounds. They start by building words with predictable patterns of a single, short vowel placed between the two consonants, such as cat and mat. Use of ‘onset and rime’ (Lawrence, 1998; MCI, 2012) at this stage of learning serves as an important tool for the introduction of reading and so the decoding of words.
Further challenges are presented gradually by first introducing consonant blends such as pr- (pram), fr- (frog) and st- (stem, stamp), before words with more complex spelling are tackled. Each spelling difficulty is introduced through a series of reading and word-building activities, which help to memorise the new letter pattern. The child has the opportunity to work systematically through boxes, identifying blends, digraphs, trigraphs and phonograms. The individual boxes offer reading activities, whilst the word-building activities highlight spelling patterns. Further reading opportunities are available in word lists, phrase and sentence strips, and reading books, accompanying the different levels of complexity, supporting growing reading skills.

In the Montessori classroom, children are also introduced to grammar using colour-coding for parts of speech and building sentences with the help of objects. These activities offer sensorial introduction to grammar and also serve as extra reading opportunities.

Wherever possible, we offer the child objects that can be manipulated in order to both prompt and scaffold their learning. As explained previously, due to the early age at which children leave Montessori nurseries in England, it is the phonological awareness and general pre-reading activities such as storytelling, using books with props or sequencing of stories and games such as *I Spy* and *Simon Says* that prepare children for more systematic literacy work in primary schools.

**Numeracy and arithmetic**

Children often come to nursery with a passive knowledge of numbers through everyday use, such as counting steps, reciting nursery rhymes, looking at number books and recognising numerals on car number plates or on houses. They may also have the ability, for example, to count the three candles on a birthday cake and recognise the numeral on a birthday card. Initially children are introduced to concepts such as matching, pairing and sorting, and to shapes and patterns in the sensorial area of the classroom. These concepts prepare them for later work in mathematics.
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The Montessori numeracy and arithmetic materials offer a systematic approach to learning about the integrity of numbers in relation to numerals, always using objects to support the learning. The golden bead materials, designed to introduce children to the hierarchies of the decimal system while exploring the place value using both the beads and the written symbols of the large number cards, are probably the most unique and original contribution made by Montessori to the learning of mathematics. They give the child the opportunity to explore the relationships between the hierarchies of the decimal system before the child is presented with addition and subtraction of units.

All activities within the nursery mathematics syllabus are presented to the child through the use of objects while gradually building an understanding of number. The tools for introduction of operations such as the addition and subtraction of numbers up to twenty are often introduced at nursery whilst multiplication and division tables are usually available to five- and six-year-olds attending Montessori school. They are rarely used in Montessori nurseries in England due to the children’s early school leaving age.

Montessori classrooms also give children opportunities to use number knowledge through daily activities and within contexts meaningful to the child, such as counting how many biscuits will be needed for snack or recognising numerals on a birthday chart. Number books are always on display, children often play number games in the garden or playground, and weigh and measure ingredients while cooking and gardening; all these experiences serve as meaningful tools for the application of counting skills in the daily life of the classroom. The role play area is another place where children use number knowledge spontaneously and with great eloquence.

**Cultural aspects of life, generally referred to these days as knowledge and understanding of the world**

This area of the classroom has the fewest prescribed materials. It offers opportunities for children and teachers to explore a wide range of topics of interest in biology, geography and history. The activities in this
area should centre on real experiences that provide children with openings to observe, explore and investigate such things as trees, seasons, farmyard animals, the solar system, how a volcano works and so on.

In the areas of natural sciences such as botany and zoology, we start by observing and becoming familiar with the immediate environment within the child’s community. We work from the opposite perspective in geography, embracing the whole solar system and exploring the natural aspects of global physical geography before looking at the continents and countries where we live.

The nature/project table is often used as the focus for this area of learning. A range of teacher-made materials complement the child’s initial real experiences. These materials support and develop the child’s language and literacy skills and encourage the child’s individual learning primarily by using matching and pairing teaching strategies.

Like most of the materials in the Montessori classroom, these ones are designed to be used by individual children or small groups,
supported where appropriate by an adult. Very few of these materials are suitable for large group teaching. Most of the activities in this area of learning should be planned with the children and built on their interests, rather than determined by adult perceptions of what the child should learn.

History is explored through timelines and natural cycles that help children understand the passage of time, a concept alien to most children. This is seen as preparation for later and more systematic study of natural history from an evolutionary perspective.

The exploration of continents and their countries also gives us opportunities to examine similarities and differences in the lives of children and their families around the world. Montessori saw these activities as important learning tools in developing children’s understanding of and respect for all humanity as a foundation towards peaceful co-existence. Peace education continues to be a key aspect of the spiritual development of the child in the Montessori classroom and is extensively enlarged upon in the Montessori primary curriculum through the concept of cosmic education (Montessori, 1989d, 1994, and Montessori Jnr., 1992).

For Montessori, cosmic education represents not only the idea that each one of us is part of the larger cosmos, but also that we are in a state of constant change or evolution. Nothing is static in the universe, and all living as well as not-living aspects of our existence are interconnected and interdependent on each other. This interrelationship places a great responsibility on each one of us. We are all part of this universal link and our individual actions and behaviours ultimately impact on the existence of all humanity.

**Creativity**

This area of learning acknowledges the importance of self-expression and highlights the need for children to have opportunities to participate in self-chosen and self-initiated arts and craft activities, as well as music, movement and dance, and socio-dramatic play.
A well-equipped Montessori nursery has an area of the classroom where children have all the necessary resources freely available to paint, using both an easel and watercolours. Children are also given
the opportunity to draw with a range of good quality tools such as crayons, coloured pencils and felt tips on a variety of surfaces such as paper, and both white- and blackboards. They also have resources to glue and make collages, and to print using stamps as well as natural resources such as vegetables, wood or sponge stamps. Teachers help children in developing skills necessary for these activities, such as how to apply glue or use scissors, but the activities themselves are open-ended and offer endless possibilities for self-expression.

Musical instruments, particularly percussion instruments, are also available for spontaneous use, and teachers sing regularly with the children. Specialist music teachers may join the children regularly to sing and initiate music and movement activities.

Storytelling, as well as story time using books and props, is commonplace in Montessori classrooms. This often happens spontaneously when a child asks for a story, and usually a small group gathers around the adult in the book area of the classroom. Some nurseries also have story time for the whole group at the end of the day. All these activities can be incorporated into the spontaneous, choice-led work cycle and do not require all children to stop what they are doing in order to participate.

Many of these activities happen inside the classroom, but there are also opportunities for these activities to be conducted outside. You may also see a Montessori teacher dramatising stories for children to act out. What you may not see is a role play area using a wide range of props that has been set up by adults on a particular theme, such as a shop or a post office. Much of the role play in Montessori classrooms is spontaneous, inspired by clothes from around the world or emerging from the variety of topics studied in the classroom, such as visits to the seaside or the zoo or, as previously mentioned, emerging from work in the practical life area of the classroom. As with all role play, the best role play scenarios emerge spontaneously when children use their imagination to create their props and when adults support their creativity sensitively without much intrusion.

See Appendix 2 for detailed lists of Montessori learning materials which can be found in the areas of learning of a Montessori nursery.
Having examined the Montessori approach, this chapter will explain links between the Early Years Foundation Stage (DfE, 2012) and Montessori early years practice. It will reflect on the principles which underpin both approaches and make links with the statutory guidance.

The principled approach

When the Early Years Foundation Stage (EYFS) document was first published in 2008, it highlighted the need for establishing robust principles to underpin early years practice. Four key strands were identified, each comprising four aspects. They are: The Unique Child, Enabling Environments, Positive Relationships, and Learning and Development. The wording was revised in 2012, but now significant changes were made, the key features of the principles remain. They reflect the current agenda for children as expressed in the United Nations Convention on the Rights of the Child (UN, 1989). They also reflect Montessori’s aim of ‘following the child’, as described in the previous chapters, by highlighting the close relations between the child, the teacher and the favourable environment in supporting children’s learning and development.
In 2008, the then Department for Education and Skills presented practitioners with an overarching document, combining a regulatory framework as previously included in Ofsted’s National Standards together with guidance for learning and development of children from birth to the end of the reception year. This ambitious plan was intended to streamline procedures and to link all agencies, parents and practitioners working with young children by use of one framework – from child-minders to managers of children centres and head teachers in primary schools. The same approach has been maintained by the Department for Education in the 2012 revision, with the exception of child-minders, and their regulation was further strengthened in the 2014 version of the EYFS which outlines the requirements and responsibilities of the child-minding agencies, who are to oversee delivery of child-minding services in England. Pre-preparatory schools with nurseries within the independent sector were given the option to opt out of the framework under the newly defined exemptions guidelines. Whilst this ‘one-size-fits-all’ approach has not been without challenges, the principled approach has been recognised as an essential component of high-quality early years practice and has been welcomed and maintained by all working with young children.

The Montessori community were given an opportunity to reflect on their practice in relation to the Early Years Foundation Stage by producing the ‘Guide to the Early Years Foundation Stage in Montessori Settings’. This document, funded by the Department for Children, Schools and Families, was produced by the National Strategies and Montessori Schools Association, and published early in 2008 by the Montessori Schools Association. It was revised in 2012 in line with the new documents and it is available from the Montessori St. Nicholas Charity (www.montessori.org.uk) both electronically and in hard copy. Commentary relating to the changes made in the Spring of 2014 are now available electronically. The principles, as expressed all their aspects, challenge practitioners to reflect on their practice and ensure that they are embedded in every element of their daily work in support of the care and education they provide for children attending their settings. So let us examine how they relate to the Montessori approach of ‘following the child’ where respectful and trusting adults facilitate
children’s learning by preparing an environment favourable for their development. ‘Following the child’ also means that practitioners understand that children are active learners, have inner lives which are evident in their motivation and therefore flourish in an atmosphere of freedom. This freedom within limits guides children towards self-regulation as demonstrated by self-discipline. The deep respect for the child is reflected in the Montessori pedagogy, which is built on access to a favourable environment prepared to meet the individual child’s needs and facilitation of learning by empathetic and knowledgeable practitioners.

The unique child

Every child is a unique child who is constantly learning and can be resilient, capable, confident and self-assured.

Practitioners are required to consider the following five aspects as essential in supporting the characteristics of the unique child. To ensure effective learning and development they must:

- Understand and observe children;
- Support development of positive sense of identify and culture;
- Identify additional needs;
- Keep children safe; and
- Value and respect children and families equally.

From the Montessori perspective, these aspects are interpreted as follows:

- **Understand and observe children**

As Montessorians we need to understand both the Montessori perspective of children’s development (as described in Chapter 2) and
be able to interpret it in the context of current theory. This developmental understanding should be evidenced in regular observations, reflected in their evaluations and translated into effective and relevant planning in support of individual learning and development.

- **Support development of positive sense of identity and culture**

  We must trust each individual child in his/her efforts to ‘construct an individual’ and nurture their positive sense of self by providing opportunities for autonomy, offering freedom within limits and nurturing emerging self-discipline. In line with Montessori’s commitment to Cosmic Education we need to respect the culture of each family and give children opportunities to learn respect for themselves, each other and the immediate and wider environment.

- **Identify additional needs**

  We must develop skills, knowledge and understanding to meet each child’s individual needs and be able to find guidance and support from other agencies to nurture all their additional needs. We must adhere to statutory requirements as outlined in the Early Years Foundation Stage framework (DfE, 2012) and other legal documents relating to children’s additional needs.

- **Keep children safe**

  We must ensure through policies, procedures and practice that children in our care are always safe. Each member of staff must understand their responsibilities in relation to the national and local safeguarding requirements.

- **Value and respect children and families equally**

  We must ensure through policies, procedures and practice that children in our care are always valued and respected.
Positive relationships

Children learn to be strong and independent through positive relationships.

Positive relationships are defined by the EYFS (DfE, 2012) as being:

- warm, loving and fostering a sense of belonging;
- sensitive and responsive to children’s needs, feelings and interests;
- supportive of individual efforts and independence;
- consistent in setting clear boundaries;
- stimulating;
- built on key person relationships.

From the Montessori perspective, these aspects are interpreted as follows.

It should be evident from all that has been written so far about the Montessori approach that it is firmly rooted in mutual respect and trust in the child, which are modelled by the adults and older children. It should be reflected in all relationships where children are trusted to be the leaders of their own learning as supported by the favourable environment. Children are also encouraged to think of themselves as ‘citizens of the world’, particularly when engaging in activities and materials which develop their knowledge and understanding of the world. The vertical grouping (organised in three year age spans, according to the stage of development discussed in Chapter 2) in Montessori settings further promotes the mutual respect between children of different ages and contributes significantly towards positive relationships. These principles of Montessori practice ensure that:

- Relationships that are warm, loving and fostering a sense of belonging are at the heart of the respectful, harmonious and peaceful environment which nurtures a positive sense of belonging.
Montessori practice and the Early Years Foundation Stage

- Adults are **sensitive and responsive to children’s needs, feelings and interests**. Relationships are based on detailed knowledge of individual children and evidenced in regular observations which celebrate each child’s unique qualities, characteristics and learning dispositions.

- Montessori practitioners need to provide a learning environment which is **supportive of individual efforts and independence** according to each child’s unique needs and efforts.

