

Element One

The Learning Environment

1. Organising and maintaining the classroom environment

This unit is designed to help the Teachers Assistant think about important features of the classroom environment and ways that they can contribute to making a positive and effective classroom environment.

Goals of a quality learning environment

The learning environment can either support or detract from the efforts of the teacher, the teaching assistant and the pupils. When making decisions regarding the learning environment it may be helpful for the teaching assistant to keep in mind what it is that is being promoted. The goals of a quality learning environment should include to:

- maximise learning
- create a safe and positive environment
- minimise behaviour problems

When teachers and teaching assistants consciously develop a plan for setting up the classroom and consistently apply that plan, classrooms become more effective. Effective classroom organisation maximizes the time spent on teaching and learning experiences.

Effective classroom organisation and maintenance

Teaching assistants working in any type of school setting, whether they are employed to support an individual pupil, a group of pupils a class, a subject or year group, should contribute to maintaining an effective learning environment. This may involve some or all of the following duties:

- Keeping classroom resources in good order.
- Assisting in preparation of resources before lessons and tidying afterwards.
- Cleaning and ensuring the classroom is tidy.

- Repairing and maintaining apparatus and resources.
- Assisting in the presentation of work and display areas

In order to carry out these duties the teaching assistant will first need to establish these important factors which may vary from school to school:

- Their role and responsibility for helping to organise the learning environment
- The roles and responsibilities of others within the school in respect of establishing and maintaining learning environments
- The principles and practices of inclusive education and the implications of these for setting out learning environments
- What safety equipment is kept in different learning environments
- Where different equipment and materials are kept
- The school's health and safety policy as it applies to learning environments, resources and materials
- The school requirements and any other guidance for health, hygiene, safety, security and supervision in the setting, including access to premises, store rooms and storage areas.

In order to provide an effective learning environment and promote learning outcomes, effective organisation and maintenance should be carried out in the following areas:

1. Prepare and maintain the learning environment

A learning environment could be any area inside or outside of the school setting which is used for teaching and learning. Learning environments may be general teaching areas such as classrooms or the school hall; specialist teaching areas such as those set up for science, art, food technology, or PE; or outside areas such as the playground or sports fields

Tasks which an assistant may be asked to carry out after a short period of induction training and with straightforward guidance from the classroom teacher might include:

- Participate in the organisation and maintenance of the classroom environment.
- Decorate bulletin boards, as appropriate for time of year, lesson content, etc.
- Make displays e.g. Mount examples of children's work, pictures, interest tables under the supervision of teaching staff

- Check the availability and location of safety equipment in the learning environment
- Maintain neat and clean desks, bookshelves etc
- Encourage pupils to return materials to the appropriate place after use
- Dispose of waste and redundant resources safely, making maximum use of opportunities for recycling materials and equipment
- Encourage pupils to dispose of wastes in a safe and tidy manner

2. Prepare the learning resources

The learning resources are the basic classroom furniture and equipment needed to support a learning activity, including general resources such as tables and chairs, curriculum specific resources such as PE equipment, science equipment: and ICT equipment such as computers or digital cameras. Duties the teaching assistant may have to perform whilst preparing the resources might include:

- Prepare and set out learning resources in line with the preparation requirements given by the teacher
- Maintain a complete and accurate inventory of resources
- Ensure that the necessary information about legal, regulatory and school requirements, and the manufacturers' instructions, are at hand
- Ensure users are aware of relevant health and safety guidance when issuing resources

3. Prepare learning materials for use

Materials may include the written materials and consumables needed for the learning activity, including general classroom items such as pencils, rulers and paper, curriculum specific materials such as paints, science materials or cooking ingredients and written materials such as handouts, worksheets and books. The teaching assistant may be required to:

- Make or organise necessary materials i.e. Flash cards, pictures, worksheets
- Record educational television and radio programmes
- Identify where different equipment and materials are kept
- Prepare materials ahead of time.
- Set out learning materials as directed by the teacher
- Store stock safely and securely, ensuring effective stock rotation where appropriate
- Develop places for convenient storage of frequently used materials.

4. Monitor and maintain the learning environment and resources

So that resources and materials are always readily available in a good condition, it will be necessary to keep accurate records of them and monitor their condition.

