



Verdict of Coroner's Jury Office of the Chief Coroner

The Coroners Act – Province of Ontario

Surname: Stringer
Given names: Rowan
Aged: 17

Held at: Ottawa, Ontario
From the: 19th of May 2015
To the: 3rd of June 2015
By: Dr. Louise McNaughton-Filion, Coroner for Ontario
having been duly sworn/affirmed, have inquired into and determined the following:

Name of Deceased: Rowan Stringer
Date and Time of Death: May 12th, 2013
Place of Death: Intensive Care Unit, Children's Hospital of Eastern Ontario
Cause of Death: Malignant Cerebral Edema due to Second Impact Syndrome, due to Traumatic Brain Injury.
By what means: Accident

(original signed by Foreman and Jurors)

This verdict was received on the 3rd day of June, 2015
Coroner's Name: Dr. Louise McNaughton-Filion
(original signed by Coroner)

We, the jury, wish to make the following recommendations:

Inquest into the death of:

Rowan Stringer

Jury Recommendations

To the Ontario Ministry of Tourism, Culture and Sport, the Ontario Ministry of Education, the Ontario Ministry of Health and Long Term Care

1. That the Government of Ontario adopt an Act (“Rowan’s Law”) governing all youth sport, both school-based and non-school based, which establishes the International Concussion Consensus Guidelines (Zurich) on Management of Concussion in Sports as the standard of practice for concussion management. The Act should recognize the importance of four criteria in protecting children and youth:
 - providing education on sport-related concussions to athletes, coaches and parents;
 - removing a child or youth athlete from play if a concussion is suspected;
 - ensuring the child or youth does not return to play until he or she has received medical clearance; and
 - ensuring appropriate return to learn and return to play strategies are in place.

To the Canadian Institute for Health Information (CIHI) (which includes the Ontario Trauma Registry (OTR) and the National Ambulatory Care Reporting System (NACRS)), the Public Health Agency of Canada’s Canadian Hospitals Injury Reporting and Prevention Program (CHIRPP), the Ontario Ministry of Health and Long Term Care and the Ministry of Tourism, Culture and Sport:

2. The Canadian Institute for Health Information (CIHI) (which includes the Ontario Trauma Registry (OTR) and the National Ambulatory Care Reporting System (NACRS)), the Public Health Agency of Canada’s Canadian Hospitals Injury Reporting and Prevention Program (CHIRPP), the Ontario Ministry of Health and Long Term Care and the Ministry of Tourism, Culture and Sport should enhance the existing reporting system(s) to improve the accuracy of injury categorization and details so that the number of incidents and the effectiveness of injury prevention measures can be assessed in sports.

To the Ontario Ministry of Tourism, Culture and Sport

3. The Ontario Ministry of Tourism, Culture and Sport should adopt and promote for all youth field sports the International Concussion Consensus Guidelines (Zurich) on Management of Concussion in Sports as the standard of practice for concussion management. Opportunities to utilize public service announcements (PSAs) and media channels should be pursued.
4. The Ontario Ministry of Tourism, Culture and Sport should acquire and make available information and resources to support parent, coach, player, referee and trainer education using resources from Parachute Canada, Ontario Physical and Health Education Association (OPHEA), the Canadian Concussion Collaborative and the U.S. Centre for Disease Control.
5. The Ontario Ministry of Tourism, Culture and Sport should mandate that prior to the start of any higher risk (as defined by Ontario Physical and Health Education Association (OPHEA)) youth sports activity, parents and athletes sign a participation agreement confirming that they have participated in a pre-season concussion awareness and management session; they understand the signs and symptoms of concussion.
6. The Ontario Ministry of Tourism, Culture and Sport should foster a culture of fair play by recommending the use of codes of conduct for all players, coaches and parents. Sample codes are shown below:

Code of Conduct – Players

- I will play fair and follow the rules of the game
- I will respect my teammates, my coaches, the referees and my opponents
- I will keep myself and my teammates safe and healthy when we play
- I will let my coaches know when I am injured or hurt
- I will make sure my coaches are aware if any of my teammates are injured or hurt

Code of Conduct – Coaches

- I will coach my team about playing fair and following the rules of the game
- I will respect my athletes, their parents, the referees and my opponents
- I will educate my team about the importance of being safe and healthy when playing
- I will ensure that my players' health and safety is my top priority
- I will educate my players about the importance of disclosing any injuries sustained by themselves or their teammates