- This learning environment offers each child freedom of movement, choice, social interactions and engagements. These freedoms set as their limits the safety and wellbeing and respect for one’s self, others and are **consistent in setting clear boundaries** as expressed within the ground rules.

- The practitioners are the custodians of the favourable learning environment and it is their duty to ensure that the setting meets the individual needs and interest of all the children attending. Based on observation and the Montessori pedagogy they ensure that it entices and engages the child in **stimulating and challenging activities**, giving each child the opportunity to develop their unique potential.

- Montessori settings nurture positive respectful relationships between children, their families and the practitioners. The **role of the key person** is to provide an effective and meaningful communication link between the child, the setting and the family, whilst ensuring that the child continues to make positive relationships with all the children in the setting.

### Enabling environments

**Children learn and develop well in enabling environments, where their experiences respond to their individual needs and where there is a strong partnership between practitioners and parents/carers.**

Enabling environments are described by the EYFS (DfE, 2012) as
• **valuing:**
  - all people
  - learning

• **and offering:**
  - stimulating resources, relevant to all the children’s cultures and communities
  - rich learning opportunities through play and playful teaching
  - support for the children to take risks and explore.

From the Montessori perspective, we need to begin by examining the learning environment before the other three aspects are interpreted.

• **The learning environment** is described in some detail in Chapters 2 and 3 where its role in support of spontaneous learning is highlighted. It is important to mention that many settings add to the activities and occupations which are part of the Montessori legacy. However, these activities should be in keeping with the principles of the Montessori pedagogy. Since the 1950s we have seen expansion of the creative areas of the Montessori environments and children will find high-quality resources for self-expression in a range of art media, collage, modelling, printing, and mark-making, as well as props for spontaneous role play. The outdoor classroom concept should be well embedded in Montessori practice, as should be activities such as gardening and care of pets, which were seen by Montessori (1988b) as essential in bringing children close to nature. Programmable toys and computers have become part of Montessori classrooms too, but generally they would be evident in environments providing for the older children – five-, six- and seven-year-olds. For the younger children, the focus is on providing real experiences, which enhance sensory learning and give children opportunities for learning about their environment. These experiences are seen by the Montessori teacher as fundamental in giving children a firm foundation for all future learning. The nature of
children’s autonomous learning is supported by effective classroom management where practitioners ensure that cycles of activity are observed within the work cycle and where children’s play and work are the key tools for learning, whilst they explore the full range of the learning resources within the continuous provision of the classroom.

- **Observation** has been at the heart of Montessori practice for the past hundred years and serves as the main tool for assessing children’s progress and planning for next steps. Further explanation of how observations support planning in Montessori classrooms can be found in Chapter 5 where children’s learning and development are discussed in more detail.

- **Supporting every child** is how Montessori classrooms work because the emphasis is on individual progress and in the recognition of children’s uniqueness. The organisation and accessibility of all learning further supports opportunities for independent learning and individual progress whilst being facilitated by a sensitive and knowledgeable adult.

- Children in Montessori classrooms are encouraged to see themselves as ‘citizens of the world’ and experience both the immediate community in which they are growing up and also the global community. Therefore, their experiences of the *wider context* of the enabling environment are rich and link with cross-cultural experiences and growing respect for our planet and all life on it.

Before examining learning and development in Montessori classrooms, it is vital to point out that the three principles and their aspects discussed above have to be embedded in the classroom practice as essential components of quality if highly meaningful learning and development is to take place.
The aim of this chapter is to explore how learning and development are delivered in Montessori classrooms and how they integrate with the Early Years Foundation Stage. For this purpose, activities offered to children across the full age-span of the EYFS will be discussed.

**Learning and development is defined by the EYFS by the following statement:**

Children develop and learn in different ways. The framework covers the education and care of all children in early years provision, including children with special education needs and disabilities.

This element of early years practice defines what practitioners must do to ensure the positive learning and development of all children and help them prepare for the next stage of their learning.

- Settings are required to engage parents and carers, working in partnership with them in nurturing their children’s learning and development and this includes effective support for children with special education needs.

- Home language is valued and encouraged at the same time as development of a good level of English is promoted during children’s time at nursery and reception.
The key person is a significant link between the child, family and nursery.

Play is a key tool for learning at this stage of children’s development. The EYFS acknowledges that play should be child led and child initiated. It should be appropriately supported by practitioners who sensitively respond to the child’s emerging needs, interests and learning dispositions. Progressively, and if the child’s development allows, more adult-led activities should be introduced to help children prepare for more formal learning in Year 1 of primary schools.

When working with young children, practitioners are expected to offer children challenging, playful opportunities across the prime and specific areas of learning and development ensuring that effective learning is taking place.

Characteristics of effective early learning are defined (DfE, 2012) as:

- Engagement – playing and exploring
- Motivations – active learning
- Thinking – creating and thinking critically.

The EYFS identifies **play and exploration** as the key tool for effective learning. Montessori’s perspective of play and learning has been discussed in Chapter 2 where the **active nature of children learning** is also addressed. Montessori is one of the pioneers of early years education, who identified young children’s needs to ‘learn by doing’ or, as she called it, by manipulation. The spontaneous nature of children’s learning in Montessori settings is supported by the organisation of the learning environment. The favourable environment, which is rich in learning opportunities based on play and exploration, naturally supports children’s **critical thinking and creativity**. It provides children with time to play and discover. Montessorians view the child’s creativity as ‘a way of thinking’, and it should be evident in all areas of learning and should be encouraged by practitioners at every opportunity.
The characteristics of effective early learning will be discussed further in the next chapter when we will examine how children’s learning in Montessori settings is reflected in planning and assessment and how these are managed in relation to the Montessori principles and also in line with the requirements of the EYFS.

**Montessori early years curriculum explained in relation to the prime and specific areas of learning**

The revised EYFS recognises that children’s early experiences and opportunities for favourable development effect later learning and has identified prime areas of learning as the foundation and a ‘running thread’ within the whole early years framework. The prime areas identify the essential skills and features of these fundamental areas of development which need to be present and well established before children embark on more academic learning. Montessorians would argue that opportunities for learning about the world – both as seen in the immediate environment and globally – and facilities to develop creativity need to be available to children as soon as they enter nursery. These areas of learning and development, identified as specific areas, provide wonderful opportunities for learning for even the youngest children, both inside and outside, and give practitioners tools to assess children’s progress within the prime areas. They also provide foundations and opportunities for indirect learning which prepare children both for numeracy and literacy.

**The prime areas**, which are the basis for the ‘two year old check’ (NCB, 2012), to be discussed in Chapter 6, are shown in Table 5.1.
Table 5.1 Prime areas of learning

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<th>Areas of learning and development</th>
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<td>Managing feelings and behaviour</td>
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The sequence in which the prime areas of learning are listed needs to be discussed further. The emphasis on communication and language should be considered alongside the other two prime areas. This is particularly so because most children will need to be emotionally settled and personally contented before they are ready to use their physical capabilities to engage with their environment. At the same time, many will communicate their joys and displeasures very quickly, through shrieks of laughter or by crying, and will need responsive intuitive key persons who know them well to interpret their needs, interests and dispositions.

Considered from the Montessori perspective and in line with the children’s sensitive periods, practitioners will be thinking of the children’s need for order, opportunities to move and explore the tiniest details both inside and outside the classroom. They will also take into account the importance of their encouragement in developing the children’s communication and language skills. They will identify with the emphasis on the young children’s drive to be independent, move and explore using all their senses and engaging with real objects whilst surrounded by rich language.
In other words, all three prime areas of learning and development need to be given equal importance and be seen as an integrated whole and evaluated as such, because they are fundamental aspects of the young child’s development. Young children also need time to practice the newly acquired and developing skills, as they grow in their competence and develop according to their unique dispositions. For most Montessorians in England, the prime areas of learning will be the main focus of their work as the majority of children will leave their setting to enter reception class, usually soon after their fourth birthday to start at the beginning of the academic year. As mentioned above the knowledge of the world and the expressive arts will serve well as excellent vehicles for introduction of literacy and numeracy.

The EYFS outlines the prime areas as follows.

In the area of communication and language development children need opportunities to experience language-rich environments, where language is modelled in a positive way. They need to be given time to listen and speak in a range of situations and develop confidence and skills in expressing themselves.

In the Montessori context this will mean: finger rhymes and action songs, as well as stories told from books; naming of objects, plants and animals both inside and outside the classroom; use of positive language and modelling of good manners and ways of saying things; and giving toddlers and young children time to speak as well as listen and be encouraged to say things and participate in conversations.

Physical development involves providing opportunities for young children to be active and interactive, to develop tier co-ordination, control or movement, balance and spatial awareness. Children should be given every opportunity to understand the importance of physical activity and to make healthy choices in relation to food and personal hygiene.

Montessori saw physical skills as the key to learning, therefore young children will be given plenty of opportunities to manipulate, move, push, pull and carry as well as refine their sense of balance whilst walking on a balancing beam or ‘on a line’, or walking up and down
stairs and sliding down a slide. They will start refining their dexterity and hand–eye co-ordination whilst using everyday objects at snack, lunch or in the sand pit, as well as during the practical life activities and whilst exploring early sensorial materials and developing creative skills and capacities – dancing, acting, role playing and building with blocks.

**Personal, social and emotional development** area learning should offer young children opportunities for unfolding of positive sense of self and of others, as they begin to form relationships and learn to respect others. They will learn how to ask for help and how to express their feelings, needs and interests in an acceptable manner. Gradually they will come to understand what behaviour is acceptable and when. All these skills will support their growing sense of wellbeing and belonging.

In Montessori terms the key skills to support this area of learning is to give toddlers opportunities to try to do things for themselves. They will learn to wash their hands and use the toilet, put on their shoes and wellingtons as well as their coats and jackets, hats and gloves. They will have the opportunities, with some adult supervision, to prepare, serve and decide which fruit to take for snack.

Appropriate behaviour and language will be modelled by their peers and the adults. They will be trusted in their need to try things for themselves and will be respected for their energetic efforts to be independent and to learn by themselves.

When considering the progression of learning in the prime areas towards the identified early learning goals (DfE, 2012 and also EYFS profile, DfE, 2014a) and as outlined in *Development Matters* (BAECE, 2012), learning in Montessori settings is likely to include many of the materials and activities and is outlined in Appendix 1.

When looking at the **specific areas** (see Table 5.2) we need to remind ourselves that particularly literacy and mathematics have their foundation in the prime areas and that knowledge of world and expressive arts are part of daily life of the child from the moment of birth as they absorb their environment through their senses and learn from their parents and primary care givers.
### Table 5.2 Specific areas of learning

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<thead>
<tr>
<th>Areas of learning and development</th>
<th>Aspects</th>
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<td>Literacy</td>
<td>Reading</td>
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<td>Writing</td>
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<td>Mathematics</td>
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<td>Understanding of World</td>
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<td>The world</td>
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<td>Technology</td>
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<td>Expressive Arts and Design</td>
<td>Exploring and using media and materials</td>
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<td>Being imaginative</td>
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The following passages explain how these areas of learning are introduced in Montessori settings and progression of learning as identified in *Development Matters* (BAECE, 2012) is again explained in Appendix 1 of this book.

**Literacy**

Montessori teachers approach reading and writing simultaneously and base their lessons on the phonic approach (Montessori, 1988b). The multi-sensory benefits of the sandpaper letters give children opportunities to be introduced both to the letter shape and sound as they hear the sound of the individual letters while they trace their shape outlined in sandpaper. There can be no more effective way of linking the two together.

However, much work has to be done in order to develop children’s phonic awareness prior to introducing the sandpaper letters. Games such as *I Spy* and *Odd Man Out* contribute greatly to children’s awareness of letter sounds and give them the opportunity to link letter
sound with initial sounds in their names and in words. Rhymes, poems and stories further contribute to the child’s awareness of letters and their sounds.

**Linking sounds and letter** is introduced simultaneously, and children are prepared for writing long before we introduce them to the insets for design, the materials specifically developed by Montessori to help control of pencil, lightness of touch and directionality of writing. The majority of practical life and sensorial exercises develop manipulative skills and focus on the dynamic tripod grip and develop the hand muscles and flexible wrist in preparation for writing.

In addition, children in Montessori classrooms benefit from easily accessible writing implements that are usually available alongside the insets for design or in the art area of the classroom. Accessibility of painting at an easel cannot be underestimated as an important contribution to the development of arm movement and gross motor skills required prior to developing the smaller muscles, supporting the use of writing implements. Children are also encouraged to ‘**write without writing**’, using their knowledge of letter sounds and letter shapes to formulate words with the large movable alphabet.

As awareness has grown in the importance of cursive letter shapes, many Montessori nursery schools have been using the Sassoon Cursive Alphabet for their sandpaper letters, so encouraging appropriate letter formation and focusing on the exit strokes used in joined-up **handwriting**. This gives children an excellent preparation for the more formal lessons in handwriting that they will receive in primary schools.

Reading is introduced in a three-tier approach, focusing first on three-letter words consisting of ‘consonant, vowel, consonant’ (words such as ‘cat’) at the beginning level. Children utilise their knowledge of letters and are prepared for blending of sounds into words by word-building and ‘onset and rime’ activities.