- Check the condition of learning resources and materials after use
- Bring any damage or losses to learning resources and materials to the attention of the teacher
- Report shortages of learning materials to the teacher
- Ensure that the quality and quantity of resources is maintained
- Inform relevant people when there is a problem with maintaining resources that is outside their area of responsibility
- Work safely at all times, complying with health, safety and environmental regulations and guidelines
- Monitor the demand for and use of resources to identify areas for improving quality, supply and suitability
- Carry out and record regular inspections of resources in line with legal, regulatory and organisational requirements
- Carry out routine cleaning and maintenance of resources in accordance with school requirements and manufacturers' instructions

2. Use learning materials, resources and equipment effectively, appropriately and safely.

Materials, resources and equipment should always be used safely, effectively and appropriately in order to promote successful outcomes. The teaching assistant can contribute to this success by preparing and organising the learning environment with the safety, comfort and security of the pupils in mind and ensure that the environment is ready for use when needed.

The teaching assistant should follow the relevant manufacturers' instructions and health and safety requirements when preparing materials for use. They should then prepare materials of the quality and quantity specified by the teacher, taking steps to keep any wastage of materials to a minimum. They should also check environmental conditions, for example heating and ventilation and adjust environmental factors within their control and adapt the physical environment to suit the needs of the pupils and the nature of the activities. They should know where to locate all safety equipment and report any concerns about availability or condition to the appropriate person.

Effective use equipment, resources and materials

A teaching assistant has the opportunity to learn a variety of tasks related to equipment and technology and to assist in making instructional options in the classroom more effective, varied, and interesting for students

With the advancement in technology, equipment being used by teachers is ever-changing. During the course of a day, the teacher's assistants may be exposed to an array of equipment and resources.

The teaching assistant should be familiar with what the school has in the way of equipment. During the first days that they are on the job, they will probably be given a tour as to where the equipment is stored, policies for use, and how to use the equipment.

The teaching assistant should take some time to practice using the equipment before it is needed and before the children are present if at all possible. This will make them more relaxed when it comes time to actually using the equipment. They could try to arrange time with the teacher, media specialist, or someone who knows about equipment use as these people will be able to guide them as they learn how to use the equipment properly.

The teaching assistant may also be asked to prepare many types of instructional materials for the teacher, especially if they are artistically inclined. To get an idea of what they may be expected to do, the following is a list of tasks sometimes performed by the teaching assistant:

- Operating the laminating machine
- Videotaping events in the classroom
- Supervising students working on media projects.
- Working computer software
- Using a camera to take pictures of class work
- Using a photocopying machine.
- Setting up and operating tape recorders, filmstrip projectors, projectors, etc.
- Making transparencies for the overhead projector.
- Preparing posters, charts, and other visual aids

Appropriate use of equipment, resources and materials

Besides using the equipment, it is also important that the teaching assistant previews presentations before using them with the class. All materials used should be appropriate for the age and developmental stage of the children using them. If the materials, resources or equipment are intended for

students of a higher developmental level or greater age the material will cause confusion whilst material aimed at a younger aged student will cause frustration.

Checking the appropriate use of materials will also include making sure that copyright laws have not been infringed by the copying of protected materials

Safe use of materials, resources and equipment

All equipment, resources and materials should be used within the manufactures recommendations and the guidelines stated in the schools Health and safety policy. The teaching assistant should therefore be familiar with this policy and assist the teacher in its implementation at all times. In addition they should:

- Ensure the learning environment is safe and free of hazards during practical activities;
- Ensure equipment and materials are used properly to support the student's learning needs;
- Ensure equipment and materials are stored in a safe manner when not in use;
- Assist in implementing appropriate safety procedures in an emergency.

Periodic training should be provided, so that all staff are well informed about changes in safety procedures to ensure that students and staff are protected

Electrical safety

All installations should conform to the requirements of the latest edition of the Institution of Electrical Engineers' Regulations for Electrical Installations, and all work must be carried out in accordance with the Electricity at Work Regulations. Staff must not undertake any work on electrical equipment or installations, including resetting trip fuses, without receiving sufficient training.