Code of Conduct – Parents

- I will instill a spirit of fair play and sportsmanship in my child
 - I will respect the coaches, the players, the referees, and the other parents of my child's team and the opposing teams
 - I will make sure the coaches know if my child has been injured
7. The Ontario Ministry of Tourism, Culture and Sport should develop and mandate the use of pre and post game/practice mechanisms to check with team members to identify any injuries or concerns about a player's well-being. In the event of suspected injuries, players/parents should be encouraged to seek medical attention.
 8. The Ontario Ministry of Tourism, Culture and Sport should promote and encourage communication between community and high school sports coaches to support safe play and the well-being of student athletes. This should include consistent messaging and practice regarding Return To Play. This could be done by communicating through the parents, a passport, electronic messaging or other method that respects the privacy of the individual, but ensures the key information is shared and actioned.
 9. The Ontario Ministry of Tourism, Culture and Sport should require the use of a standardized Coach's Binder, containing sample forms and material such as: medical and emergency contact information forms, tracking tools for specific player injuries, a concussion recognition tool, contact information form for coaches of other concurrent sports, forms to help track attendance at practices and mandatory injury prevention sessions, permission forms and other documentation of best practices in the particular sport.

To the Ontario Ministry of Education

10. The Ministry of Education should provide funding to school districts to support the full implementation of Policy/Program Memorandum No. 158 (PPM 158). This should include funding to cover the costs associated with proposed changes to the Ontario Physical and Health Education Association (OPHEA) safety guidelines effective September 2016 regarding certifications and requirements for coaching and first aid.
11. The Ministry of Education should develop an evaluation program to ensure compliance with Policy/Program Memorandum No. 158 (PPM 158) on concussions to monitor and measure effectiveness in all school-based sports activities. The results of these evaluations should be publicly reported, and incentives should be considered to encourage high quality implementation.

12. The Ministry of Education should develop a Policy/Program Memorandum, similar to the current Policy/Program Memorandum No. 158 (PPM 158), on concussions for private schools which includes the same concussion education activities and management guidelines as PPM 158.
13. The Ministry of Education should facilitate the implementation of Policy/Program Memorandum No. 158 (PPM 158) to support the unique needs of families whose first language is other than English or French by making resources available to school districts, such as a concussion identification tool, in multiple languages.
14. The Ministry of Education should revise the Ontario Curriculum to ensure that education regarding concussion awareness and management is a mandatory part of the elementary and secondary school curriculum, integrated into science, health and physical education and other areas of study as appropriate for the age of the student. Curriculum models may be developed by reviewing existing models and best practices of school boards across the province.

To the Ontario Ministry of Education and the Ontario Physical and Health Education Association (OPHEA)

15. The Ministry of Education and Ontario Physical and Health Education Association (OPHEA) should develop a training module for school district employees on concussion awareness, prevention, Return To Learn and Return To Play strategies.

To the Ontario Ministry of Education and the Ontario Physical and Health Education Association (OPHEA), and the Ontario School Boards' Insurance Exchange (OSBIE)

16. The Ministry of Education, the Ontario Physical and Health Education Association (OPHEA) and the Ontario School Boards' Insurance Exchange (OSBIE) should develop a method of tracking student concussion injuries: to follow and ensure those students with concussions are treated appropriately, to ensure the Return to Learn and Return to Play process is respected and to provide clear data to assess the effectiveness of concussion prevention and management. The anonymized data should be available for public reporting and assessment of the effectiveness of concussion prevention efforts.

