

Australian Standard[®]

**Supervised adventure
playgrounds**

**Guide to establishment and
administration**

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Australian Consumers Association
Australian Council of State School Organizations
Australian Federation of Consumer Organizations
Australian Retailers Association
Australian Toy Association
Confederation of Australian Industry
Department of Business and Consumer Affairs
Department of Education, N.S.W.
Department of Education, Vic.
Department of Health (Commonwealth)
Department of Home Affairs
Department of Industrial Relations, N.S.W.
Department of Labour and Industry, Vic.
Health Commission of New South Wales
Industrial Design Council of Australia
Kindergarten Union of New South Wales Incorporated
Local Government Association of New South Wales
Metal Trades Industry Association of Australia
Ministry of Consumer Affairs, Vic.
Municipal Association of Victoria
National Safety Council of Australia (Victorian Division)
Plastics Institute of Australia Incorporated
Playgrounds and Recreation Association of Victoria
Royal Australian Institute of Parks and Recreation
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PREFACE

This standard was prepared by the Association's Committee on Playground Equipment, with the cooperation and assistance of the directors of two successfully operating playgrounds in Fitzroy (Melbourne) and in North Sydney.

It has been developed to encourage the establishment of this type of playground, a concept which was conceived in Denmark and has spread widely throughout Europe, Scandinavia and the U.K.

The proposal to develop this standard arose during the discussions at the first meeting of the committee. It was generally agreed that such playgrounds were needed in Australia, and that a standard should be prepared in the form of a guide to their establishment and administration.

In the development of this standard the committee referred to the draft Consultative Document prepared by the National Playing Fields Association, London Adventure Playground Association and the National Delegates Meeting of Playworkers entitled Towards a Safer Playground, Part 1—Structures and Outdoors.

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STANDARDS ASSOCIATION OF AUSTRALIA

Australian Standard
for
**SUPERVISED ADVENTURE PLAYGROUNDS—GUIDE TO ESTABLISHMENT AND
ADMINISTRATION**

FOREWORD

The term 'adventure playground' has been adopted internationally for a fully supervised playground where children can develop their own ideas of play and where they are given an opportunity to undertake individual or group activities which would not otherwise be available to them.

The need for such playgrounds was recognized in 1943 by a Danish architect, T.H. Sorensen, who was responsible for the building of a high-rise, high-density-population housing scheme. A playground was to be designed and built as an amenity for the children who would live in the block. The children were given building materials and tools and asked to build the sort of playground they would like, the intention being that the architects would then design and build properly on the ideas generated by the children. A formal playground has never been built on the estate but generations of children have enjoyed the pleasures of building and creating their own activities on the area originally set aside for it. This was truly a children's playground and not one designed by adults.

The aim of the committee in preparing this standard is to draw the attention of educationalists, Local Government Authorities and Housing Commissions to this need and to provide information and guidelines which it is hoped will encourage them to consider the development of such playgrounds. According to educationalists, the playgrounds are needed not only in the less-affluent, high-density inner-city areas but also in affluent areas where children, because of their highly structured lives, have few opportunities available to them to enjoy creative activities in their leisure time.

The standard is also aimed at increasing the confidence of playground directors and their assistants, first in teaching the children to develop skills and patterns of play with due regard to their own safety and the safety of others, and secondly in coping with situations which will occur from time to time on the playground.

The need for adequate staffing and training and adequate finance to purchase necessary equipment should be recognized by those people or organizations responsible for playgrounds of this type.

Lady Allen of Hurtwood writes in support of adventure playgrounds in her book 'Planning for Play' —

'Most young people at one time or another have a deep urge to experiment with earth, fire, water and timber, to work with real tools without fear of undue criticism or censure. In these playgrounds their love of freedom to take calculated risks is recognized and can be enjoyed under tolerant and sympathetic guidance.'

Emphasis in an adventure playground is on self-built structures usually of a temporary nature, such as cubby houses. As the materials used will generally be second-hand or salvaged, they must be carefully inspected, and nails and other hazards recovered before being released for use by the children. It is therefore recognized that structures cannot comply with the standards set for playground equipment which is manufactured and installed for a use period of up to 20 years in public and school playgrounds. Nevertheless it is recommended that copies of the standards for playground equipment, AS 1924, Playground Equipment for Parks, Schools and Domestic Use, Part 1—General Requirements, and Part 2—Design and Construction—Safety Aspects, and AS 2155, Playgrounds—Guide to Siting and to Installation and Maintenance of Equipment, be kept in the playground director's office for reference.