Safe Use of the Internet

The Internet and other digital and information technologies are powerful tools, which open up new opportunities for everyone to have access to the wealth of cultural, scientific and intellectual material. All school staff share a responsibility to make sure that children and young people are able to use the internet appropriately and safely. Risks to pupils can include:

- Exposure to threat of physical danger, abuse, intimidation and bullying

- Misuse of resources
- Access to inappropriate material

The teacher and the teaching assistant should teach responsible use when pupils are accessing the Internet. and provide guidance and supervision of students using the Internet in the following ways:

- Discuss the appropriate use of the Internet with pupils, monitor their use and intervene if the resource is not being used appropriately.
- Ensure computers that allow access to the Internet should only be placed in areas where adults are present.
- Discourage pupils from accessing inappropriate materials.
- Ensure pupils do not reveal the identity, password, personal address or telephone number of themselves or anyone else.
- Ensure pupils report any objectionable contact that makes them feel uncomfortable.
- Students should be directed to safe areas of the Internet
- Fit ICT tools that improve security:
 - Firewall and virus protection
 - Software filters
 - Accredited ISPs
 - Awareness of wireless technology issues

Work equipment

The School has a duty to ensure that arrangements are in place to comply with the Provision and Use of Work Equipment Regulations (PUWER). These regulations are far-reaching and cover any equipment or articles used at work, from a chair to a stepladder. The school should ensure that work equipment used by staff is suitable for the purpose intended and in good working order and should ensure that equipment is used in accordance with the manufacturer's or supplier's instructions and where necessary receive sufficient instruction and training in the safe use of equipment.

Use of chemicals and other substances hazardous to health

The School is required under the Control of Substances Hazardous to Health (COSHH) Regulations to have in place arrangements to assess the exposure of its employees and other persons to hazardous substances and take adequate steps to avoid or control the exposure. This requirement covers not only substances such as cleaning chemicals etc, but also exposure to dusts emitted by work processes, and biological hazards such as legionella. Training should be provided for health and safety coordinators or other persons nominated to do COSHH assessments.

3. How learning materials, resources and equipment can help children's learning.

Quality learning environments are those that offer children new prospects. Examples of quality environments that help children and young people are those that:

- test boundaries – mentally and physically
- create imaginary worlds
- utilise their natural surroundings
- are both sociable or solitary
- construct and alter their surroundings
- experience change and continuity

The general aim of any educational establishment should be to plan a variety of learning experiences in the curriculum that meets the needs of all the areas of the child's development. Those areas of growth and development are:

- **Physical development** - the physical growth and the development of both gross(eg. walking) and fine motor(eg. finger movement) control of the body.
- **Communication and language development** - the acquisition of language and expression of thoughts and feelings.
- **Social Development** - The child's identity, their relationship with others, and understanding their place within a social environment.
- **Perception and sensory development** - How a child functions using their senses and their ability to process that information.
- **Cognitive development** - How the individual thinks and reacts.
- **Emotional Development** – A child's increasing awareness and control of their feelings and how they react to these feelings in a given situation.

Teachers and teaching assistants should understand how children develop and plan an appropriate curriculum that takes account of children's developmental needs and the skills that they need to develop to become confident learners. Consideration should also be given to learning and participation problems caused by physical, sensory, communication or learning difficulties

Materials, resources and equipment including ICT can be used to promote education and development. Carefully planned supporting materials can provide valuable visual aids to enhance the effectiveness of teaching in a number of ways.

Learning materials, resources and equipment could include any of the following:

- basic classroom items
- curriculum specific equipment and materials,
- general Information Technology resources
- written materials.

How basic classroom equipment can help children's learning.

The marker board - Board work is generally most useful for situations where the teacher wishes to make the "big picture" available to all pupils. The information should be clear and in a logical order in order for everyone to understand the thread.

The overhead projector - One of the major advantages of using an overhead projector is that while the teacher is writing they can remain facing their audience. Writing on the overhead usually takes less time than writing on the board, and it also enables them to use pre-prepared, typed or printed material.

Films and other recorded media - Films and other recorded media such as videotapes and audiotapes add variety and vividness to presentations of course material.

Slides - Using a slide projector can be the most effective and efficient way of presenting material with a strong visual component, such as ancient architecture or animals in their native habitats

How information and communication technology can help children's learning.

The growth in technology in our world is reflected in the abundance of ICT tools available for young children to use in their learning and to learn about. Hardware that may be used in the curriculum might include any of the following:

- Colour printers
- Scanners or digital stills or video cameras with associated software
- Multimedia computers – including desktop computers, portables and personal digital
- 'Floor turtle' or robot
- Control interface with associated switches, sensors, buzzers, lights and motors
- Digital microscopes

Software that might be used as part of the curriculum might include any of the following:

- Software to move and match words and pictures; word banks;
- Word processors
- Paint and object-based drawing software
- Clip art files
- music composition programs or means of recording and editing sounds
- multimedia authoring programs
- Graphing programs to draw bar charts, pie charts and line graphs
- Flat file and branching databases
- Simple spreadsheets
- Turtle graphics programs that include the use of repeats and procedures
- Control programs that include sensing
- Simulations
- E-mail and access to the internet

Various technologies deliver different kinds of content and serve different purposes in the classroom. For example, word processing and e-mail promote communication skills; database and spreadsheet programs promote organizational skills; and modeling software promotes the understanding of science and mathematical concepts.