Initially, children ‘read words’ and use objects to match to word cards they have read. Gradually, as they get more practice decoding words, they use fewer props and move from single words to reading phrases, sentences and books. Many of the children attending Montessori settings in England do not benefit from the activities described below because they are designed for older children.
The same progression is followed at the second level when children tackle initial and final blends such as pr- in pram or -lt in kilt. Double consonants, as in carrot or bonnet, and -ck are introduced next, and most common digraphs such as sh- in shell, ch- in chips and th- in thin feature next.

These prepare children for the third stage of reading when individual phonograms are studied, first by reading and then by focusing on the spelling patterns in words like barn (b-ar-n). Before children progress onto the third reading level, they also study grammar, and colour-coding is used to introduce parts of speech.

These early grammar activities not only introduce parts of speech, but also give children further opportunities to practise their reading. Unfortunately, as most children in England leave Montessori nursery schools around the age of four, they seldom benefit from the full range of reading activities available to children in the rest of the world, who usually attend Montessori schools until the age of six.

**Mathematics**

The preparation for mathematics that children receive in Montessori settings starts in the sensorial area as children refine their senses by exploring shape, pattern and weight. These activities introduce concepts of one-to-one correspondence (knobbed cylinders), seriation (the pink tower, the broad stair, long rods and coloured cylinders), sorting (constructive triangles) and so on.

Mathematical concepts are experienced and absorbed by children long before they are introduced to mathematics in a formal way. This is one of the reasons why Montessori (1988a) refers to the sensorial materials as ‘materialised abstractions’. Children in Montessori classrooms have the opportunity to be introduced to mathematical language in the context of everyday life, such as when getting ready to go outside, having snacks, during cooking sessions, and in the art and book areas.

The Montessori mathematical curriculum focuses primarily on numbers and the relationships between quantities and written symbols. A range of materials help children understand the unique relationship
between numbers as labels and for counting. The materials highlight the one-to-one correspondence between quantity and symbol as children use number rods and cards, the spindle box, and cards and counters. This foundation to the number base of ten is further explored when children are introduced to the hierarchies of the decimal system. They use the golden bead material and colour-coded numeral cards and materials for counting up to one hundred. The patterns created by table exercises are explored by the older children, as are fractions.

Once children have secure knowledge of numbers to ten, they will then be introduced to number operations using a range of activities, such as the group operations with the golden beads, the snake game, number rods, short bead stair (using numbers to ten) and strip boards (using numbers up to twenty). Calculating using objects and gradually recording the answers is a natural progression from the activities for counting to ten. It also complements the spontaneous calculation opportunities present in the everyday life of the classroom – during cooking, when using play dough, and when working with the sensorial materials and unit blocks.

The sensorial area of learning provides many opportunities for problem-solving reasoning and also for exploration of shape and space. Children use the geometric solids and their three-dimensional qualities, and the geometric cabinet to become familiar with flat shapes. Gradually they become aware of the relationship between the solid and flat shapes. Naming shapes such as prisms, cuboids, cylinders, pyramids, rectangles, hexagons and parallelograms become part of the everyday life of the classroom. The flat and solid shapes give many opportunities to explore spatial relationships and patterns.

**Measurement** is primarily introduced during cooking activities. We also use the longest (1 metre/100 centimetres) or shortest (10 centimetres) red rods from the sensorial area as a unit of measurement, particularly when considering height and length. Measurement of time is explained in the next section which addresses understanding the world.
Understanding the world

This area of learning corresponds directly to what is called in the Montessori classroom the cultural area. The activities in this area focus on the world by exploring biology, geography, history and science. Here, the Montessori early years curriculum consists of a range of teacher-made materials, often developed in conjunction with topics or projects introduced to the classroom. These topics and projects are often negotiated with the children and should be based on and reflect the children’s interests and fascinations. The focus is, whenever possible, on real experiences that enhance and complement learning through the senses, so appropriate for this age group.

All Montessori classrooms should have plants and flowers both inside and outside in the garden. They are often part of the nature table that reflects ‘finds and discoveries’ during nature walks and from the garden. They also give opportunities for children to bring items into the classroom that they have found during walks with their parents or on the way to school – such as conkers, leaves, snails and so on. The nature table serves as a focus for observation, exploration and investigation. Real experiences are complemented by access to books, pictures and teacher-made materials. The nature table may also relate to work on transport, my body, minibeasts, volcanoes, continents and the solar system, as well as more abstract themes such as electricity, magnetism or light.

The sense of time is introduced with the help of a range of timelines and lifecycles, and by regular use of calendars. Birthdays are celebrated and also contribute to the children’s understanding of the passage of time.

Learning about places is approached from a unique perspective in Montessori classrooms as the child becomes aware of the solar system and the planet Earth and its continents, long before they come to study the country in which they were born. This is part of the Montessori ethos and focuses on giving children the opportunity of becoming ‘citizens of the world’.

Montessori teachers introduce continents from a multi-sensory perspective, first by looking at the globe and then by working with the
puzzle map of the world that identifies each continent by its unique colour. Collections of objects and pictures from each continent are contained within artefact boxes and give children opportunities to explore each continent through its music, clothes, food, plants and animals as well as festivals and geographical features. The boxes are fundamental in bringing the lives of people and communities of different continents into the classroom and, by doing so, promoting multi-cultural awareness and respect.

Technology focuses primarily on practical skills which are acquired during activities of everyday living, in the arts and crafts area and also during cooking. In this aspect of learning, Montessori teachers observe children, discuss their ideas and make resources available to ensure that children have opportunities to develop their design ideas.

There are many Montessori classrooms that include cd players, cameras and computers and tablets as part of their resources available to the children within the aspect of technology. However, debate continues within the Montessori community as to the value of computers, particularly if they take over from the real experiences of life for very young children up to the age of four, and in view of so many children having access to smart phones and tablets at home.

For example, the experience of feeling the texture of a leaf or shell, smelling a flower or feeling the wetness of a snail slithering along the arm cannot be replaced by seeing computer images. However, access to further information, available electronically, does give rich opportunities for building on and developing the real experiences into knowledge and understanding of the natural world. Children have access to everyday technology available to them in the practical life area, such as scales, a grinder and graters, sticky tape dispenser and telephones. If these are available they are functioning objects rather than models or replicas. Many Montessori classrooms have also invested in a range of programmable toys.
Expressive arts and design

This area of learning and development provides children with opportunities to develop both their physical skills as well as their imagination. Montessori classrooms have come under criticism in the past for not paying enough attention to this area of learning, but current training of Montessori teachers has addressed this component of the curriculum. The emphasis on expressive arts and design helps children develop skills in using resources spontaneously and gives them opportunities for development of the imagination, with support from the adults in the classroom.

This area of development has significant links with the practical life and in the sensorial area, particularly if we understand the child’s creativity to be the ability to use their imagination and critical thinking across all the areas of learning. Children are given opportunities to explore and use media and materials.

Children are given many opportunities to explore colour, texture, shape, form and space in two and three dimensions within the art area of the classroom where resources are readily available and accessible, and offer many opportunities for spontaneous learning. Children engage in painting, drawing using a variety of resources, collage, printing and modelling, exploring a range of materials from play dough to clay, as well as boxes, tubes and containers.

Opportunities to express and communicate ideas in this area of learning relate to use of arts and crafts materials, dancing, musical instruments and drama props, such as puppets and objects from story sacks. All are available in Montessori classrooms and usually children have the opportunity to access them during the three-hour work cycle rather than during organised lessons. However, in addition to the spontaneous use, some nurseries also employ a specialist teacher, who gives more formal lessons once a week in the areas of their expertise such as music, art, craft or drama.

Singing is part of the daily routine of Montessori classrooms, and musical instruments are also available, usually under supervision of the teacher. Movement often becomes an integral part of the music lessons as children act out songs and demonstrate specific movements;
usually this is the first introduction to drama. Children also have opportunities to listen to a variety of music, such as music from different continents, folk, jazz or classical. These activities give children the opportunity to recognise and explore patterns in music, how sounds can be changed and how to match movements to music and express themselves by dancing.

It is not very common to see role play areas designed by teachers in the Montessori classrooms. This does not mean that children are not given the opportunity to develop their imagination, but it is more likely that role play scenarios will evolve spontaneously and will reflect the children’s own experiences of life. This approach relies on the adults’ observation skills and good range of resources to facilitate role play as it emerges. The adult involvement is essential if opportunities to facilitate children’s use of imagination are not to be missed.

In a way, all that happens in the classroom requires the opportunity for children and adults to be engaged in a dialogue. Children need to be given time to express and communicate their ideas in a chosen medium, be it painting, drawing, modelling, carpentry, blocks, dance, singing and playing an instrument, role play or gardening. Creativity is present in all that children do in the classroom, promoting their imagination across all areas of learning and development.
This chapter explains how children’s learning is managed in Montessori classrooms and how their progress is planned and assessed. Links with statutory assessments of the EYFS are explored.

Managing children’s learning in a Montessori classroom

The organisation of the Montessori classroom is fundamental to how it is managed and how children’s learning is monitored. Each area of learning includes essential activities designed by Montessori during her lifetime. A comprehensive list of them is included in Appendix 2. In addition teachers will add other activities which reflect children’s interests and are designed in line with the basic principles of the Montessori materials, such as focusing on one element of learning, offering opportunities for scaffolding of the learning. The activities are easily manageable by the young child and ensure manipulation and encourage repetition.

Montessori teacher training is based on the teacher’s competence in the use of these materials and in understanding their objectives and benefits for the holistic development of each child. Trainee teachers prepare or are provided with portfolios of lesson plans for each one of these activities. The portfolios comprise schemes of work for the delivery of each area of learning. It is expected that any new activities introduced to children, which are designed to enhance and extend
their learning, are supported by detailed lesson plans. The effectiveness of all lessons is considered and reflected upon in relation to the identified objectives as well as levels of children’s engagement with them. Teachers are trained in observation techniques (MCI, 2014) and note and evaluate children’s progress. Initially, during their teaching placement and later in context of their roles when employed in a Montessori classroom.

The favourable environment offers opportunities for children to move and make choices and engage in activities presented on open shelves and ready to be used. This principle applies to both the inside and outside classrooms. Children can work and play alone, with a friend or friends. The morning and afternoon sessions are organised into ‘work cycles’ – periods of two-and-a-half to three hours, during which children engage in a wide range of activities spontaneously chosen. Each activity, known as a ‘cycle of activity’ by Montessorians, starts with the child making a choice, engaging with the activity and when finished, putting it back where it was found, ready for another child to use. The emphasis on making sure the activity is ready for another child to use is an important element of fostering not only a sense of responsibility but also social awareness within the setting. During any one ‘work cycle’ a child may engage in many ‘cycles of activity’ such as painting at an easel, working with sensorial materials, having a snack, riding a bicycle outside, listening to a story, participating in a music and movement or yoga session, helping to sweep up and for the older children also doing some counting or working with phonic sounds using the large movable alphabet. The important aspect of the work cycle is that the child chooses the majority of the activities, whilst s/he is invited to do at least one activity with a practitioner, either in a small group or a one-to-one lesson.

**Observations of children’s learning**

Observations of children engaged in activities were used by Montessori (1964) and are the foundation of the Montessori approach today. The observations are recorded in different ways depending on their purpose,
Observing and assessing effective early learning in Montessori classrooms

sometimes in a checklist format, or as an extended narrative and also as a brief narrative to complement a photograph; they also track progress of children working towards an early learning goal (EYFS) (BAECE, 2012 and DfE, 2012). Montessori’s own observation technique, the curve of work (Montessori, 1991) for tracking levels of children’s engagement and concentration is today used by practitioners and combined with the Leuven Engagement Scale (MCI, 2014). The main aim of the observations is to assess the child’s level of interest and concentration. This is why the Leuven engagement scale provides such an excellent complement to the curve of work.

These observation documents contribute towards the formative assessment of each child and are shared with parents. Sometimes this is done electronically, if the setting uses My Montessori Child documentation or other products such as Simple2Use or in a paper format as part of the child’s ‘learning journey’. Parents are encouraged to feed back or add to the assessments as well as to share with the setting the child’s home experiences, which may develop into class based activities.

Another useful tool for assessment of young children’s learning is the effective early learning model provided by the EYFS (DfE, 2012). It identifies the following steps:

- **Playing and exploring** linked with the child’s engagement with the activities;
- **Active learning** defined as the child’s motivation;
- **Creating and thinking critically**, which demonstrates how the child thinks and approaches activities.

In Montessori classrooms where children develop the habit of making choices, we believe that their selections indicate their inner motivation as well as interest in areas of learning and so demonstrate their sensitive periods (see Chapter 2). Therefore we would begin with noting the child’s **active interest in learning** as the starting point of our assessment process. The practitioners would follow by examining how the child **plays/works and explores** the activity. The levels of concentration and
engagement indicate for the teacher if the child needs further support or whether s/he should be left alone deep in concentration. Often, the deep levels of concentration and opportunity to engage with an activity for an uninterrupted/extended period of time (this is the value of the work cycle) enables the child to be creative and demonstrate critical thinking. The practitioner may engage in conversation with the child when they complete their activity or may ask a question relating to the creative thinking observed during the independent activity. This approach facilitates one opportunity for sustained shared thinking in Montessori classrooms. As the children get older, they tend to work and play in pairs and small groups, and observing and documenting their conversations and problem-solving skills provides another opportunity for the practitioner to engage and extend their learning.

