

Kidsafe WA

Kidsafe WA is the leading independent not-for-profit organisation dedicated to promoting safety and preventing childhood injuries and accidents in Western Australia. Injuries are the leading cause of death among Australian children aged zero to fourteen, accounting for nearly half of all deaths in this age group. More children die of injury than of cancer, asthma and infectious diseases combined. However, many of these deaths and injuries can be prevented. Kidsafe WA works to educate and inform parents and children on staying safe at home, at play and on the road.

Perth Children's Hospital Injury Surveillance System

Perth Children's Hospital (PCH) is the only paediatric hospital in Western Australia and is the referral centre for paediatric illness and injury within the state. Each year approximately 64,000 children present to the PCH Emergency Department (ED). The PCH ED Injury Surveillance System is designed to capture data related to all children who present with an injury. This bulletin summarises injuries occurring during the Autumn months of March, April and May across the five-year period between July 2017 and June 2022.

Injuries Occurring in Autumn

A snapshot of injuries occurring in Autumn

- On average there are 4,848 injury presentations to PCH ED each **Autumn**. A total of 24,242 over the five year period.
- Of the autumn months, the highest number of injuries occur during **May** (35.9%, n=8,701).
- **Males** accounted for 56.6 percent (n=13,731) of presentations.
- Children aged between **1 and 5 years** accounted for the majority (35.3%, n=8,552) of autumn injuries.
- Almost all injuries (97.1%, n=23,532) were deemed **unintentional**.
- **Falls** were the most common cause of injury, accounting for 36.4 percent (n=8,824) of injuries. This was followed by **blunt force** injuries accounting for 25.0 percent (n=6,063) of injuries.
- Sports-related injuries account for 25.4 percent (n=6,154) of total injuries, with **Australian Rules Football** accounting for the highest proportion of sporting-related injuries throughout autumn (14.9%, n=919)
- **School** was the most commonly known location for injury to occur during autumn (42.6%, n=2,381).
- The majority of patients were **discharged** with treatment complete (86.2%, n=20,895).



Partner:



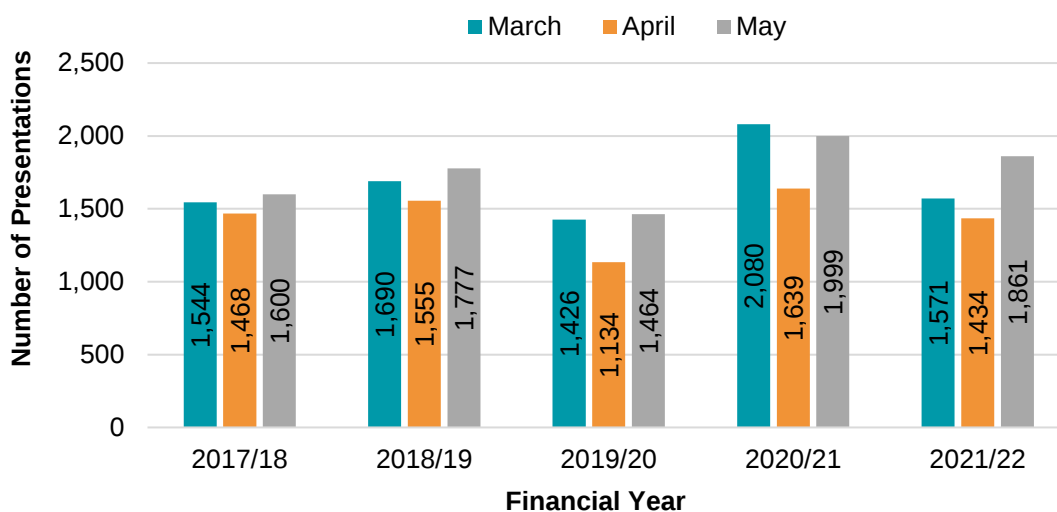
Government of **Western Australia**
Department of **Health**

Introduction

Autumn brings cooler temperatures, reducing daylight hours and often a change of routine that can expose children to new injury risks. Many sporting seasons kick-off in April, which can influence children's activity patterns. National data indicates that sports is a major part in a child's daily life, with 47 percent of Australian children under the age of fourteen participating in organised outside-of-school hours sport-related activity at least once a week¹.

Between July 2017 to June 2022, a total of 97,696 children presented to PCH ED with an injury. Approximately a quarter (24.8%, n=24,242) of these injury presentations occurred during the autumn months of March, April, and May. May accounted for the greatest portion of total injury presentations (8.9%, n=8,701), with March and April accounting for 8.5 percent (n=8,311) and 7.4 percent (n=7,230) respectively (Figure 1).