To Ontario Boards of Education

17. When implementing Policy/Program Memorandum No. 158 (PPM 158) all school boards in Ontario should adopt the International Concussion Consensus Guidelines (Zurich) on Management of Concussion in Sports as the standard of practice for concussion management.
18. When implementing Policy/Program Memorandum No. 158 (PPM 158) all school boards in Ontario should ensure all students, parents/guardians, teachers, school administrators, coaches, trainers and referees are educated about the symptoms and signs of concussion.
19. When implementing Policy/Program Memorandum No. 158 (PPM 158) all school boards in Ontario should acquire and make available information and resources to support education by using resources from Parachute Canada, Ontario Physical and Health Education Association (OPHEA), the Canadian Concussion Collaborative and the US Centre for Disease Control.
20. When implementing Policy/Program Memorandum No. 158 (PPM 158) all school boards in Ontario should ensure that prior to the start of any higher risk school team sports activity, **parents and athletes** sign an agreement confirming they have participated in a pre-season concussion awareness and management session. In addition, the Participation Agreement should: identify the sport, confirm that the sport is considered higher risk under the Ontario Physical and

Health Education Association (OPHEA) Safety Guidelines, provide information about the OPHEA Safety Guidelines, provide details regarding the play and practice schedule and a reminder of their responsibility to report any injuries including concussion or suspected concussion.

21. When implementing Policy/Program Memorandum No. 158 (PPM 158) all school boards in Ontario should foster a culture of fair play by mandating the use of codes of conduct for all players, coaches and parents. Sample codes are shown below:

Code of Conduct – Players

- I will play fair and follow the rules of the game
- I will respect my teammates, my coaches, the referees and my opponents
- I will keep myself and my teammates safe and healthy when we play
- I will let my coaches know when I am injured or hurt
- I will make sure my coaches are aware if any of my teammates are injured or hurt

Code of Conduct – Coaches

- I will coach my team about playing fair and following the rules of the game
- I will respect my athletes, their parents, the referees and my opponents
- I will educate my team about the importance of being safe and healthy when playing
- I will ensure that my players' health and safety is my top priority
- I will educate my players about the importance of disclosing any injuries sustained by themselves or their teammates

Code of Conduct – Parents

- I will instill a spirit of fair play and sportsmanship in my child
- I will respect the coaches, the players, the referees, and the other parents of my child's team and the opposing teams
- I will make sure the coaches know if my child has been injured

22. When implementing Policy/Program Memorandum No. 158 (PPM 158) all school boards in Ontario should develop and mandate the use of pre and post game/practice mechanisms to check with team members to identify any injuries or concerns about a player's well-being. In the event of suspected injuries, players/parents should be encouraged to seek medical attention and appropriate injury reporting undertaken.
23. When implementing Policy/Program Memorandum No. 158 (PPM 158) all school boards in Ontario should promote and encourage communication between community and high school sports coaches to support safe play and the well-being of student athletes. This should include consistent messaging and practice regarding Return To Play. This could be done by communicating through the parents, a passport, electronic messaging or other method that respects the privacy of the individual, but ensures the key information is shared and actioned.
24. When implementing Policy/Program Memorandum No. 158 (PPM 158) all school boards in Ontario should require the use of a standardized Coach's Binder, containing sample forms and material such as: medical and emergency contact information forms, tracking tools for specific player injuries, a concussion recognition tool, a contact information form for coaches of other concurrent sports, forms to help track attendance at practices and mandatory injury prevention sessions, permission forms and other documentation of best practices in the particular sport.
25. When implementing Policy/Program Memorandum No. 158 (PPM 158) all school boards in Ontario should adopt an annual awareness and learning opportunity for students, such as "Brain Day" (by Parachute Canada), or a module designed by

- Ontario Physical and Health Education Association (OPHEA), to ensure all students are annually provided consistent and accurate information.
26. When implementing Policy/Program Memorandum No. 158 (PPM 158) all school boards in Ontario should implement a mandatory learning module on concussion as part of the Grade 9 Health and Physical Education curriculum.
 27. When implementing Policy/Program Memorandum No. 158 (PPM 158) all school boards in Ontario should ensure that as Ontario Physical and Health Education Association (OPHEA) Safety Guidelines are renewed, all teachers involved with Sports programs and Physical Education are required to read and confirm their review of the guidelines with the Principal and/or Athletic Director of their school. The confirmation of this review should be mandatory and recorded.
 28. When implementing Policy/Program Memorandum No. 158 (PPM 158) all school boards in Ontario should ensure that all First Aid kits in schools contain an appropriate Concussion Recognition Tool.
 29. When implementing Policy/Program Memorandum No. 158 (PPM 158) all school boards in Ontario should ensure that information about concussion policy/procedure and management is part of the “New Teacher Induction Program” (NTIP).
 30. When implementing Policy/Program Memorandum No. 158 (PPM 158) all school boards in Ontario should consider adopting a full school year rugby season to allow for the development of the necessary skills with the view that this could help address the noted issues around scheduling all the required games and practices into a limited time.

