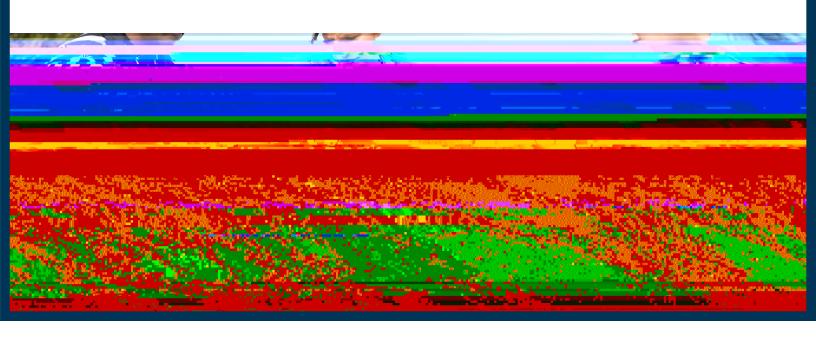
## CHILD STUDIES

room visits for sports-related TBIs for children under the age of 19 increased by about 62%. This increase is most likely due to heightened awareness of these injuries. There are a number of risk factors contributing to youth TBIs, but sports-related injuries remain one of the leading causes of emergency room visits for concussions.

TBIs occur when a bump or jolt to the head disrupts normal brain functioning. Concussions are a specific type of TBI, and can arise even if an athlete doesn't specifically hit his or her head directly. For example, if an athlete receives a hit that causes neck whiplash or that shakes their head violently, this movement to the head and brain can cause a concussion (Centers for Disease Control(b), 2012). Common



The **SCHUBERT CENTER FOR CHILD STUDIES** in the College of Arts and Sciences at Case Western Reserve University bridges research, practice, policy and education for the well-being of children and adolescents. Our focus is on children from infancy through adolescence in local, national, international and global settings.





argues that children under the age of
14 should be prevented from playing
tackle football, heading soccer balls or
body-checking in ice hockey (Toporek,
2012). Many people think that these
recommendations are extreme, but he
reasons that children under the age of
14 are skeletally immature, and thus
these injuries can have significant and
permanent effects on their cognitive
development. Pop Warner, an organization
that manages youth football teams
nationwide, incorporates limited full-body
contact in practices in order to prevent

## **RESOURCES:**

- O UfifG=fGZJ ~ FJ Û & (
  Prevention Program (VIPP):
  The goal of VIPP is to continue
  development of a comprehensive
  injury prevention program
  through the establishment
  and sustainment of a solid
  infrastructure for injury
  prevention that includes
  statewide injury surveillance
  to inform and evaluate public
  policy, as well as comprehensive
  injury prevention and control
  programs. http://www.
  healthyohioprogram.org/
  vipp/injury.aspx
- Õ; "G\$\%\_ `\_flfJ` å\$G\\$\tilde{Z} \FI \UH Rainbow Babies and Children's Hospital: Pediatric sports injuries may need specialized care, because children's joints and
- bones may not be fully developed yet. The team at the Pediatric Sports Medicine Program has the specialized training and experience to accurately diagnose and treat these types of injuries. The Sports Concussions team can help diagnose, treat and manage sports-related TBIs. They also offer pre-season baseline assessments to sports teams across Northeast Ohio. http://www.uhhospitals.org/rainbow/services/orthopaedic-surgery/sports-medicine-program/sports-concussion-program
- O fift Uks ! If U 6\$6 (CIAG):
  Through the umbrella of
  the Ohio Injury Prevention
  Partnership and in coordination

- with the Ohio Chapter of the American Academy of Pediatrics, the VIPP oversees the CIAG.
  The function of the CIAG is to identify priorities and strategies to reduce child injury in Ohio.
  http://www.healthyohioprogram.org/vipp/ciag/ciag.aspx
- Ô Heads Up: Concussion in Youth
  Sports: The CDC has created a
  national public health campaign
  that aims to help parents and
  coaches to prevent, recognize
  and respond to youth concussions.
  Their website provides fact sheets
  and posters regarding pediatric
  concussion symptoms as well as
  a free online training program
  for coaches and referees. http://
  www.cdc.gov/concussion/

HB 143 will apply to all student athletes in public, charter and private schools, as well as participants in youth sports organizations including community, recreational and travel leagues. Other aspects of the law include requiring coaches and referees to complete a concussion education course every three years. Experts argue that this training is important because the signs and symptoms of concussions can be guite varied. Physicians are very supportive of the law because they believe it will help coaches make the right decision and ensure children seek appropriate treatment for head injuries (H.B. 143, 2012; Guillen, 2012).

While most states have passed or introduced similar legislation, not all of these laws are the same. For example, many states exempt little leagues and traveling teams from the legislation. Some legislation is more limited. For example,

Wyoming does not require students to be removed from game play nor does it require medical clearance before they return to play (Toporek, 2011). Ohio also faced some challenges in passing HB 143. For example, opponents took issue with the requirement that students must obtain medical clearance to return to play. Some medical professionals such as optometrists and physical therapists expressed concern about being excluded, and rural representatives argued that getting to a hospital or doctor could be impractical. As a result, the bill was revised to allow school districts and youth sports organizations the discretion to determine which medical professionals could make the return to play decision (Clark, 2012).

## LOOKING FORWARD

Better epidemiological data is needed to assess differences in pediatric concussion rates across age, sex and type of sport. As mentioned, there is a gap in research on the prevention of these injuries. More definitive research findings on the longterm affects and cognitive implications of sports-related TBIs could inform new rules and regulations to prevent future injuries. Further research is also needed to improve on-the-field diagnoses. Training coaches and referees how to accurately diagnose concussion symptoms could greatly improve the well-being of student athletes. Also, creating standard guidelines for returning to play should be considered. While medical professionals strongly recommend a measured return to play, current legislation efforts do not require this phased-in approach. Another factor to consider is cost, because families without health insurance may be burdened by the need to get medical clearance for their child to return to play. Finally, not all state laws apply to private sports organizations; a dialogue should be encouraged about how to protect youth athletes that participate in these groups.