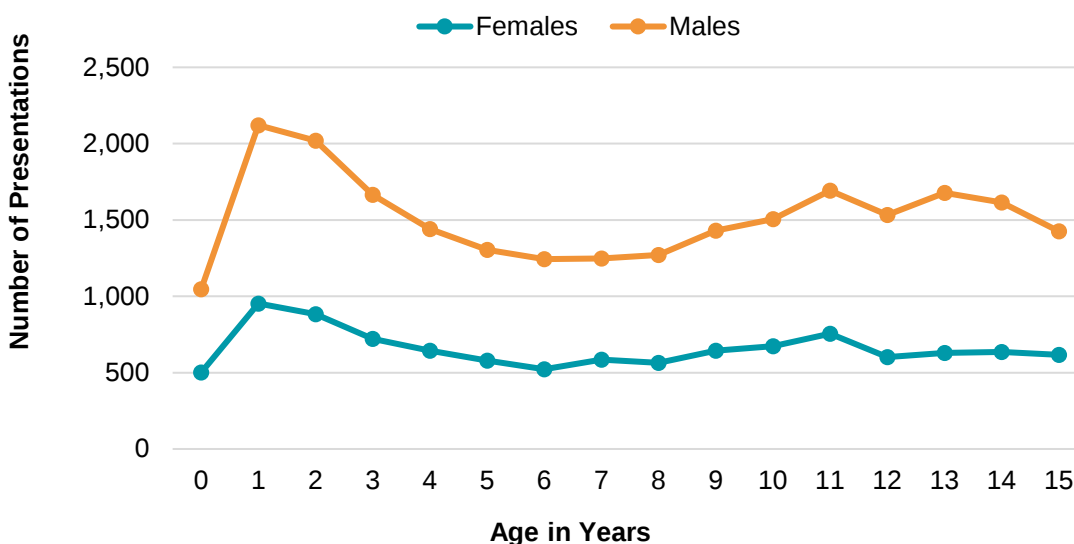
Figure 1: Injuries Occuring in Autumn by Financial Year



Demographics

Males accounted for a higher number of injuries during autumn (56.6%, n=13,731) in comparison to females (43.4%, n=10,509). Similarly to other seasons, injury prevalence was highest for children at one (8.7%, n=2,121) and two (8.4%, n=2,021) years of age with a decreasing trend until the age of eight years (5.2%, n=1,272). The numbers remained relatively constant with a slight increase in both sexes during early adolescence (Figure 2).

Figure 2: Injuries Occuring in Autumn by Age and Sex

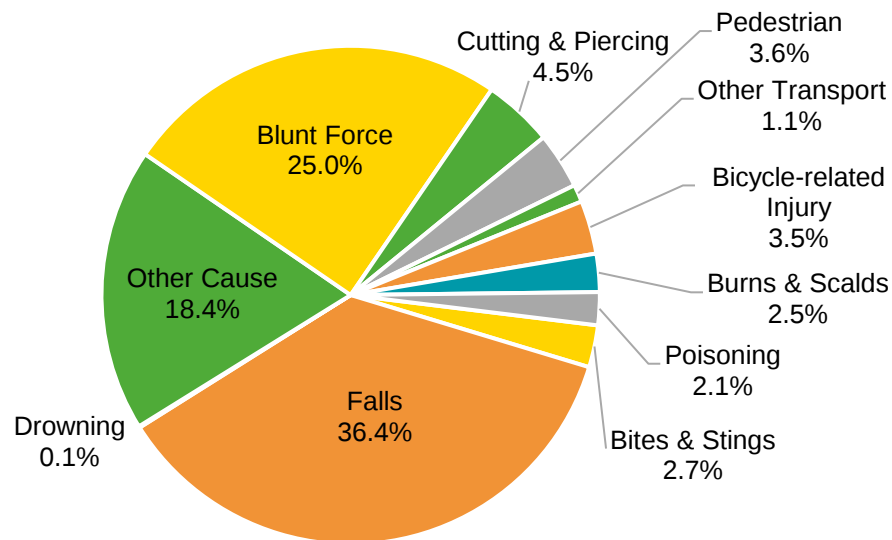


Injury

Every child that attends PCH ED is allocated a triage category between one and five, which corresponds with the level of medical urgency required. Category 4 – Semi-urgent was the most commonly allocated triage time for autumn injuries (77.8%, n=18,850). It was followed by category 3 - Urgent (17.2%, n=4,171) and category 2 - Emergency (4.1%, n=993). Category 1 – Resus (0.6%, n=147) and category 5 – Non-urgent (0.3%, n=81) accounted for the remaining cases. Almost all of injury presentations to PCH ED during autumn were deemed unintentional (97.1%, n=23,532).