**Assessment of children’s learning**

The regular observations of children’s learning are the basis of the formative assessment and provide information for planning of activities in line with the child’s sensitive periods as reflected in their interests. The nature of the Montessori activities will enable the practitioners to outline a range of possible lines for development (Carr, 2001), working either in line with the area of learning or introducing something new, building on the skill gained. For example, the child who enjoys and is competent in skills such as transferring, pouring, mopping up spills (in the area of practical life) can easily transfer these skills to ‘making a volcano’ and do this activity on his/her own, without adult intervention. This approach enhances the children’s joy of learning and their levels of self-confidence as well as encouraging initiative and a sense of responsibility when choosing and putting their activity away.

All practitioners in the Montessori setting are likely to contribute to the observations of individual children; however, it is usually the key person, in line with the requirements of the EYFS (DfE, 2012), who will document the child’s progress and share it with his/her parents. The formative assessments contribute to the child’s ‘learning journey’, which is a
celebration of the child’s time at nursery. The key person also prepares a **summative assessment** of the child’s progress based also on tracking of the child’s achievements in the context of the range of Montessori activities in the areas of learning and in relation to the *Development Matters* documentation (BAECE, 2012) as outlined in Appendix 1 and on the formative assessments. The summative assessments are shared with the families at regular meetings, and contribute to the child’s transitions from baby and toddler group to the nursery class, or from the nursery to reception class or year 1 in the primary school.

**Statutory assessments as set out by the EYFS**

The EYFS also requires all settings to prepare an assessment of the child’s development when they join the nursery during their third year of life. This is referred to as the **two year check** and relates to the child’s skills and capabilities in the prime areas of learning. Parents should be invited to contribute to this assessment, either during the registration or at the start of the assessment following the child’s entry into the setting, by providing information about their child or at a meeting with the setting following assessment by the nursery. The main purpose of this assessment is to provide a baseline from which to track the child’s progress and to identify the child’s unique skills, abilities and characteristics. The EYFS requires providers to undertake this assessment as soon as reasonably possible on entry. Many practitioners, including Montessorians, are concerned about assessing the child’s development in the areas of communication and language, physical and social and emotional development at this very early stage of the child’s attendance at nursery, which in some cases can be just once or twice each week. Getting to know young children well and make an accurate assessment takes time, particularly as children’s development at this stage can be very diverse. Sharing the findings with parents can also be a challenge, especially if deficit in development is identified. This can, in some cases, lead to parents withdrawing the child from nursery and opportunities to support the child and the family effectively being missed as a result of this action.
A further statutory assessment, the Early Years Foundation Stage Profile (DfE, 2014a), is required at the end of the reception year, following the child’s fifth birthday. This summative assessment measures individual children’s achievements against seventeen early learning goals as set out in the Early Years Foundation Stage document (DfE, 2012). This document has received significant revisions since its launch in 2008. It now records factors which contribute to the child’s effective learning as discussed in this chapter and also measures children’s achievement on a three point scale as emerging, expected or exceeding. On completion of the profile, settings are required to submit their findings to the local authority, who moderate the results and submit them to the Department for Education. The data is used by the department to measure the effectiveness of this non-compulsory stage of children’s learning and development.

It is possible to request exemption from this aspect of the EYFS (DfE, 2012). So far, this has been granted to the Steiner Waldorf kindergartens and to Independent schools. Not many English Montessori nurseries are required to complete the profile because most of the children leave them soon after their fourth birthday to attend the reception class in a local state or independent primary school. In principle, Montessorians also object to these assessments because it is the ethos of the Montessori approach to nurture the unique potential of each individual child, and therefore such assessments are not seen as a significant contribution to the child’s progress in their learning and development. However, in the absence of current research into effectiveness of Montessori education, the data gathered from the profile demonstrates the significant contribution Montessori education makes to children’s early learning and development.

At the time of writing, there are four state primary schools which implement the Montessori approach in their Foundation stage departments and they demonstrate the significant added value the pedagogy brings to the children’s achievements. The Gorton Mount Primary Academy, and its dedicated team of teachers under the leadership of Carol Powell, the principal, is the first school to introduce Montessori in their nursery and reception classes and have consistently demonstrated the benefit to their children and their families.
Montessori is a global movement with Montessori infant communities, children’s houses and primary and secondary schools in over one hundred countries around the world. The centenary celebrations in 2007 gave Montessorians in all parts of the globe an opportunity to raise awareness of the relevance of Montessori education to lives of children in the twenty-first century. The aim of this chapter is to look at Montessori education in the United Kingdom, and particularly in England, where the majority of Montessori provision and training can be found at present.

During the past fifteen years we have seen a growing interest in Montessori education in this country. Some of it coincides with the increasing political focus on early years, which is linked to funding for pre-school education first initiated in 1995 with the voucher scheme. Some of it is due to the efforts of the Montessori St. Nicholas Charity, which is investing in promotion of the Montessori approach with four major initiatives.

- Firstly, they established the Montessori Schools Association in 2002 to give the community a voice; today almost 700 schools in the UK participate in the scheme and the MSA has 4,000 individual members.

- The current growing interest in Montessori education by the maintained sector relates to the emergence of foundation units within
primary schools where the Montessori approach can be applied and successfully linked with the EYFS. To date the charity has supported four primary schools by providing them with financial help as well as training and mentoring opportunities.

- The other significant initiative funded by the St. Nicholas trust is the accreditation scheme for Montessori schools launched in 2008 with its 155 accredited nurseries and schools.

- The launch of the Montessori Manifesto in December 2012 seeks to further extend the charity’s influence beyond its usual reach to the wider community, such as the Teenage Parent Project in south Bristol.

Traditionally, England attracts students from all over the world who wish to become Montessori teachers. The training provided by Montessori Centre International (MCI) offers well-established and recognised Montessori teacher training as well as professional development seminars and workshops. In recent course development MCI has collaborated with the Crossfields Institute, Stroud on designing Montessori diplomas at level 3 and 4 which meet the Early Years Educator criteria, thus ensuring their leading position in Montessori teacher training in the UK. Since 2009 MCI has delivered a Foundation Degree (Montessori Early Childhood Practice) which is validated by the London Metropolitan University. Recent accreditation visits by the Quality Assurance Agency (QAA) endorsed the centre’s commitment to quality delivery of Montessori education and its positive relationships with students.

In 2012 the Charity published *Learning Together: What Montessori can offer your family* written by MCI tutors (Hughes, 2012). The book has served as one of the key documents in the development of the Montessori parenting programme which was initially delivered in conjunction with the DfE CanParent initiative in Camden, London, in 2012 and subsequently offered to Montessori teachers wishing to train as facilitators to deliver this programme in their settings.

In response to growing interest in Montessori education within the child-minding community, MCI has developed an online introductory
course for child-minders which was launched in December 2013. This professional development programme has been well received by all participants, acknowledging the usefulness of the course materials in supporting reflections on their practice.

The Montessori St. Nicholas Charity with MCI as its training arm ensures that Montessori schools are staffed with qualified Montessori teachers, who are prepared for work with young children in the twenty-first century.

The annual census (MSA, 2013) conducted by the Montessori Schools Association under the leadership of Dr Martin Bradley revealed some interesting data about Montessori nurseries and schools in the UK. For example:

- Ninety per cent of the Montessori settings inspected by Ofsted were graded as ‘Outstanding’ or ‘Good’ in their last inspection, with the majority of the schools also being MEAB accredited.
- The size of the settings varies greatly from those set up in the proprietor’s home attended by five children to purpose-built schools supporting up to 240 children.
- Sixty percent of Montessori settings offer full time provision, whilst 40 percent are sessional, often operating from community halls where they are required to set up their classroom every day because they are using shared premises.
- Eleven per cent of the children attending, some 1,700, are between the ages of three months and two years. The majority of children, over 13,000, attending Montessori provision are between the ages of two and five, and just under 1,000 children benefit from Montessori primary education.
- Of the 55 percent of schools that responded to the census, 42 percent were staffed by Montessori qualified teachers whilst 58 percent of the staff held other relevant early years qualifications or are not qualified. Of the qualified staff just under 2,000 hold level 4 or higher qualifications, about 2,500 are qualified at level 3, whilst approximately 1,500 are level 2 qualified.
Montessori practice in the United Kingdom today

The quality of Montessori provision is of paramount importance. The accreditation scheme established in 2008 offered by the Montessori Evaluation and Accreditation Board (MEAB), under the auspices of the Montessori St. Nicholas charity, gives settings an opportunity to reflect on their provision in the context of Montessori principles and those of the EYFS. Each accreditation comprises two visits, during which recommendations are made by a Montessori qualified and experienced assessor. Settings are assessed in a three-year cycle. The nurseries and schools who receive MEAB accreditation are identified on the MSA database of schools which is linked with the full report available on the MEAB website (www.montessori.org.uk). This quality assurance scheme is supported by MCI’s professional development programme available and delivered either in individual settings or at the London-based Montessori Centre International. Since summer 2008, 155 schools have been accredited and most of them are now in the second cycle of accreditations whilst the scheme grows annually by twenty-five to thirty new schools looking for this endorsement of the commitment to quality Montessori education. MEAB accredited settings are used by MCI as the preferred nurseries for placement of students on teaching practice.

The recent introduction of Montessori training for young mums and introduction of Montessori practices in the crèche at The Teenage Parents Project in south Bristol further demonstrates the benefits that the Montessori approach brings to children and their families.

The Charity’s state school primary initiative, which was launched in 2005 at Gorton Mount Primary Academy in Manchester, has brought Montessori education into the mainstream. Stebbing Primary School, at Stebbing, Essex, St Thomas More Primary School in Saffron Walden, and Aldersbrook Primary School in Wanstead also participate in this initiative and have witnessed benefits not only for the children and their families but also for the staff in their schools.

At the foundation stage, the Montessori approach offers children an opportunity to exercise their independence and to establish motivation within the classroom’s favourable environment. The freedom within limits, the calm atmosphere and respectful attitudes promote self-esteem and self-respect and are reflected in the foundation profile
scores of all the schools involved in the project, particularly in the areas of personal, social and emotional development, problem solving, reasoning and numeracy and in creative development.

It is rewarding to see that with the financial support from the Montessori St. Nicholas charity and with forward-looking leadership and determination from the school staff and the head teachers, Montessori education is returning to its roots – offering the best to children as their full entitlement for free high quality education.
Appendix 1
How the early learning goals are met at a Montessori nursery

This Appendix makes links between the early learning goals (ELG) and Montessori practice. In this edition the developmental steps outlined in Development Matters (BAECE, 2012) are listed and matched with Montessori activities, recognising the importance of a learning journey a child makes during his/her time in a setting while working towards the early learning goals. Many children achieve these goals at the end of the reception year and are currently assessed at that time using the Early Years Foundation Stage profile (DfE, 2014a) which may become optional from September 2015, as it is replaced by the proposed baseline assessment on entry into Reception class. Whilst not everyone is likely to agree with the developmental steps identified by Development Matters it is important to remember that learning and development in the early years are unique to each child and are not necessarily a uniform process. Therefore, scaffolding children’s learning and ensuring that children have time to play, explore and investigate whilst they are developing their critical thinking, as well as personal and social autonomy in a relaxed and calm atmosphere, are important elements of school readiness.

In this appendix the Development Matters guidelines on the expected developmental progression will guide the child in working towards the early learning goal in this area of development. The learning goals to be achieved in each area are set out in individual boxes with each box outlining the learning goal in bold. Whilst the examples of the Montessori Practice are presented in the boxes shaded in light gray.
Prime areas

*Communication and language* involves giving children opportunities to experience a rich language environment; to develop their confidence and skill in expressing themselves; and to speak and listen in a range of situations.

