New research presented today at the 2013 Annual Meeting of the American Academy of Orthopaedic Surgeons (AAOS) found that overall, sports and recreation musculoskeletal injuries have declined 12.4 percent in the U.S. over the past 10 years for children ages 5 to 14 years. However, injuries sustained during football and soccer continues to rise.

In 2000, the U.S. Centers for Disease Control (CDC) reported the top eight sports and recreational activities responsible for injuries in children ages 5 to 14, and estimated their annual cost at more than $33 billion.

In this study, researchers reviewed National Electronic Injury Surveillance System data on injuries resulting from the eight CDC-identified activities – bicycling, basketball, football, roller sports (in-line skates, roller skates, skateboards and scooters), playground equipment (monkey bars, swings and slides), baseball/softball, soccer and trampolines for 2000, 2005 and 2010.

Despite no real change in population in the 5 to 14 age group between 2000 and 2010 (approximately 41 million), the study found that:

- Musculoskeletal-specific injuries (broken bones, sprained joints, torn ligaments, etc.) declined 12.4 percent.
- Injuries declined in six of the eight sport/activity categories,
including bicycle (38.1 percent), roller sports (20.8 percent) and trampolines (17.5 percent).

- Football and soccer injuries increased by 22.8 and 10.8 percent, respectively.
- As a group, sports deemed "recreational" (bike, roller sports, trampoline and playground) decreased by 24.9 percent, and "ball" or organized sport activity injuries increased 5.9 percent.

"These (outcomes) may reflect the changing pattern of childhood activities in the U.S. as organized sports are encouraged, often at the cost of free play," said orthopaedic surgeon Shital Parikh, MD, from Cincinnati Children's Hospital Medical Center, who conducted the research. The specific decrease in bicycle, roller sport and trampoline injuries "may reflect the efficacy of preventive programs that focus on helmet use, adult supervision, protective gear and education."

According to the Bicycle Helmet Safety Institute, states and localities began adopting helmet laws for children under age 18 in 1987. In addition, helmet safety campaigns were launched by federal health agencies and national nonprofit health organizations. The AAOS published position statements recommending helmet use when riding a motorcycle or bicycle, skiing and/or participating in roller sports. The AAOS position statement on Trampolines and Trampoline Safety recommends that children not use trampolines for unsupervised recreational activity.

In 2010, AAOS joined seven other health advocacy organizations in supporting the American Orthopaedic Society for Sports Medicine's (AOSSM) STOP Sports Injuries Campaign. STOP stands for Sports Trauma and Overuse Prevention in youth sports. The goal of the program is to curb the number of youth injuries from overuse and trauma in all sports. The campaign offers sport-specific resources for athletes, parents, coaches and health care providers, including tip sheets,
videos, podcasts, posters, community presentations and coaches' curriculum. All are available at the interactive website: STOPSportsInjuries.org.

"The trend of childhood injuries needs to be better understood to promote safe play to counter the increase in childhood obesity, physical inactivity and emotional disturbances in children, all of which are on the rise in the U.S.," said Dr. Parikh.

Provided by American Academy of Orthopaedic Surgeons


This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.