Research Matters

Early Return to School Following Acute Concussion and Symptom Burden at 2 Weeks Post Injury

WHY IS IT IMPORTANT TO DETERMINE HOW THE TIMING OF RETURNING TO SCHOOL AFTER INJURY IS RELATED TO SYMPTOM BURDEN?

• Determining the impact of return to school (RTS) timing on symptom severity could aid in identifying the optimal timeframe for different age groups to resume school and could provide valuable insights on managing post injury recovery.

ABOUT THIS STUDY

Vaughan et al. conducted a prospective, multicenter observational cohort study to examine the impact of the timing of RTS after a concussion on symptom burden 14 days postinjury. The study involved participants aged 5 to 18 years with an acute concussion.

KEY FINDINGS

- The mean number of school days missed due to concussion was approximately 3 to 5 days, with younger children generally returning to school earlier than older children.
- Early RTS (defined in this study as missing fewer than 3 days, not including weekends, after concussion) was associated with a lower symptom burden 14 days postinjury in the 8 to 12-year and 13 to 18-year age groups.
- The link between early RTS and lower symptom burden was more pronounced in individuals who had a higher symptom load at the time of injury, except for those aged between 5 and 7 years.
- No significant association was found between early RTS and symptom burden in the 5 to 7-year age group.
- Extended periods of absence from school and other life activities following a concussion may hinder the recovery process.





STUDY IMPLICATIONS AND RECOMMENDATIONS

- The findings of this study suggest that an early RTS after a concussion may be beneficial for children and youth aged 8 to 18 years.
- The study highlights the importance of individualized clinical guidance, accounting for differences in injury, symptoms, and activity tolerance. These results uphold existing guidelines which suggest that early RTS can enhance both physical and mental well-being.
- The study also underscores the need for further research to examine the importance of school-based concussion supports and resources, as they likely affect associations between RTS timing and symptoms.
- Finally, the study calls for a randomized clinical trial to determine the optimal timing for RTS after a concussion. This would provide more definitive guidance for clinicians, educators, and parents in managing post-concussion recovery in children and youth.
- To summarize, the study's key recommendation is for an early RTS for most age groups, with appropriate accommodations and supports made available for students as required.

REFERENCE

Vaughan, C.G., Ledoux, A., Sady, M.D., . . . Zemek, R. (2023). Association between early return to school following acute concussion and symptom burden at 2 weeks postinjury. *JAMA Network Open,6*(1), e2251839. https://doi.org/10.1001/jamanetworkopen.2022.51839