*Listening and attention*

In *Development Matters* the child of:

**16 to 26 months:**
--listens to and enjoys rhythmic patterns in rhymes and stories
- enjoys rhymes and demonstrates listening by trying to join in with actions of vocalisations
- rigid attention – and may appear not to hear

**22 to 36 months:**
- listens with interest to the noises adults make when they read stories
- recognises and responds to many familiar sounds, e.g. turning to a knock on the door, looking at or going to the door
- shows interest in play with sounds, songs and rhymes
- single channelled attention, can shift to a different task if attention fully obtained – using child’s name helps focus

**30 to 50 months:**
- listens to others one-to-one or in small groups, when conversation interests them
- listens to stories with increasing attention and recall
- joins in with repeated refrains and anticipates key events and phrases in rhymes and stories
- focuses attention – still listens or does, but can shift own attention
- is able to follow directions if not intently focused on own choice of activity

**40 to 60+ months:**
- maintains attention, concentrates and sits quietly during appropriate activity
- two-channelled attention – can listen and do for short span
Early learning goal as described in the EYFS: by the end of the Reception year children should be able to:

- listen attentively in a range of situations
- listen to stories, accurately anticipating key events and respond to what they hear with relevant comments, questions and actions
- give their attention to what others say and respond appropriately, while engaged in another activity

In the Montessori setting the child:

has daily access to, and enjoys listening to and participating in nursery rhymes, songs and stories and musical instruments

is encouraged to join in and contribute when ready

participates in the silence game which encourages focused listening

participates in two way conversations

is given time to respond appropriately

is encouraged to focus on presentations of new activities

Understanding

In Development Matters the child of:

16 to 26 months:

selects familiar objects by name and will go and find objects when asked, or identifies objects from a group

understands simple sentences, e.g. ‘Throw the ball’

22 to 36 months:

identifies action words by pointing to the right picture, e.g. ‘Who’s jumping?’

understands more complex sentences, e.g. ‘Put your toys away and then we’ll read a book’

understands, ‘who’, ‘what’, ‘where’ in simple questions e.g. Who’s that? What’s that? Where is?

developing understanding of simple concepts, e.g. big/little
30 to 50 months:
understands use of objects, e.g. What do we use to cut things?
shows understanding of prepositions such as ‘under’, ‘on top’, ‘behind’ by carrying out an action or selecting correct picture
responds to simple instructions, e.g. to get or put away an object
beginning to understand ‘why’ and ‘how’ questions

40 to 60+ months:
responds to instructions involving a two-part sequence
understands humour, e.g. nonsense rhymes, jokes
able to follow a story without pictures or props
listens and responds to ideas expressed by others in conversation or discussion

Early learning goal as described in the EYFS: by the end of the Reception year children should be able to:

- follow instructions involving several ideas or actions
- answer ‘how’ and ‘why’ questions about their experiences and in response to stories and events

In the Montessori setting the child:
is given opportunities to demonstrate their understanding by following short conversations and non-verbal interactions
listens to instructions from adults and peers which gradually become a routine as the child matures and settles into the rhythm of daily life
responds to questions from adults and friends
is able to follow complex instructions and respond to them appropriately as the child becomes more experienced and settled in daily routines
**Speaking**

*In Development Matters the child of:*

**16 to 26 months:**
- copies familiar expressions, e.g. ‘Oh dear’, ‘All gone’
- beginning to put two words together, e.g. ‘want ball’, ‘more juice’
- use different types of everyday words including nouns, verbs and adjectives, e.g. banana, go, sleep, hot
- beginning to ask simple questions
- beginning to talk about people and things that are not present

**22 to 36 months:**
- uses language as a powerful means of widening contacts, sharing feelings, experiences and thoughts
- holds a conversation, jumping from topic to topic
- learns new words very rapidly and is able to use them in communicating
- uses gestures, sometimes with limited talk, e.g. reaches toward toy, saying ‘I have it’
- uses a variety of questions, e.g. what, where, who
- uses simple sentences, e.g. ‘Mummy gonna work’
- beginning to use word endings, e.g. going, cats

**30 to 50 months:**
- beginning to use more complex sentences to link thoughts, e.g. using and, because
- can retell a simple past event in correct order, e.g. went down slide, hurt finger
- uses talk to connect ideas, explain what is happening and anticipate what might happen next, recall and relive past experiences
- questions why things happen and gives explanations using question words, e.g. who, what, when, how
- uses a range of tenses, e.g. play, playing, will play, played
- uses intonation, rhythm and phrasing to make the meaning clear to others
- uses vocabulary focused on objects and people that are of particular importance to them
builds up vocabulary that reflects the breadth of their experiences
uses talk in pretending that objects stand for something else in play, e.g.
‘This box is my castle’

**40 to 60+ months:**
extends vocabulary, especially by grouping or naming, exploring the
meaning and sounds of new words
uses language to imagine and recreate roles and experiences in play
situations
links statements and sticks to a main theme or intention
uses talk to organise, sequence and clarify thinking, ideas, feelings, and
events
introduces a storyline or narrative in their play

**Early learning goal as described in the EYFS: by the end of the Reception
year children should be able to:**

- express themselves effectively, showing awareness of listeners’ needs
- use past and future forms accurately when talking about events that
  have happened or are to happen in the future
- develop their own narratives and explanations by connecting ideas
  and events

**In the Montessori setting the child:**
has opportunities to listen attentively and demonstrate understanding of
spoken and non-verbal language and routines responding verbally as
language unfolds and develops
is supported in the development of spoken language by:
modelling of spoken language
appropriate use of language
extension of vocabulary in all areas of learning – using conversations,
books and stories as well as the three period lessons
acknowledging the importance of the child’s home language whilst
supporting emerging use of the language spoken in the nursery
encouraging conversations
encouraging telling of their own stories at every opportunity, particularly during play, creative activities and when exploring activities in knowledge of the world
encouraging questions
appropriate use of language is a key focus in Montessori nurseries and children are always encouraged to express their thoughts, ideas and feelings

Physical development involves providing opportunities for young children to be active and interactive; to develop their co-ordination, control, and movement. Children must also be helped to understand the importance of physical activity, and to make healthy choices in relation to food and personal hygiene.

Moving and handling

In Development Matters the child of:

16 to 26 months:
walks upstairs holding hand of adult
comes downstairs backwards on knees, e.g. crawling
beginning to balance blocks to build a small tower
makes connections between their movement and the marks they make

22 to 36 months:
runs safely on whole foot
squats with steadiness to rest or play with an object on the ground, and rises to feet without using hands
climbs confidently and is beginning to pull themselves up on nursery play or climbing equipment
can kick a large ball
turns pages in a book, sometimes several at once
shows control in holding and using jugs to pour, hammers, books and mark-making tools
beginning to use three fingers (tripod grip) to hold writing tools
initiates drawing simple shapes such as circles and lines
walks upstairs or downstairs holding onto a rail two feet to a step
may be beginning to show a preference for dominant hand

**30 to 50 months:**

moves freely and with pleasure and confidence in a range of ways, such as
slithering, shuffling, rolling, crawling, walking, running, jumping, skipping,
sliding and hopping

mounts stairs, steps or climbing equipment using alternate feet

walks downstairs, two feet to each step while carrying a small object

runs skilfully and negotiates space successfully, adjusting speed or direction
to avoid obstacles

can stand momentarily on one foot

can catch a large ball

draws lines and circles using large motor movements

uses one-handed tools and equipment, e.g. makes snips in paper with child scissors

holds a pencil between thumb and two fingers, no longer using whole-hand grasp

holds pencil near point between first two fingers and thumb and uses it with
good control

can copy some letters, e.g. letters from their name

**40 to 60+ months:**

experiments with different ways of moving

jumps off an object and lands appropriately

negotiates space successfully when playing racing and chasing games with other children, adjusting speed or changing direction to avoid obstacles

travels with confidence and skill around, under, over and through balancing and climbing equipment

shows increasing control over an object in pushing, patting, throwing,
catching or kicking it

uses simple tools to effect changes to materials

handles tools, objects, construction and malleable materials safely and with increasing control

shows a preference for a dominant hand
begins to use anticlockwise movement and retrace vertical lines
begins to form recognisable letters
uses a pencil and holds it effectively to form recognisable letters, most of which are correctly formed

**Early learning goal as described in the EYFS: by the end of the Reception year children should be able to:**

- *show good control and co-ordination in large and small movements*
- *move confidently in a range of ways, safely negotiating space*
- *handle equipment and tools effectively, including pencils for writing*

**In the Montessori setting the child:**

is given opportunities to move freely inside and outside the classroom using his/her whole body with growing control and effectiveness

All activities of everyday living and the use of sensorial materials enhance the development and refinement of gross and fine motor skills, children’s balance and spatial awareness. Full details of lesson plans for these activities can be found in Montessori curriculum files (schemes of work). The following are some key examples:

carrying materials from the shelf to a table/mat
walking on the line activities
uses climbing equipment and bicycles
Activities for refinement of manipulative skills, hand–eye co-ordination, flexibility of the wrist, lightness of touch and careful handling of objects and materials which prepare the child for daily life as well as for writing
pouring
transferring
sorting
cutting
threading
sewing
opening and closing
pegging
plaiting
**Health and self-care**

In Development Matters the child of:

**16 to 26 months:**
- develops own likes and dislikes in food and drink
- is willing to try new food textures and tastes
- holds cup with both hands and drinks without much spilling
- clearly communicates wet or soiled nappy or pants
- shows some awareness of bladder and bowel urges
- shows awareness of what a potty or toilet is used for
- shows a desire to help with dressing/undressing and hygiene routines

**22 to 36 months:**
- feeds self competently with spoon
- drinks well without spilling
- clearly communicates their need for potty or toilet
- beginning to recognise danger and seeks support of significant adults for help
- helps with clothing, e.g. puts on hat, unzips zipper on jacket, takes off unbuttoned shirt
- beginning to be independent in self-care, but still often needs adult support

**30 to 50 months:**
- can tell adults when hungry or tired or when they want to rest or play
- observes the effects of activity on their bodies
- understands that equipment and tools have to be used safely
- gains more bowel and bladder control and can attend to toileting needs most of the time themselves
- can usually manage washing and drying hands
- dresses with help, e.g. puts arms into open-fronted coat or shirt when held up, pulls up own trousers, and pulls up zipper once it is fastened at the bottom

**40 to 60+ months:**
- eats a healthy range of foodstuffs and understands need for variety in food
- is usually dry and clean during the day
shows some understanding that good practices with regard to exercise, eating, sleeping and hygiene can contribute to good health
shows understanding of the need for safety when tackling new challenges, and considers and manages some risks
shows understanding of how to transport and store equipment safely
practices some appropriate safety measures without direct supervision

**Early learning goal as described in the EYFS: by the end of the Reception year children should be able to:**

- know the importance of exercise and healthy diet for good health
- talk about ways to keep healthy and safe
- manage their own basic hygiene and personal needs successfully, including dressing and going to the toilet independently

**In the Montessori setting the child:**

is given opportunities to learn about food and healthy eating during snack/meal times and activities which focus on the importance of healthy eating, exercise and being safe

grows in awareness of personal hygiene when they are learning about:
nappy changing
potty training
when and why to wash hands and use a nail brush
how to blow their nose
how to brush teeth
how to brush hair.

learns how to care for him/herself when:
taking off and putting on shoes
taking off and putting on of their clothes
knowing what to do when wanting to play outside
putting their coat and bag on their pegs
storing own work
using a range of nursery equipment
Personal, social and emotional development involves helping children to develop a positive sense of themselves and others; to form positive relationships and develop respect for others; to develop social skills and have confidence in their own abilities.

Self-confidence and self-awareness

In Development Matters the child of:

16 to 26 months:
explores new toys and environments, but ‘checks in’ regularly with familiar adult as and when needed
gradually able to engage in pretend play with toys
demonstrates sense of self as an individual, e.g. wants to do things independently, says ‘No’ to adult

22 to 36 months:
separates from main carer with support and encouragement from a familiar adult
expresses own preferences and interests

30 to 50 months:
can select and use activities and resources with help
welcomes and values praise for what they have done
enjoys responsibility of carrying out small tasks
is more outgoing towards unfamiliar people and more confident in new social situations
confident to talk to other children when playing, and will communicate freely about own home and community
shows confidence in asking adults for help

40 to 60+ months:
confident to speak to others about own needs, wants, interests and opinions
can describe self in positive terms and talk about abilities
Early learning goal as described in the EYFS: by the end of the Reception year children should be able to:

- be confident to try new activities, and say why they like some activities more than others
- be confident to speak in a familiar group, will talk about their ideas and will choose resources they need for their chosen activities
- say when they do or don’t need help

In the Montessori setting the child:

is able to separate from main carer
is able to settle well at the start of the session
understands that not all objects can be put into their mouth
is able to choose and prepare own snack
selects work independently, carrying a tray/basket/mat/equipment
completes the cycle of activity, i.e. selects work independently and puts it away when completed
works in all areas with different patterns of interaction:
  independently
  one to one
  in a pair
  in a small group
  as a whole group.
discusses and develops a growing awareness of others (cultures, similarities, differences) through projects, and during play such as: small world play and role play, is encouraged to take part in discussions and negotiations
is encouraged to express needs, views and feelings
Activities for everyday living which support independence are:
transferring
pouring
threading
opening and closing
cleaning/washing/pegging
polishing/dusting
care for the environment
sweep floor using a broom
mop floor
sweep floor using a dust-pan and brush
clean table
clear sink
wash up own cup
dry own cup
water the plants
rake leaves.
care for self: learning to use
large buttons
small buttons
velcro
zips
buckles
hook and eye fastenings
bows
lacing
polish shoes
fold clothes
pair socks
put on own coat
take off and put on outside shoes, inside shoes/slippers and wellington boots.
personal hygiene
wash hands
use toilet independently
clean teeth
care for nails
brush hair
Managing feelings and behaviour

In Development Matters the child of:

16 to 26 months:
Is aware of others’ feelings, e.g. looks concerned if hears crying or looks excited if hears a familiar happy voice
has a growing sense of will and determination; this may result in feelings of anger and frustration which are difficult to handle, e.g. may have tantrums
responds to a few appropriate boundaries, with encouragement and support
begins to learn that some things are theirs, some things are shared, and some things belong to other people

22 to 36 months:
seeks comfort from familiar adults when needed
can express their own feelings such as sad, happy, cross, scared or worried
responds to the feelings and wishes of others
is aware that some actions can hurt or harm others
tries to help or give comfort when others are distressed
shows understanding and co-operates with some boundaries and routines
can inhibit their own actions, behaviours, e.g. stop themselves from doing something they shouldn’t do
has a growing ability to distract self when upset, e.g. by engaging in a new play activity

30 to 50 months:
aware of own feelings and knows that some actions and words can hurt others’ feelings
begins to accept the needs of others and can take turns and share resources, sometimes with support from others
can usually tolerate delay when needs are not immediately met and understands wishes may not always be met
can usually adapt behaviour to different events, social situations and changes in routine
40 to 60+ months:
understands that own actions affect other people, e.g. becomes upset or
tries to comfort another child when they realise they have upset them
aware of the boundaries set and of behavioural expectations in the setting
beginning to be able to negotiate and solve problems with aggression, e.g.
when someone has taken their toy