The involvement of retired people with building, carpentry and other relevant skills should be encouraged at all times to the benefit of the community as a whole.

A reading list is given in Appendix F for those who wish to learn more about the concept from those who have actively participated in the establishment and operation of adventure playgrounds.

GUIDE

1 SCOPE. This standard sets out recommendations, for guidance only, that should be followed in the choosing of a site for, and in the safe supervision and operation of, an adventure playground.

The aim of this standard is to encourage and assist people in the establishment of adventure playgrounds to foster and encourage the child's total development in areas where children would otherwise have little or no opportunity to use their creative talents. The standard also aims to draw attention to potential hazards and to ways in which these can be minimized so that children may have a feeling of confidence and security in the use of the structures which they themselves build or cooperate in building.

2 DEFINITIONS. For the purpose of this standard, the following definitions apply:

Adventure playground—a fully supervised informal playground where children can develop their own ideas of play and where they are given an opportunity to undertake individual or group activities which would not be otherwise available to them. The playground may include some manufactured equipment.

Playground director—a person employed full-time who is responsible for the overall management of the playground.

3 THE SITE FOR THE PLAYGROUND.

3.1 General. Wherever possible choose a site with safe easy access, avoiding possibly busy streets and highways. Approach the relevant authorities regarding both the erection of signs warning that children are playing in the area and the provision of a pedestrian crossing.

Carefully consider dangers arising from power-lines, railway lines, rivers, creeks or lakes which may border the site.

3.2 Physical Characteristics. Avoid wherever possible featureless and treeless sites. Where such a site is the only one available, contouring related to climatic conditions, to the surrounding area and dwellings, and to any manufactured equipment which may be used, should be carefully planned to increase its character. Check trees to ensure that they are sound.

To give the children a feeling of privacy and to help make the untidy uncoordinated appearance of the playground more acceptable to local residents, contour and/or shield the perimeter fence and lockable gate with a screen of trees, shrubs or creepers which also provide shade and visual interest. Poisonous plants should be avoided.

NOTE: Helpful information on trees and plants is given in Appendix B.

Avoid sites reclaimed through tipping of rubbish because glass, metal or poisonous substances could be unearthed when gardens or foundations are being dug.

Different levels in the playground enable different activities to go on at one time and make it easier for children to play in groups.

The site should be of a size that can be effectively supervised, but it must give ample space for the activities of the children for whom it is being established.

3.3 Services. Consider the need for electricity, sewerage and garbage services and telephone and emergency services. Drinking water is essential and toilets must be provided, unless a public lavatory is close at hand with safe access.

Ensure that electrical wiring and associated installations are placed so that children will not have access to powerlines, junction boxes, terminals, meters, fuses and control panels.

Reticulation services, switching gear and pumping equipment, should incorporate a 'lock out' system.

3.4 Regulations and Covenants. Establish and maintain liaison with the appropriate authority or Local, State or Federal Government Department which has jurisdiction over the area regarding any regulations, covenants or restrictions which might apply to the site under consideration.

3.5 Site Information. To establish suitability of the site and the approximate site preparation cost, consider the following physical properties:

- Orientation to sun and wind
- Surface levels and gradients
- Soil and subsoil
- Water table
- Nearest sewers
- Adjacent stormwater drains and ditches
- Level of water discharge and susceptibility to flash flooding
- Topography
- Vegetation
- Building on site
- Adjoining land uses (including buildings)
- Fencing.

3.6 Site Preparation.

3.6.1 General. Seek professional advice regarding tree preservation and elimination of dangerous or harmful trees. Avoid damage to existing underground services such as power, drainage and telephone cables. As soon as existing dangers have been removed from the site, invite the children in the area to participate in the clearing and preparation of the site. This is exciting and creative and indicates from the start that the playground belongs to them.

3.6.2 Drainage and installation of services. Ensure that drainage and installation of services comply with the requirements of the appropriate authority.

3.6.3 Initial development and planning. Plan the playground only to the extent necessary to ensure that a maximum area of free space is set aside for activities such as buildings, gardening, building fires, playing with water and keeping pets.

In addition to toilets, a building housing an administrative area and secure storage space for tools and equipment for handicraft is essential.

Secure all buildings as far as possible against intruders and vandals.

Plan other buildings as the need arises. Priority should be given to providing an indoor recreation area for use in winter and in wet weather.