Digital cameras, tape recorders, camcorders and web cams can all be used to record living things, objects and materials and give children an opportunity to investigate and make sense of their environment and record their thoughts and ideas. TV, video, software and live web cams can bring in different worlds and different times, allowing children to find out about past and present events and others, cultures and beliefs.

For teachers it can be the difference between learners who are unmotivated, and a class that wants to participate. The new technologies are capable of creating real energy and excitement for all age groups. Used well, they should motivate, personalise, and stretch.

How curriculum specific equipment and resources can help pupil's learning.

Curriculum specific resources are those needed to support a particular learning activity such as PE equipment, science equipment, mathematics equipment; and ICT equipment such as computers and video players.

Choosing the right curriculum resources requires knowledge of both the learners and how they learn. Resources and equipment chosen to implement the curriculum and promote learning should:

- reflect the lives of the children and families.
- reflect the diversity found in society, including gender roles, age, language, and abilities.
- provide for children's safety while being appropriately challenging.
- encourage exploration, experimentation, and discovery.
- promote action and interaction.
- be organised to support independent use.
- be rotated to accommodate new interests and new skill levels.
- be rich in variety.
- accommodate children's special needs.

Scientific equipment

Practical skills are an essential part of competence in some disciplines especially the sciences. As well as developing these practical skills, good laboratory and practical work also helps pupils develop expertise in critical enquiry, problem solving, experimental design, data analysis and presentation, and many other important skills. Laboratories and practical classes can also help students to develop the kinds of practical intelligence so highly valued by professionals in many fields. The purpose of the lab or practical class may be to:

- improve students' understanding of the methods of scientific enquiry through experiments or problem-solving activities
- help students to develop a range of skills such as measurement, observation, reasoning, working in teams, note taking and presenting work in a written form
- support learning

Art, Craft and Design

Knowledge of using a variety of techniques with a range of artistic materials should be developed across the curriculum. Pupils should develop knowledge about colour, line, tone, pattern, texture, shape and form. They should mix, shape, arrange and combine materials to create their own images and objects that express their ideas, feelings and memories. Pupils should develop their understanding of planning, designing, modelling, modifying and reflecting. They should use a range of materials and tools and have opportunities for experimentation and problem solving. They should make simple products, mechanisms and learn that control is integral to everyday devices. Pupils

should follow patterns and designs, use materials and components imaginatively to develop their ideas for making items or products.

PE Equipment

Pupil's physical development should be encouraged by using safe and stimulating learning indoor and outdoor environments. Pupil's physical skills should be developed through opportunities to take part in regular physical activities that should enable them to develop their gross and fine motor skills. Activities should be organised and planned to provide opportunities for them to work individually, in pairs and in small groups. Through physical play they should develop an understanding of how their bodies move, how to move safely and with control and coordination. They should become knowledgeable about spatial awareness and understand rules and elements of games and be able to apply this knowledge, for example, dodging to avoid others, and how to attack and defend a target. They should create and develop co-operative and competitive games.

How written material can help children's learning.

The written materials and consumables are the products needed for the learning activity, such as handouts, worksheets and books.

Historically, the most important kinds of learning resources were paper-based, particularly books, journal articles, handout materials and students' own notes. These were the easiest ways to package up information from which students would develop their knowledge. Paper-based media were also the primary means of getting students to learn by doing, from tasks, exercises and assignments.

4. The availability and location of safety equipment.

When helping to prepare the learning environment, the teaching assistant should work with the teacher and determine how the learning environment should be set up in such a manner as to promote the safety and security of the pupils.

Health and safety in schools

Under the Health & Safety at Work Act 1974 overall responsibility for health and safety is placed with the employer. For community and voluntary controlled schools, community special schools, maintained nursery schools and pupil referral units, this is the Local Education Authority (LEA). For voluntary aided and foundation schools, the employer is the governing body.

Under this Act the employer has a duty to ensure as far as is reasonably practicable:

- the health, safety and welfare of teachers and other education staff
- the health and safety of pupils in-school and off-site visits
- the health and safety of visitors to schools and volunteers involved with school activities.