Early learning goal as described in the EYFS: by the end of the Reception
year children should be able to:

- talk about how they and others show feelings
- talk about their own and others’ behaviour, and its consequences, and
  know that some behaviour is unacceptable
- work as part of a group or class and understand and follow the rules
- adjust their behaviour to different situations, and take changes of routine
  in stride

In the Montessori setting the child:
understand the ground-rules and classroom etiquette:
walking in class
use of a mat
individual activities
shared activities
is able to follow the expected code of behaviour, listening to and
following simple and more complex instructions
is able to express why the expected code of behaviour is important, giving
simple and detailed explanations as required
learns about the consequences of their behaviour as events occur,
describing a personal event and its effect
is encouraged to show own needs, views and feelings and knows the most
appropriate places to demonstrate them in the class, for example:
running – outside
quiet time – book corner
feeling tired – sleep area
seeking comfort from friend/caregiver
takes part in discussion during group or book time with a focus on how characters help and support each other by:
sitting and listening
joining in with support of an adult
starting to participate
making spontaneous contributions.
takes part in project on festivals, people and animals around the world
joins the group
participates in the group, e.g. makes art activities
selects activities relating to the community
shows empathy and kindness to others
teachers: supporting with the environment
peers: care for their work
peers: care for their friends following injury or sadness
peers: sharing an activity with another child
is involved and takes turns when working in a group
begins to participate in the silence game
is able to listen to a story
is able to listen to explanations

Making relationships

In Development Matters the child of:

16 to 26 months:

plays alongside others
uses a familiar adult as a secure base from which to explore independently in new environments, e.g. ventures away to play and interact with others, but returns for a cuddle or reassurance if becomes anxious
plays co-operatively with a familiar adult, e.g. rolling a ball back and forth
22 to 36 months:
interested in others’ play and starting to join in
seeks out others to share experiences
shows affection and concern for people who are special to them
may form a special friendship with another child

30 to 50 months:
can play in a group, extending and elaborating play ideas
initiates play, offering cues to peers to join them
keeps play going by responding to what others are saying or doing
demonstrates friendly behaviour
demonstrates initiating conversations; and
demonstrates forming good relationships with peers and familiar adults

40 to 60+ months:
initiates conversations
attends to and takes account of what others say
explains own knowledge and understanding, and asks appropriate questions of others
takes steps to resolve conflicts with other children

Early learning goal as described in the EYFS: by the end of the Reception year children should be able to:

- play co-operatively, taking turns with others
- take account of one another’s ideas about how to organise their activity
- show sensitivity to other’s needs and feelings
- form positive relationships with adults and other children

In the Montessori setting the child:
is able to respond to key-person and other adults
is able to play:
alone
alongside others
in pairs
Appendix 1

in a small group.
is able to participate in:
individual lessons with an adult
shared role play
a planned small group activity.
is able to share:
ideas
food
Toys and materials.
shows consideration, respect and understanding of behaviour for:
themselves
friends
peers
adults
the environment.
understands the grounds rules of the environment:
cycle of activity
play/work mat
individual activity
shared activity
washing hands
access to free-flow to the outside

Practitioners need to recognise the ongoing need to observe, plan for and document children’s progress in the prime areas of learning, whilst beginning to focus on the specific areas of learning as children mature and show interest in the world around them, in letters and numbers and begin to express their ideas, thoughts and feelings through arts and crafts, music, dance and story telling.
The specific areas

**Literacy** development involves encouraging children to link sounds and letters and to begin to read and write. Children must be given access to a wide range of reading materials (books, poems, and other written materials) to ignite their interest.

**Reading**

In Development Matters the child of:

16 to 26 months:
interested in books and rhymes and may have favourites

22 to 36 months:
has some favourite stories, rhymes, songs, poems or jingles
repeats words or phrases from familiar stories
fills in the missing word or phrase in a known rhyme, story or game, e.g. Humpty Dumpty sat on a …’

30 to 50 months:
enjoys rhyming and rhythmic activities
shows awareness of rhyme and alliteration
recognises rhythm in spoken words
listen to and joins in with stories and poems, one-to-one and also in small groups
joins in with repeated refrains and anticipates key events and phrases in rhymes and stories
beginning to be aware of the way stories are structured
suggests how the story might end
listens to stories with increasing attention and recall
describes main story settings, events and principal characters
shows interest in illustrations and print in books and print in the environment
recognises familiar words and signs such as own name and advertising logos
looks at books independently
handles books carefully
knows information can be relayed in the form of print
holds books the correct way up and turns pages
knows that print carries meaning and, in English, is read from left to right
and top to bottom

40 to 60+ months:
continues a rhyming string
hears and says the initial sound in words
can segment the sounds in simple words and blend them together and
knows which letter represent some of them
links sounds to letters, naming and sounding the letters of the alphabet
begins to read words and simple sentences
uses vocabulary and forms of speech that are increasingly influenced by
their experiences of books
enjoys an increasing range of books
knows that information can be retrieved from books and computers

Early learning goal as described in the EYFS: by the end of the Reception
year children should be able to:

• read and understand simple sentences
• use phonic knowledge to decode regular words and read them aloud
  accurately
• also read some common irregular words
• demonstrate understanding when talking with others about what they
  have read

In the Montessori setting the child:
is made aware of phonetic sounds using games such as Odd Man Out and
I Spy
is prepared for listening to the phonetic sounds by using the sound boxes
and playing the silence game
is introduced to phonetic sounds using the sound paper letter
is introduced to reading with the three letter CVC (consonant–vowel–consonant) words using the pink level materials, which are usually presented in the following progression:

- pink box 3 and 4
- mystery box
- word lists
- sight words
- phrase, sentences and books.

moves on to blue boxes which introduce double and triple blends, double letters, digraphs, schwa vowel and compound words in the same progression as the pink boxes

is introduced to early grammar which builds on the children’s growing reading skills and introduces colour-coded parts of speech in relation to their functions in a sentence through activities such as:

- noun cards and singular and plural box
- noun and adjective game
- verb cards
- preposition box
- theme/farm box

**Writing**

In *Development Matters* the child of:

**22 to 36 months:**

distinguishes between the different marks they made

**30 to 50 months:**

sometimes gives meaning to marks drawn and painted

ascribes meanings to marks seen in different places

**40 to 60+ months:**

gives meaning to marks they make as they draw, write and paint

begins to break the flow of speech into words
Appendix 1

continues a rhyming string
hears and says the initial sound in words
can segment the sounds in simple words and blend them together
links sounds to letters, naming and sounding the letters of the alphabet
uses some clearly identifiable letters to communicate meaning, representing some sounds correctly and in sequence
writes own name and other things such as labels, captions
attempts to write short sentences in meaningful contexts

Early learning goal as described in the EYFS: by the end of the Reception year children should be able to:

- use their phonic knowledge to write words in ways which match their spoken sounds
- also write some irregular common words
- write simple sentences which can be read by themselves and others; some words are spelt correctly and others are phonetically plausible

In the Montessori setting the child:

is prepared for writing in a wide variety of ways in Montessori settings: the activities of everyday living and sensorial materials all contribute to this preparation (see Physical development)
is introduced to opportunities for mark making in the creative area where they have access to a variety of mark making implements and materials
has access to the following activities which give targeted opportunities for writing:
insets for design
sandpaper letters
large movable alphabet.
has opportunities to make connections between writing and reading when word building with the large movable alphabet, uses objects and pictures to support independent work with
pink box 1 and 2
blue box 1 and 2
has further opportunities to transcribe words built with the large movable alphabet and during use of the pink and blue reading materials is encouraged to recognise and write their own names on their work has opportunities to annotate their work and tell stories which, with the help of practitioners may be recorded

**Mathematics** involves providing children with opportunities to develop and improve their skills in counting, understanding and using numbers, and calculating simple addition and subtraction problems, and to describe shapes, spaces and measures.

**Numbers**

**In Development Matters the child of:**

**16 to 26 months:**
- knows that things exist, even when out of sight
- is beginning to organise and categorise objects, e.g. putting all the teddy bears together or teddies and cars in separate piles
- says some counting words randomly

**22 to 36 months:**
- selects a small number of objects from a group when asked, e.g. ‘please give me one’, ‘please give me two’
- recites some number names in sequence
- creates and experiments with symbols and marks representing ideas of number
- begins to make comparisons between quantities
- uses some language of quantities, such as ‘more’ and ‘a lot’
- knows that a group of things changes in quantity when something is added or taken away

**30 to 50 months:**
- uses some number names and number language spontaneously
- uses some number names accurately in play
- recites numbers in order to ten
knows that numbers identify how many objects are in a set
is beginning to represent numbers using fingers, marks on paper or pictures
sometimes matches numeral and quantity correctly
shows curiosity about numbers by offering comments or asking questions
compares two groups of objects, saying when they have the same number
shows an interest in number problems
separates a group of three or four objects in different ways, beginning to
recognise that the total is still the same
shows an interest in numerals in the environment
shows an interest in representing numbers
realises not only objects, but anything can be counted including steps, claps
or jumps

**40 to 60+ months:**
recognises some numerals of personal significance
recognises numerals 1 to 5
counts up to three or four objects by saying one number name for each of
them
counts actions or objects which cannot be moved
counts objects to ten, and beginning to count beyond ten
counts out up to six objects from a larger group
selects the correct numeral to represent 1 to 5, then 1 to 10 objects
counts an irregular arrangement of up to ten objects
estimates how many objects they can see and checks by counting them
uses the language of ‘more’ and ‘fewer’ to compare two sets of objects
finds the total number of items in two groups by counting all of them
says the number that is one more than a given number
finds one more or one less from a group of up to five objects then ten objects
in practical activities and discussion, beginning to use the vocabulary
involved in adding and subtracting
records, using marks that they can interpret and explain
begins to identify own mathematical problems based on own interests and
fascination
Early learning goal as described in the EYFS: by the end of the Reception year the child should be able to:

- count reliably with numbers from one to twenty, place them in order and say which number is one more or one less than a given number
- use quantities and objects, add and subtract two single digit numbers and count on or back to find the answer
- solve problems including doubling, halving and sharing

In the Montessori setting the child:

has opportunities to be introduced to the concept of addition and subtraction using the golden beads and large numbers

is introduced to addition and subtraction of small quantities up to nineteen using the
Snake game
Small number rods
Short bead stair
Addition strip boards
Subtraction strip
Subtraction strip board

Shape, space and measures

In Development Matters the child of:

16 to 26 months:

attempts, sometimes successfully, to fit shapes into spaces on inset boards or jigsaw puzzles

uses blocks to create own simple structures and arrangements

enjoys filling and emptying containers

associates a sequence of actions with daily routines

beginning to understand that things might happen ‘now’
Appendix 1

22 to 36 months:
notices simple shapes and patterns in pictures
beginning to categorise objects according to properties such as shape or size
begins to use the language of size
understands some talk about immediate past and future, e.g. ‘before’, ‘later’ or ‘soon’
anticipates specific time-based events such as meal times or home time

30 to 50 months:
shows an interest in shape and space by playing with shapes or making arrangements with objects
shows awareness of similarities of shapes in the environment
uses positional language
shows interest in shape by sustained construction activity or by talking about shapes or arrangements
shows interest in shapes in the environment
uses shapes appropriately for tasks
is beginning to talk about the shapes of everyday objects, e.g. ‘round’ and ‘tall’

40 to 60+ months:
is beginning to use mathematical names for ‘solid’ 3D shapes and ‘flat’ 2D shapes, and mathematical terms to describe shapes
selects a particular named shape
can describe their relative position such as ‘behind’ or ‘next to’
orders two or three items by length or height
orders two items by weight or capacity
uses familiar objects and common shapes to create and recreate patterns and build models
uses everyday language related to time
beginning to use everyday language related to money
orders and sequences familiar events
measures short periods of time in simple ways
Early learning goal as described in the EYFS: by the end of the Reception year the child should be able to:

- use everyday language to talk about size, weight, capacity, position, distance, time and money to compare quantities and objects and to solve problems
- recognise, create and describe patterns
- explore characteristics of everyday objects and shapes and use mathematical language to describe them

In the Montessori setting the child:

is introduced to a variety of shapes in their daily life and learns their names, e.g. an ice cream cone, a ball or a fluffy cube they had as a baby may be familiar with everyday shapes using a treasure basket or heuristic bags; other shapes are introduced when exploring puzzles and posting games

has opportunities to explore and learn about shapes systematically using the sensorial materials, starting with:

- the pink tower, broad stair, knobbled and coloured cylinders and the long rods
- solid shapes such as cube, prism, cylinder, pyramid, sphere
- flat shapes such as circle, triangle and a square in the presentation tray

further flat shapes in the geometric cabinet

combining both solid and flat shapes and growing in awareness of their relationships and properties

has opportunities to further explore shapes and their similarities as well as making patterns with a variety of activities such as:

- constructive triangles
- fraction figures
- stereognostic boxes
- binomial and trinomial cube.

has access to unit and other blocks and use these to express their own ideas about shape, form and pattern; the blocks build on the children’s learning from the sensorial materials listed above
is encouraged to use this knowledge in the expressive arts area to enhance their understanding of shape and space
is introduced to measuring lengths with the red rods and other implements
is introduced to measurement of time by daily use of calendars and by references to the classroom clock
is introduced to money in the role play areas of the classroom

Understanding the world: involves guiding children to make sense of their physical world and their community through opportunities to explore, observe and find out about people, places, technology and the environment.