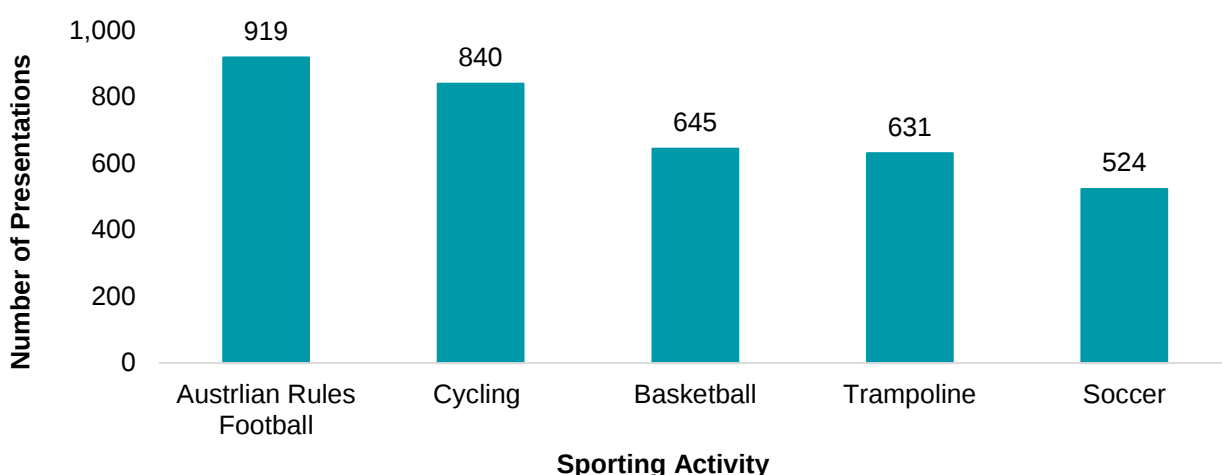
The most common cause of injury during autumn was falls (36.4%, n=8,824) (Figure 3), with over half of fall injuries (87.8%, n=7,745) occurring on the same level (i.e. slips or trips) or from a height of less than one metre. The remaining fall injuries (12.2%, n=1,079) occurred from a height of greater than one metre and although there were less of them, they tend to require treatment more urgently and the child is more likely to be admitted to hospital for treatment².

Figure 3: Injuries Occurring in Autumn by Cause



Sports-related injuries accounted for 25.4 percent (n=6,154) of total injury presentations during autumn months, which is slightly higher than the yearly average of 24 percent. Australian Rules Football accounts for the highest number of sporting-related injuries in children throughout autumn (14.9%, n=919), followed by cycling (13.6%, n=840), basketball (10.5%, n=645) and trampoline (10.2%, n=631) (Figure 4). Sporting activity refers to both formal competitive sports as well as recreational or informal physical activity which are often a large proportion of the cycling and trampoline presentations.

Figure 4: Injuries Occurring in Autumn by Sporting Activity (Top Five)



Most presentations to the PCH ED during autumn were based on a child's own concerns or a relative's (89.9%, n=21,783). This was followed by referrals from other hospitals (4.1%, n=998) and general practitioners (3.6%, n=872). The majority of patients were discharged with treatment complete (86.2%, n=20,895). A further 12.7 percent (n=3,074) of patients were admitted to hospital for additional treatment, and the remaining presentations either left at their own risk, did not wait for treatment, or were referred to another department or hospital.

Prevention

During the autumn months, children are likely to spend their time outdoors and participating in organised sports. Falls are particularly common in children of all ages either around the home or at play. The following steps can help reduce the risk of injury during autumn:

At Home:

- Never leave baby alone on a raised surface.
- Always use the harness available on products such as prams and highchairs.
- Avoid using baby walkers as they can cause falls that result in serious injuries.
- Reduce trip hazards by making sure floor coverings are in good condition and placing grips under rugs.
- Restrict access to stairs by using barriers. Teach children to navigate steps safely under supervision.
- Keep furniture away from windows and balcony rails.
- Ensure bunk beds have guard rails, a fixed ladder and meet the Australian Standards.

At Play:

- Ensure children use playground equipment suitable for their age and size. In addition, teach children the rules and skills to use the equipment properly.
- Ensure your child always wears a helmet when using a bike or other small wheeled devices.
- Actively supervise your child and stay close when your child is climbing, swinging, or playing on equipment that is above the ground.

During Sports and Recreational Activities:

- Ensure children wear appropriate protective equipment for the sport they are participating in. This may include mouthguards, eyewear, helmets, protective padding, footwear, and gloves.
- Children should always warm up before exercise and cool down after.
- Young children should participate in modified sports appropriate to their development.
- Children should participate in training sessions to learn and develop new skills before participating in competitive games.
- Children should not play sport if tired, ill or injured. Ensure that appropriate recovery time is allocated. If in doubt – DO NOT PLAY.
- Sporting grounds and facilities should be regularly checked and damaged surfaces, fencing, lights, posts, padding and rubbish should all be reported.
- Ensure the coach is aware of existing medical conditions that may affect the child during sport activities.
- A trained and equipped first aid officer should be present during training and competitions.
- Schools should outline suitable rules and guidelines for children playing sport during recess and lunch.

References:

1. AusPlay Data Portal. Australian Sports Commission. [cited 2024 Feb 16]. Participation in Sport. Available from: <https://www.clearinghouseforsport.gov.au/participation-in-sport>
2. Tsvetkov, A, Skarin, D. Severe Injuries to Children. Perth (WA): Kidsafe WA (AU); 2022 July. Report No.: 49.

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For further information please contact Kidsafe WA