To Rugby Canada, Rugby Ontario, the Eastern Ontario Rugby Union, the Ontario Boards of Education, the Ontario School Boards’ Insurance Exchange (OSBIE), and the Ontario Physical and Health Education Association (OPHEA):

31. Rugby Canada, Rugby Ontario, the Eastern Ontario Rugby Union, the Ontario Boards of Education, the Ontario School Boards’ Insurance Exchange (OSBIE), and the Ontario Physical and Health Education Association (OPHEA) should set a standard for rugby field quality to ensure that the surface is safe for youth athlete play.
 - This recommendation should be applied as appropriate to other higher risk sports (e.g. Football)
32. To enhance the safe play of rugby in club sports and in schools, Rugby Canada, Rugby Ontario, the Eastern Ontario Rugby Union, the Ontario Boards of Education, the Ontario School Boards’ Insurance Exchange (OSBIE), and the Ontario Physical and Health Education Association (OPHEA) should implement mandatory pre-season safety sessions for sport teams for athletes and their parents. These sessions for higher risk sports should cover the symptoms and signs of concussion, reporting of the suspicion of concussion, exclusion of those suspected of concussion, and proper concussion management, including Return To Learn and Return To Play. A personal story/video, such as that of Rowan Stringer, should be an integral part of the safety training. Attendance is to be taken and recorded. Athletes should not be permitted to participate in play until this education has occurred.
 - This recommendation should be applied as appropriate to other higher risk sports (e.g. Football)
33. To enhance the safe play of rugby in club sports and in schools, Rugby Canada, Rugby Ontario, the Eastern Ontario Rugby Union, the Ontario Boards of Education, the Ontario School Boards’ Insurance Exchange (OSBIE), and the Ontario Physical and Health Education Association (OPHEA) should adopt a policy of zero tolerance of head hits and high tackles at any level of play in rugby, and should be penalized with progressive penalties, including expulsion for repeat offenders.

- This recommendation should be applied as appropriate to other higher risk sports (e.g. Football)
34. To enhance the safe play of rugby in club sports and in schools, Rugby Canada, Rugby Ontario, the Eastern Ontario Rugby Union, the Ontario Boards of Education, the Ontario School Boards' Insurance Exchange (OSBIE), and the Ontario Physical and Health Education Association (OPHEA) should give consideration to the use of snug fitting collarless rugby jerseys, to decrease the incidence of dangerous tackles (e.g. "swing" tackles) during play or practice.
 35. To enhance the safe play of rugby in club sports and in schools, Rugby Canada, Rugby Ontario, the Eastern Ontario Rugby Union, the Ontario Boards of Education, the Ontario School Boards' Insurance Exchange (OSBIE), and the Ontario Physical and Health Education Association (OPHEA) should give consideration to the presence of an assistant referee during all youth rugby games.
 36. To enhance the safe play of rugby in club sports and in schools, Rugby Canada, Rugby Ontario, the Eastern Ontario Rugby Union, the Ontario Boards of Education, the Ontario School Boards' Insurance Exchange (OSBIE), and the Ontario Physical and Health Education Association (OPHEA) should ensure that a minimum number of coaches (two at the least) be present for each youth rugby team playing on the field.
 37. To enhance the safe play of rugby in club sports and in schools, Rugby Canada, Rugby Ontario, the Eastern Ontario Rugby Union, the Ontario Boards of Education, the Ontario School Boards' Insurance Exchange (OSBIE), and the Ontario Physical and Health Education Association (OPHEA) should determine an optimum safe time interval between rugby games or practices involving contact to decrease the risk of concussion or other preventable injury, particularly for those youth athletes who compete in more than one league.
 38. To enhance the safe play of rugby in club sports and in schools, Rugby Canada, Rugby Ontario, the Eastern Ontario Rugby Union, the Ontario Boards of Education, the Ontario School Boards' Insurance Exchange (OSBIE), and the Ontario Physical and Health Education Association (OPHEA) should give further consideration to requiring the presence of an athletic trainer/therapist in school higher risk sports, both during practice and during games.