The Education Service aims to provide consistently high quality health and safety support and guidance through the Schools' Health and Safety Service and works with Head teachers and Governors to implement and improve health and safety management systems in all educational establishments. The Education Service also has a formal Health and Safety Training programme to ensure that all staff are given the relevant training.

Safety equipment

Safety equipment is the equipment required by legislation or the school for ensuring the safety of pupils and adults in the learning environment. This will include a fully equipped first aid box; equipment to protect children and adults from accidents, e.g. circuit breaker, cable guards, landing mats for PE, safety goggles for science activities; and any equipment for use in an emergency, e.g. fire blanket, fire extinguishers, emergency alarms and emergency exits

The teaching assistant should always check the location and accessibility of safety equipment and report any concerns about availability or condition to the appropriate person. The environment should be ready for use in good time for when it is needed

Safety throughout the school should be promoted by:

- Providing safe working conditions and a healthy working environment
- Mandatory safety training
- Providing materials and equipment needed to work safely
- Proactive identification and control of hazards
- Incident and accident investigation
- Legal compliance
- Occupational Safety and Health Management System and Programmes
- Communicate and encourage a culture of safe working practices
- Regular reviews

Communicating health and safety information

The health and safety coordinator will be responsible for distributing information on health and safety issues. The school's policy statement should state how staff can assess information such as outcomes of inspections and risk assessments, and local procedures for health, safety and fire.

Health and safety should also be a regular item (at least once per term) on the agenda of team meetings.

The Health and Safety Law poster will be displayed in prominent position in all work places. The member of staff responsible for Human Resources will ensure that all new employees know where to find copies of the health and safety policy and the whereabouts of safety equipment which should include first aid box, safety signage, fire extinguishers, fire blankets, alarms and emergency exits.

5. School work displays

Displays of objects and materials can not only arouse pupil's interest and catch their imagination but also provide opportunities for discussion and reinforcement of learning. Displays can take a number of forms for example:

- a collection of objects or books on a theme
- items from other parts of the world
- musical instruments
- nature tables
- posters and pictures

Displays can be particularly useful in reinforcing or extending a theme that is currently being used in order to link the pupil's activities in the school. They can provide new ideas, new vocabulary and new ways of thinking about things can be introduced this way.

Displaying pupil's work is important in any educational setting. A classroom filled with the work of children not only enhances the environment but also sends a message to pupils that their work and their learning are important.

When choosing what work to display, it should be decided what criteria to use. Staff should ask themselves "Why do we display work in the classroom?" The answers might be:

- enable pupils to see what each other is doing

- show work that we are proud of
- to learn more about a topic
- so that there are interesting things on the wall.

How to create an effective display.

Effective displays celebrate each piece of work and radiate a sense of student pride. They highlight the individual pieces of work rather than the surround or decoration. Here are some ways to create an effective display.

With a clear understanding of the purposes of the display the teaching assistant will be able to make a clear thoughtful decision about what to display and how to display it. Examples may be provided by existing displays or visiting other displays such as those in museums or libraries.

A list of qualities that make a display effective could be for example.

- Displays should be simple
- Displays should show what is most important in the work
- Decorations should fit with the piece of work and show it off
- Displays should include a label with the name of the student and the title of the work
- Displays should be neat

Framing and hanging the work

There are several ways to make the display attractive and attention grabbing.

- Simple frames can be made by placing the work on top of another piece of paper that is slightly larger and of a complementary or contrasting colour
- A straight line drawn around the outside of the piece
- Pieces hung at different angles, or pieces at staggered steps or in an interesting pattern
- Work displayed against a backdrop which can draw the viewer's eye to the piece. Perhaps a large piece of paper or a piece of fabric in a complementary or contrasting colour cut to a different shape or size behind the displayed work

Tips about displays

Displays should:

- have a meaningful connection to the curriculum.
- be an effective tool for teaching and learning.

- reflect effort and not just perfectly mastered work. Displays should make every child feel valued regardless of his or her academic or artistic abilities.
- always be one display that reflects the efforts of everyone in the class. These displays affirm each child's sense of belonging and have a powerful effect on creating community
- be fresh, useful and uncluttered. Pupil's work should be changed often enough to keep the displays relevant to the curriculum and keep them from getting stale. Where there is limited space, it is better to regularly rotate the children's work than to crowd and clutter the area.