Depending on the size of the playground and the needs of the children in the community, it may be necessary to set aside an area for the under-five-year-old children and a hard surface area for some games. The area for the under-fives may be separated from the rest of the adventure playground area by the positioning of the building or by planting trees and shrubs.

The skilful use of landscaping can control the flow of children even within the adventure playground area.

4 STAFFING. Appoint a full-time director who is adequately trained, e.g. through recreation courses and is capable of supervising building and creative projects and preferably has a current first aid certificate. Ensure that a second adult, whether an assistant director or a reliable volunteer, is in attendance at any one time. An adventure playground is a community project. Mobilise the resources of retired people skilled in carpentry, building, gardening etc.

The second adult is required for the following reasons:

- (a) To supervise the playground should an accident claim the attention of the director.
- (b) To support the director on occasions where older children give trouble.
- (c) To supervise the playground should the director become involved in a group activity requiring his individual attention.

Three full-time staff members is the ideal minimum number as this allows them to build relationships and establish communication with the children which, in turn, influences the relationship and attitudes they form among themselves.

5 EMERGENCIES. To cope with emergencies that will arise, observe the following points:

- (a) An adequate first-aid kit is essential (see Appendix C).
- (b) Although playground staff should not dispense medicines, they should have a first aid certificate.
- (c) If a telephone is not connected to the site, there must be quick access to one.
- (d) Keep an address book listing the names, addresses and telephone numbers of children and their parents and also those of the local doctor, fire brigade, ambulance, police, casualty department and local council.
- (e) Keep records of all accidents and where a child needs hospital treatment.

NOTE: Appendix D gives a proforma of an accident record. Whenever possible a parent should accompany him/her. Keep a list of persons who can be called on to accompany the child to hospital if the parents cannot be contacted.

- (f) Keep a record of any particular health problems children may have and any special instructions to be adhered to either normally or in the case of an emergency.

NOTE: Appendix E gives a proforma medical questionnaire to be completed by the parents or guardian.

- (g) Keep the entrance to the playground clear at all times.

6 STRUCTURES. When the erection of larger or semi-permanent structures is being planned, refer for guidance to the construction requirements specified in

AS 1924, Part 2, and to the recommendations relating to layout and surfacing given in AS 2155.

The positioning of structures may be used effectively as a means of controlling the flow of children in the adventure playground. The inter-relationship of the activity and movement generated by the different structures must therefore be considered. For example, it may be possible to use some structures as subtle barriers to stop the flow of children across the paths of flying foxes, swings and slides.

It is recognized that few standards applying to manufactured equipment can be applied to structures built by children with the aid of playground staff; nevertheless keep copies of AS 1924, Parts 1 and 2, and AS 2155 on the playground for reference, and follow these procedures:

(a) Materials.

- (i) Check all wood to ensure that it is sound and suitable for the purpose for which it is to be used.
- (ii) Check wooden structures regularly for any evidence of rot, splitting or splintering.
- (iii) Never accept asbestos sheeting (fibro) because of the health risk.
- (iv) Consider the protection of timber which will be below ground for a considerable period. Refer to Clause 2.15 of Part 1 of AS 1924 for information in this regard.

(b) Securing beams.

- (i) Secure beams in permanent structures and beams which are subject to stress, e.g. cross beam of a swing, with bolts and countersinks to eliminate injury risk.
- (ii) Use galvanized or sheradized nails and check them regularly to ensure that they do not work their way out.
- (iii) Make junctions with two flat surfaces or lashed over nails or bolts for extra strength.
- (iv) Lash junctions subject to a lot of strain.
- (v) Use wooden blocks attached to uprights to facilitate positioning and fixing of cross beams during erection, by using them both to support the cross beam as it is being raised and as a ladder when fixing the beam in position.
- (vi) Attach cross members diagonally from the uprights to the cross beam for extra strength.

(c) Platforms and hand/guardrails, climbing frames and towers.

- (i) Build in accordance with the preceding instructions. Refer also to Clauses 2.3 and 2.4 of AS 1924, Part 2, and follow as closely as possible the design specification for access covering, ramps, stairways, step and rung ladders, handrails and guardrails, platforms and landings.
- (ii) Consider designing access, whether by climbing frames or by stairs or ladder, to be naturally selective, particularly to such things as rope bridges and flying foxes, by spacing lower rungs or steps to make the initial climb difficult or impossible for children for whom the structure was not intended.