To the Ontario Boards of Education, the Ontario School Boards' Insurance Exchange (OSBIE), and the Ontario Physical and Health Education Association (OPHEA):

39. To enhance the safe play of rugby in schools, the Ontario Boards of Education, the Ontario School Boards' Insurance Exchange (OSBIE), and the Ontario Physical and Health Education Association (OPHEA) should ensure that the head coach of a high school rugby team attain a minimum of level 1 coach qualification, as per World Rugby standards. All rugby coaches should meet, at a minimum, the OPHEA requirements for rugby coaching in the Ontario Physical Education Safety Guidelines.

To the Ontario Ministry of Education and the Public Health Agency of Canada

40. The Ontario Ministry of Education and the Public Health Agency of Canada should gather, monitor and publish the response to the concussion questions placed in the Health Behaviour in School Aged Children Survey, administered by Queen's University and the Public Health Agency of Canada, with a view to assessing the impact of concussion prevention initiatives over the long term.

To the Ontario Ministry of Health and Long Term Care, the Ontario Medical Association, Ontario Physical and Health Education Association (OPHEA), Ontario Boards of Education:

41. The Ontario Ministry of Health and Long Term Care, the Ontario Medical Association, Ontario Physical and Health Education Association (OPHEA), Ontario Boards of Education should ensure that there will be no fee charged for documentation by a physician to assess a student for a suspected concussion when providing guidance for Return to Learn and Return to Play.

To the Ontario Ministry of Education, the Ontario College of Teachers, and the Ontario Ministry of Training, Colleges and Universities:

42. The Ontario Ministry of Education, the Ontario College of Teachers, and the Ontario Ministry of Training, Colleges and Universities should ensure that all students enrolled in Bachelor of Education programmes have First Aid certification, including concussion awareness, prevention and management.
43. The Ontario Ministry of Education, the Ontario College of Teachers, and the Ontario Ministry of Training, Colleges and Universities should ensure that all students enrolled in Bachelor of Education programmes receive a mandatory athletic coaching course, to ensure standardized training of all new teachers whether or not they plan to coach athletics, and to encourage teacher participation as athletic coaches.

To the Royal College of Physicians and Surgeons of Canada, College of Family Physicians of Canada, the Canadian Medical Association and the Provincial Ministries of Colleges and Universities:

44. The Royal College of Physicians and Surgeons of Canada, College of Family Physicians of Canada, the Canadian Medical Association and the Provincial Ministries of Colleges and Universities include specific components on sports related injuries including the diagnosis and management of concussions to the course content at all medical schools to ensure a more uniform standard of treatment.
45. The Royal College of Physicians and Surgeons of Canada, College of Family Physicians of Canada, the Canadian Medical Association and the Provincial Ministries of Colleges and Universities require that accredited programs for family physicians are updated to emphasize concussion awareness, diagnosis and management as noted in the International Concussion Consensus Guidelines (Zurich).

To the Canadian Red Cross Society, St. John Ambulance, and the Lifesaving Society:

46. The Canadian Red Cross Society, St. John Ambulance, and the Lifesaving Society should ensure concussion awareness and management is included in all First Aid training. This should include the signs and symptoms of concussion, potential catastrophic results of improper concussion management and the use of the International Concussion Consensus Guidelines (Zurich).

To Parachute Canada and the Ontario Physical and Health Education Association (OPHEA)

47. The Parachute Canada and the Ontario Physical and Health Education Association (OPHEA) should collaborate to develop multimedia learning resources on concussion awareness, based on the story of Rowan Stringer, ideally involving individuals closely associated with Rowan. These resources should be widely available in a variety of media in order to motivate high school athletes and their teammates to report suspected concussions.
48. The Parachute Canada and the Ontario Physical and Health Education Association (OPHEA) should collaborate to develop an online concussion

information module that could be used as a pre-season awareness session, to make it easier to share the information at the beginning of a higher risk sports season.

To the Federal, Provincial and Territorial Ministers Responsible for Sport:

49. The Federal, Provincial and Territorial Ministers Responsible for Sport should play a leadership role in raising awareness regarding the education of players, parents and officials and for the management of concussions in sports that occur in non-school environments. Guidelines similar to those in Policy/Program Memorandum No. 158 (PPM 158) of the Ontario Ministry of Education covering sports in schools could be used as a model.