People and communities

In Development Matters the child of:

16 to 26 months:
is curious about people and shows an interest in stories about themselves and their family
enjoys pictures and stories about themselves, their families and other people

22 to 36 months:
has a sense of own immediate family and relations
in pretend play, imitates everyday actions and events from own family and cultural background, e.g. making and drinking tea
is beginning to have their own friends
learns that they have similarities and differences that connect them to, and distinguish them from, others

30 to 50 months:
shows interest in the lives of people who are familiar to them
remembers and talks about significant events in their own experience
recognises and describes special times or events for family and friends
shows interest in different occupations and ways of life
knows some of the things that make them unique, and can talk about some of the similarities and differences in relation to friends or family
40 to 60+ months:
enjoys joining in with family customs and routines

**Early learning goal as described in the EYFS: by the end of the Reception year the child should be able to:**

- talk about past and present events in their own lives and in the lives of family members
- know that other children do not always enjoy the same things, and be sensitive to this
- know about similarities and differences between themselves and others, and among families, communities and traditions

**In the Montessori setting the child:**

is introduced to people of the world when learning about the planet and its continents by exploring: pictures of families from the different continents artefact boxes including objects which represent lifestyles on the diverse continents celebrations and festivals of people from various faiths and communities food, music and dancing as well as clothes from the continents
is encouraged to respect diversity of cultures whilst recognising similarities and acknowledging shared needs by being encouraged to think of themselves as ‘Citizens of the World’; this exploration usually begins by looking at themselves and their family has access and explores pictorial timeline such as:
of his/her own day
of the week at nursery
of his/her own life from birth to present.
The older children can also explore stories of the animal and plant kingdom by using the pre-historic timeline.
The world

In Development Matters the child of:

16 to 26 months:
explores objects by linking together different approaches: shaking, hitting, looking, feeling, tasting, mouthing, pulling, turning and poking
remembers where objects belong
matches parts of objects that fit together, e.g. puts lid on teapot

22 to 36 months:
enjoys playing with small-world models such as a farm, a garage, or a train track
notices detailed features of objects in their environment

30 to 50 months:
comments and asks questions about aspects of their familiar world such as the place where they live or the natural world
can talk about some of the things they have observed such as plants, animals, natural and found objects
talks about why things happen and how things work
is developing an understanding of growth, decay and changes over time
shows care and concern for living things and the environment

40 to 60 + months:
looks closely at similarities, differences, patterns and change

Early learning goal as described in the EYFS: by the end of the Reception year children should be able to:

• know about similarities and differences in relations to places, objects, materials and living things
• talk about features of their own immediate environment and how environments might vary from one another
• make observations of animals and plants and explain why some things occur, and talk about changes
In the Montessori setting the child:

learns about the physical features of the world by exploring:

the solar system
the structure of the Earth
volcanoes
the Earth and its physical features: land, water, air, mountains, rivers, deserts, rainforests, islands, lakes etc.

becomes familiar with the natural features of their immediate environment by exploring the nursery garden, local park and their neighbourhood, where they learn to identify seasons, familiar trees and animals

has opportunities to observe natural features of their environment by observing, investigating and looking after fruits, flowers and vegetables they have planted in their garden, as well as the pets in their setting and those which come to visit

brings the experiences from the outdoor classroom inside and explores them further with the use of specific materials such as:

life cycle models
pairing objects with pictures of plants, fruits and vegetables, and animals
classification cards such as herbivores/carnivores, vertebrates/invertebrates, and land/sea animals
food chain models
animals of the world/continent/country.

is encouraged to take responsibility for their immediate environment and participate in recycling projects

Technology

In Development Matters the child of:

16 to 26 months:

anticipates repeated sounds, sights and actions, e.g. when an adult demonstrates an action toy several times

shows an interest in toys with buttons, flaps and simple mechanisms and is beginning to learn to operate them
22 to 36 months:
seeks to acquire basic skills in turning on and operating some ICT equipment
operates mechanical toys, e.g. turns the knobs on a wind-up toy or pulls back on a friction car

30 to 50 months:
knows how to operate simple equipment, e.g. turns on CD player and uses remote control
shows an interest in technological toys with knobs or pulleys, or real objects such as cameras or mobile phones
shows skill in making toys work by pressing parts or lifting flaps to achieve effects such as sound, movements or new images
knows that information can be retrieved from computers

40 to 60+ months:
completes a simple program on a computer
uses ICT hardware to interact with age-appropriate computer software

Early learning goal as described in the EYFS: by the end of the Reception year children should be able to:

- recognise that a range of technology is used in places such as homes and schools
- select and use technology for particular purposes

In the Montessori setting the child:
is introduced to and encouraged to use appropriate technology such as CD players, cameras, microscopes etc.
is shown how to safely use a range of relevant utensils when cooking, gardening, doing carpentry, sewing etc.

Note that ICT equipment is introduced once children have a good grasp of their environment and have had extensive opportunities to explore, investigate and learn about their environment from real experiences
**Expressive arts and design** involves enabling children to explore and play with a wide range of media and materials, as well as providing opportunities and encouragement for sharing their thoughts, ideas and feelings through a variety of activities in art, music, movement, dance, role play, and design and technology.

**Exploring and using media and materials**

In Development Matters the child of:

**16 to 26 months:**
- explores and experiments with a range of media through sensory exploration, and using whole body
- moves whole body to sounds they enjoy such as music or a regular beat
- imitates and improvises actions they have observed, e.g. clapping or waving
- begins to move to music, listen to or join in rhymes and songs
- notices and is interested in the effects of making movements which leave marks

**22 to 36 months:**
- joins in singing favourite songs
- creates sounds by banging, shaking, tapping or blowing
- shows an interest in the way musical instruments sound
- experiments with blocks, colours and marks

**30 to 50 months:**
- enjoys joining in with dancing and ring games
- sings a few familiar songs
- begins to move rhythmically
- imitates movement in response to music
- taps out simple repeated rhythms
- explores and learns how sounds can be changed
- explores colours and how colours can be changed
- understands that they can use lines to enclose a space and then begin to use these shapes to represent objects
- is beginning to be interested in and describe the texture of things
uses various construction materials
is beginning to construct, stacking blocks vertically and horizontally, making enclosures and creating spaces
joins construction pieces together to build and balance
realises tools can be used for a purpose

**40 to 60+ months:**
begin to build a repertoire of songs and dances
explores the different sounds of instruments
explores what happens when they mix colours
experiments to create different textures
understands that different media can be combined to create new effects
manipulates materials to achieve a planned effect
constructs with a purpose in mind, using a variety of resources
uses simple tools and techniques competently and appropriately
selects appropriate resources and adapts work where necessary
selects tools and techniques needed to shape, assemble and join materials they are using

**Early learning goal as described in the EYFS:** by the end of the Reception year the child should be able to:

- *sing songs, make music and dance, and experiment with ways of changing them*
- *safely use and explore a variety of materials, tools and techniques, experimenting with colour, design, texture, form and function*

**In the Montessori setting the child:**
should be encouraged to express ideas spontaneously using a variety of media and through words, music, movement and dance as well as stories
children in all Montessori settings should have free access to high quality resources which will develop the skills essential for spontaneous creative activities. In practice this means learning how to:

use scissors, glue and tape
use different types of paint with large and small brushes
print
make a collage using a variety of materials such as paper, textiles, natural materials
use stencils
create with play dough
make models with clay
use other modelling materials
make three-dimensional constructions from a variety of materials – paper, cardboard, wood and plastic.
has access to daily singing and use of instruments

**Being imaginative**

**In Development Matters the child of:**

**16 to 26 months:**
expresses self through physical action and sound
pretends that one object represents another, especially when objects have characteristics in common

**22 to 36 months:**
is beginning to use representation to communicate e.g. drawing a line and saying ‘That's me’
is beginning to make-believe by pretending

**30 to 50 months:**
is developing preferences for forms of expression
uses movement to express feelings
creates movement in response to music
sings to self and makes up simple songs
makes up rhymes
notices what adults do, imitating what is observed and then doing it spontaneously when the adult is not there
engages in imaginative role play based on own first-hand experiences
builds stories around toys, e.g. farm animals needing rescue from an armchair ‘cliff’
uses available resources to create props to support role play
captures experiences and responses with a range of media, such as music, dance and paint and other materials or words

40 to 60+ months:
create simple representations of events, people and objects
imitates new combinations of movement and gesture in order to express and respond to feelings, ideas and experiences
chooses particular colours to use for a purpose
introduces a storyline or narrative into their play
plays alongside other children who are engaged in the same theme
play co-operatively as part of a group to develop and act out a narrative

Early learning goal as described in the EYFS: by the end of the Reception year the child should be able to:

• use what they have learnt about media and materials in original ways, thinking about uses and purposes
• represent their own ideas, thoughts and feelings through design and technology, art, music, dance, role play and stories

In the Montessori setting the child:
should be encouraged to express their ideas spontaneously using a variety of media and through words, music, movement and dance as well as stories
should have opportunities to express their ideas through spontaneous role play and should be encouraged to explore possibilities regarding resources for role play and its focus – the adults’ role needs to be supportive, sensitive and encouraging
the adult role in the creative process should be supportive and nurturing by exploring possible use of resources or discussing how best to achieve the child’s desired outcomes. Adults leading the creative process tends to limit opportunities for spontaneous expression
Appendix 2

The Safeguarding and Welfare Requirements (DfE, 2012)

The checklist which follows summarises the requirements (including policies and procedures, many of which are already in place but may need an update or review) to ensure the legal operation of your setting. The original focus of the EYFS in relating to the five outcomes of Every Child Matters is no longer required and settings may wish to use the following information as a means of organising their documentation for Ofsted. Schools with children aged over five are not required to have separate policies relating to the EYFS requirements where whole-school policies already exist.

Safeguarding/Child protection

Refer to sections 3.4, 3.5, 3.7 and 3.8 of the Statutory Framework

- Safeguarding policy and procedures must be in line with Local Safeguarding Children Board (LCSB)
- The policy must refer to procedures regarding the use of cameras and mobile phones. Trained designated practitioner
- Staff training in safeguarding

Suitable people/Disqualifications of registered providers/Staff taking medication and other substances

Refer to sections 3.9–3.17 of the Statutory Framework
Appendix 2

- DRB check and personal disclosure
- All documents relating to staff and identity checks must be recorded and available
- Schools keep these in a ‘single central register’
- Qualifications and suitability check
- Disqualifications (section 3.14)
- Information about action to be taken in the event of staff being disqualified would be best included in staff handbook
- Staff taking medication/other substances (section 3.17)
- Information about staff taking medication and use of other substances would be best included in staff handbook
- Information for staff about safe storage of medicines should also be considered and included in the staff handbook and repeated in the Health Policy relating to administration of medicines to children in the setting

Staff qualifications, training, support and skills

Refer to sections 3.18–3.25 of the Statutory Framework

- Induction
- Supervision and training
- Full and relevant qualifications
- Level 3 for managers and at least half of the staff must hold full and relevant level 2 qualifications
- Paediatric first aid certificate
- At least one member of staff with First Aid certificate should be on the premises at all times
- Sufficient understanding and use of English

Key person

Refer to section 3.26 of the Statutory Framework

- Each child must be allocated a Key Person whose role it is to act as a link between the setting, the child and his/her family
Staff:child ratios

Refer to sections 3.27–3.38 of the Statutory Framework

Please note further information for child-minders sections 3.39–3.41

- Children’s safety is paramount
- Staffing arrangements and deployment of staff must meet the needs of all children and ensure their safety
- Persons aged 17 and over may be included in ratios; students on long term placements may also be included, provided owner/manager is satisfied of their competence
- Montessori Centre International advises all settings, and believes it to be best practice, not to include students on teaching practice in the adult:child ratio, unless they are already paid members of staff before starting the teaching practice component of their studies
- Ratios relate to qualifications and ages of children – under two/two-year-olds/three and over

Health/Food and drink/Accident or injury

Refer to sections 3.42–3.49 of the Statutory Framework

- Procedures for attendance by children who are not well
- Administration of medicine based on information from a general practitioner (GP) and where appropriate from parents/carers
- See reference under staff medication – section 3.17
- Food and drink policy – focus on healthy and nutritious eating
- All meals provided must be healthy, balanced and nutritious, drinking water must be available at all times
- Accident and injury policy
- First aid box must be available at all times
- Accident/first aid and incident records must be kept
- Notification to Ofsted of any serious accident, illness or injury, in cases of food poisoning affecting two or more children
Managing behaviour

Refer to sections 3.50–3.52 of the Statutory Framework

- Behaviour management policy with a named practitioner responsible for the management of behaviour
- Physical punishment is forbidden as is threatening such punishment

Safety and suitability of premises, environment and equipment/smoking/premises/risk assessment/outings

