

Playground injuries often occur when a child falls from play equipment onto a hard surface.

Playground equipment that measures 600mm or more above ground level requires a falling space and impact area. The falling space and impact area is a safety zone that surrounds the equipment and is free of obstacles.

Certified playground surfacing is required within impact areas. Refer to the information sheet on Playground Surfacing.

Free Height of Fall

Free height of fall is measured from ground level to the intended point of body support e.g. foot, hand, seat or platform.

The maximum height of platforms for playground equipment varies as follows:

- All Age settings (schools and public playgrounds) is 3000mm above ground level.
- Supervised Early Childhood Settings is 1800mm above ground level.

Falling Space

This is the space in, on or around the equipment that a user can fall through from an elevated part of the equipment. The falling space should be free of obstacles that could injure a user in the event of a fall.

Free Space

This is the space in or around the equipment that can be occupied by a user undergoing forced movement such as on swings, rockers, slides, spinners, carousels and flying foxes.

Impact Area

The impact area is measured from a point directly below the elevated part of the equipment where the equipment measures 600mm or more above ground level.

For static equipment with platforms 600-1500mm above ground level the impact area is 1500mm. AS 4685:2021 specifies a graded system of impact area for platform heights of more than 1500mm (refer to table on page 3). The impact area between static equipment can overlap.

Specific impact areas apply for each type of equipment such as swings, rocking equipment (e.g. spring rockers, see saws), cableways (e.g. flying foxes) and carousels. The impact area for equipment with forced movement (swings, carousels etc.) may not overlap with those for other equipment items.

When designing a playspace, ensure that impact areas for each piece of equipment is clearly identified on the plan.

When purchasing equipment the falling space and impact area must be determined by the manufacturer in accordance with AS 4685.

Spatial Networks

Refer to manufacturer's compliance requirements for impact areas.



Swings

Impact area for swings vary depending on the swing type and height of the swing.

Cableways

A minimum 2000mm impact area is required to each lateral side of the cable. In addition, a minimum 2000mm impact area is required beyond the end of the maximum swinging position of the grip or seat

Slides

Impact areas for slides vary depending on the slide type and height above ground level.

An impact area filled with certified surfacing is required to be provided beyond the end of all slides irrespective of height.

Type 1 Slide (short run-out section with long impact area) - the impact area is at least 2000mm beyond the end of the slide.

Type 2 Slide (long run-out section with short impact area) - the impact area is at least 1000mm beyond the end of the slide.



Giant Revolving Discs

A minimum impact area of 3000mm is required from the side of a revolving disk.

Rocking Equipment

A minimum impact area of 1000mm-1500mm is required surrounding rocking equipment depending on rocker type.

Carousels

A minimum impact area of 2000mm is required surrounding any carousel.



Movable Play Equipment

A minimum impact area of 1500mm is required surrounding moveable play equipment items measuring 600mm or more above ground level.

An impact area of 1000mm is recommended surrounding low equipment items that are designed for climbing, rocking or spinning.

CONTACT KIDSAFE SA

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Need more help? Kidsafe SA provides a playground inspection service. Contact us for a quote to organise an inspector to visit your playspace and provide specific advice.



Free Height of Fall (mm)	Impact Area (mm)	
	Supervised Early Childhood Settings	All Age Settings
600 – 1500	1500	1500
1600	1566	1566
1650	1600	1600
1700	1633	1633
1750	1666	1666
1800	1700	1700
1850		1733
1900		1766
1950		1800
2000		1833
2050		1866
2100		1900
2150		1933
2200		1966
2250		2000
2300		2033
2350		2066
2400	<p>Note: The impact areas on this ready reckoner are for static equipment and should be used as a guide only.</p> <p>Contact the office on (08) 7089 8554 for assistance in determining impact areas for the equipment in your playground including:</p> <ul style="list-style-type: none"> • Swings • Slides • Rocking equipment • Carousels • Moveable play equipment 	2100
2450		2133
2500		2166
2550		2200
2600		2233
2650		2266
2700		2300
2750		2333
2800		2366
2850		2400
2900		2433
2950		2466
3000		2500