Refer to sections 3.53–3.65 of the Statutory Framework

- Health and safety policy must be in place underpinned by appropriate risk assessment
- No smoking policy
- Premises must comply with indoor space requirements, and both indoor and outdoor premises are fit for purpose
- Equipment must be safe and appropriate
- Adequate space for rest and sleep must be provided
- Adequate toilet and changing facilities for children with a separate adult toilet provision
- Adequate area for private conversations with parents/carers
- Children to only be released into care of individuals nominated by parents/carers
- Public liability insurance is required
- Vehicle insurance is needed for all staff transporting children on behalf of the setting
- Risk assessments: policy and procedures are needed, with written assessments being made at the discretion of the provider (this is a new responsibility), this also includes outings
Equal opportunities

Refer to section 3.66 of the Statutory Framework

- Setting must have an appropriate policy and procedures in place; this must include a Special Education Needs policy managed by a named SENCO

Information and records/information about the child/information for parents and carers/complaints

Refer to sections 3.67–3.74 of the Statutory Framework

- Need for regular two-way flow of information with parents and other providers, if child attends more than one setting
- Records must be accessible and available; confidentiality must be observed and staff must be aware and protect privacy and confidentiality (data protection)
- See earlier reference to staff records – CRB check and personal disclosure – section 3.12
- Register with Information Commissioner’s Office under the Data Protection Act 1
- Setting must hold statutory information about the child and about the provider
- Provide information for parents and carers including complaints procedures

Information about the provider

Refer to section 3.75 of the Statutory Framework

- Full details of the provider and other people living on the nursery premises
- Full details of all those who have regular unsupervised contact with children attending the setting
- Daily register of children’s attendance which includes hours of attendance and names of key persons
- Certificate of registration to be displayed
Appendix 2

Changes that must be notified to Ofsted

Refer to sections 3.76–3.77 of the Statutory Framework

- Any changes in the address of the premises
- Changes which may affect the space available to children and the quality of their childcare
- Changes in the name or address of the provider or other contact information
- Changes to the person managing the setting
- Any proposal to change the hours during which the childcare is provided
- Where the provision is provided by a company or charity, any change in the name or registered number of the company/charity/partnership, corporate body or unincorporated association, any change to the ‘nominated person’
- Where it is reasonably practicable, notifications of changes should be made in advance. In other cases, notification must be made as soon as is reasonably practicable but always within 14 days
What is the effect of the changes?

Clearly there has been an attempt to reduce the number of policies which providers are required to have. However, in several cases practitioners will still have to demonstrate that the setting’s procedures are adequate to cover the situations – so a policy is a fairly easy way of doing so.

- Health and safety policies are recommended as good practice and the HSE’s guidelines should be used during annual review of these policies to ensure they are current and relevant.
- The behaviour policy is no longer required but providers will still need staff to share practices and so guidelines for induction of staff and as continuing guide should be considered by settings. The sharper focus on not having physical punishment is a positive change.
- Risk assessments and a relevant policy become the responsibility of the provider to ensure that appropriate procedures are known by and followed by staff.
- The absence of a section directly referring to Equal Opportunities appears retrogressive.
When looking at the assessment requirement the reference to the two-year-old progress check is sharpened and the focus on integrated working across professional is most welcome. The EYFS Profile remain unchanged, with plans in place for it to become optional from September 2015 when the baseline assessment in YR is rolled out.

The requirement to obtain parental approval for children to go on an outing disappeared, however, it would still be a good idea to get approval, even if this is a blanket approval, especially for regular trips, such as to the park.

With regard to staff management, the references to ‘appraisals’ have disappeared with stronger focus on more regular ‘supervisions’ which could be as frequent as fortnightly. The changes to ratios recognise level 6 qualifications including Early Years Teacher qualifications. The change to a 1:13 ratio where a registered setting has a L6 qualified person is helpful.

The major changes are the new references to child-minder agencies as these come into operation during the coming year. Other changes are less substantial than might appear as they place the onus for identifying what is needed upon the provider, rather than saying a policy is needed. Providers will still need to be able to demonstrate to Ofsted and others that they can meet the requirements. Documentation such as policies are the easiest way of doing so.

Appendix 1–3 were prepared with kind permission of the Montessori Schools Association, University House, 11–13 Lower Grosvenor Place, London SW1W 0EX and draw on their documentation.
Appendix 4

Montessori activities and materials

These materials provide learning opportunities for children between the ages of two to six years. They can be supplied by Absorbent Minds, this supplier offers a comprehensive range of Montessori equipment from babies to twelve years of age. Their products range in quality and also in price, and those interested in purchasing Montessori materials have the opportunity to select the less expensive version, which may be appropriate for home use. On the other hand, a Montessori nursery school may chose the more expensive product because it will be used extensively by the children in their setting. The company website is fully illustrated and items for sale are organised according to areas of learning, therefore readers should be able to find pictures for most of the activities and materials listed below.

Practical life

Co-ordination of movement

- pouring, with jugs, small containers, strainers, funnels;
- transferring, with spoons, scoops, tongs, pipettes, droppers;
- estimating, sorting and matching.

These activities develop wrist flexibility, fine motor skills, hand–eye co-ordination, dexterity.
Appendix 4

Opening and closing

- opening a variety of containers, including those in the activity areas in the classroom;
- opening boxes, bottle lids; undoing padlocks, nuts, bolts.

These activities develop wrist flexibility (useful in writing).

Classroom skills

- cutting, using a variety of narrow paper strips;
- threading, using a range of beads from large to small;
- sewing, using sewing cards initially and progressing to use of a needle and thread;
- plaiting, using different colours of cord to highlight the pattern of the plait;
- folding, to make an envelope or book, to wrap a parcel, to fold cloths and clothes used in the classroom;
- using glue, paper clips, stapler, hole punch, date stamp.

These activities develop fine motor movement, particularly a pincer grip (useful in writing and art).

Personal independence and hygiene

- washing hands;
- using the toilet;
- cleaning teeth;
- using the nail brush;
- putting on a coat;
- putting on shoes or wellingtons;
- using a dressing frame to do up and undo buttons, laces, bows, buckles, zips.

These activities help develop skills of everyday classroom participation.
Contributing towards upkeep of the classroom

- washing, scrubbing tables and chairs, washing dusters, washing dishes (after snack or lunch);
- polishing, glass, brass, silver, wood, mirror, shoes;
- sweeping, dusting, wiping tables;
- setting the table for lunch or snack;
- gardening and looking after plants and pets.

These activities develop dexterity and contribute towards social awareness and a sense of wellbeing (as the child helps to look after the classroom).

The senses

The materials listed below can:

- refine sensorial impressions gathered during the early days of life and help organise and classify them;
- be used for matching, pairing, sorting, sequencing (laying foundations for later work in mathematics);
- help develop understanding of one-to-one correspondence, seriation and patterns and prepare for study of geometry and algebra (by understanding shape and form);
- develop dexterity and hand–eye co-ordination;
- help develop understanding of two- and three-dimensional shapes (by feeling them) and appreciation of shapes and forms found in our environment.

Understanding of shape, size and their relationships

- knobbed cylinders;
- pink tower;
- broad stair;
- long rods;
- coloured cylinders.
**Chromatic sense**

Colour boxes: colour box 1 includes pairs of the primary colours; colour box 2 includes eleven pairs of colours; colour box 3 includes nine colours.

**Understanding of geometry and algebra**

- geometric solids and their bases, stereognostic bags;
- the presentation tray, geometric cabinet and cards’ constructive triangles, tessellations;
- binomial and trinomial cube.

**Activities to refine tactile sense**

- touch boards;
- touch tablets;
- touch fabrics.

**Activities to refine understanding of weight**

- baric tablets.

**Activities to refine understanding of temperature**

- thermic tablets;
- thermic bottles.

**Activities to refine auditory sense**

- sound boxes;
- Montessori bells.
Activities to refine the sense of smell

- smell bottles.

Activities to refine the sense of taste

- taste jars.

Mathematics

Children work with numbers, exploring both quantities and symbols, before being introduced to the decimal system and addition, subtraction, multiplication and division.

Counting 0–10

The child builds up an understanding of 0 to 10 by manipulating objects and associating these objects with the written symbol. The child begins to learn one-to-one correspondence and the sequential nature of numbers.

- large number rods;
- sandpaper numerals;
- number rods and cards;
- spindle box;
- cards and counters.

The decimal system

Golden beads (which can be replaced by the wooden decimal materials commercially produced) are used to introduce the hierarchies of the decimal system. Beads as well as numeral cards (which use colour to represent the given hierarchies and place value) are used.
Appendix 4

**Group operations with golden beads**

These activities introduce addition, subtraction, multiplication and division through group games.

They reinforce knowledge of numbers to ten and relationships of decimal hierarchies. They introduce the concept of changing from one decimal hierarchy to another.

They provide a tangible example of the principles behind the four operations, for example, that addition is a process in which we ‘add several smaller quantities to make another, larger quantity’.

**Counting 10 to 99**

- Teen Boards (Seguin Board A) numbers 11–19 using new materials;
- Ten Boards (Seguin Board B) numbers 10–99 using new materials;
- bead chains 100/1,000 conservation/reversibility of number.

**Addition and subtraction of small numbers (1 to 19)**

**Addition activities**

- Snake Game (number bonds to 10);
- number rods (addition equations);
- addition with short bead stair (recording answers);
- addition strip board – introducing adding on, practising recording.

**Subtraction activities**

- subtraction with short bead stair (subtraction equations);
- small number rods (recording answers).

**Tables**

Children start working on tables, still using objects that they manipulate.
Charts

These charts reinforce previous learning of the number operations and help children memorise answers to the equation.

- addition chart A and B;
- subtraction chart A and B;
- multiplication chart A and B;
- division chart A and B.

Fractions

Children start to use the fraction materials, using the fraction symbols and combining them with the fraction pieces. They learn about numerators, denominators, equivalents and reduction.

Measurement

Children learn about measurement by using spoons, cups as well as scales to measure ingredients during cooking activities.

They also use the long rods as a unit of measurement and usually have access to a measuring tape.

They learn about clocks and time recognition is usually introduced around the age of five.

Money is introduced during role play.

Literacy materials

Most of the literacy materials used are teacher-made.

Writing

Insets of design encourage pencil control, lightness of touch and contribute to letter formation.
Sandpaper letters introduce the child to letter sounds and shapes in a multi-sensory manner.

Large Moveable Alphabets make links between the letter shape and formation of words at the time when children may not have the motor ability to write words. Objects and pictures are used to help children identify suitable words for word building.

**Reading**

Most Montessori nursery schools organise their reading activities into colour-coded levels, starting with words that consist of a consonant followed by a vowel followed by a consonant such as mat, pin, box. These words are suited to further activities with ‘onset and rime’ and prepare children well to decode more complex words using blends, diagrams and phonograms.

**Pink level reading**

The first level of reading focuses on three letter words consisting of the regular pattern consonant, vowel, consonant (such as pin, cot, bib).

**Blue level reading**

When children are competent in decoding three letters words, they are introduced to initial and final blends, the schwa vowel, double consonants (such as st, fr-, fl-, pr-, -ck, -sh, sh-, -ch, ch-, -th, th-).

Resources for children following the same sequence of activities in both levels:

- Boxes 1 and 2 – word building with Large Moveable Alphabet;
- Box 3 – decoding words on word cards using objects;
- Box 4 – supporting word cards with pictures;
- Box 5 – decoding without props (a mystery box);
- word lists;
- phrases;
- sentences;
- books.
Grammar

Grammar is introduced early in Montessori classrooms in support of the pink and blue level reading and with the help of colour-coding, which represents parts of speech.

Parts of speech are introduced through games, starting with nouns as labels that can be placed with objects in the classroom such as map, bin, rod.

- noun labels;
- singular and plural boxes, introducing the formation of plurals by adding -s;
- adjective labels;
- noun and adjective games, highlighting the function of adjectives and their position;
- verb games, acting out verbs;
- preposition boxes, highlighting the function of prepositions;
- farm boxes, building sentences based around the theme of a farm.

Green level reading

This level of reading requires competence at both the pink and blue levels. It focuses on one specific phonogram or diagraph such as -ar. The children work through the activities listed below before moving on to the next green box, which identifies new spellings.

- reading – supported by the use of pictures;
- word building – spelling difficulty is highlighted by the colour of letters, which represent the given phonogram or diagraph;
- word lists;
- phrases;
- sentences;
- books.

Cultural studies

Most of the cultural materials used in the Montessori classroom are teacher-made.
The globes and puzzle maps used in geography can be obtained from Montessori suppliers. These materials contribute to the child’s greater understanding of the natural and created world and encourage observation, exploration and investigation.

**Biology**

- a nature table, reflecting the seasons and children’s interests;
- models such as farm, wild and sea animals and birds;
- pictures of plants, animals, habitats in their classifications;
- terminology puzzles and cards identifying part of an animal or a plant;
- life cycles.

**Geography**

- land, air and water boxes;
- globes, showing land and water and the continents;
- land forms and cards;
- puzzle maps of the world and individual continents;
- animals of the world;
- flags;
- artefact boxes and collections of pictures of children and their families from around the world;
- mapping games.

**History**

Children are introduced to the concept of time.

- egg timers;
- timelines;
- calendars.
Science

Experiments that focus on investigating the properties of:

- the four elements (light, water, air, fire – fire is used with adult supervision only);
- magnetism;
- electricity.
Bibliography

Bibliography


* Please note that all the titles identified with * are now available from Montessori Pierson Publishing, Amsterdam.
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