## comment

## The BC Project: What's that?

e all know that BC is the abbreviation for our wonderful province, but it can also stand for "brain care"—and that's the context here. Here's why we should embrace a Brain Care Project that is customized for our province.

Traumatic brain injury is common. The population (2010) of the US is 310 million. Canada's population is 34 million, and BC's is 4.5 million. If we extrapolate from US data,1 about 25 000 people sustain a traumatic brain injury (TBI) in BC each year. Of those individuals about 750 die, 4000 are hospitalized, and about 20 000 are treated and released from an emergency department. The number of people with TBI who are not seen in a hospital or emergency department or who receive no care is currently unknown. However, we do know that sportsrelated concussions are justifiably receiving increased attention.

- Each year, US emergency departments treat an estimated 135 000 sports- and recreation-related TBIs, including concussions, among children ages 5 to 18.2 This would equate to about 2000 cases per year in BC.
- Athletes who have had a concussion are at increased risk for another.
- Children and teens are more likely to get a concussion and will take longer to recover than adults.

After the November 2010 BC Iniury Prevention Conference, ThinkFirst BC coordinated a roundtable discussion on concussion attended by close to 40 people. Clearly, there is a broad-based willingness to improve quality of care, and the BCMA can partner in this.

Knowing who is affected by TBIs and how these injuries occur can help shape prevention strategies, set priorities for research, and support the need for services to individuals living with TBI.

Clinical evaluation in our busy emergency departments is inconsistent. We can do better. How to do so has been the focus of several ad hoc committee meetings at the BCMA with representation from emergency medicine, sport medicine, neurology, psychiatry, ICBC, and cognitive research.

The first hurdles were the lack of agreement on best practices for cognitive screening and uncertainty about how to fund such a project. One idea was to propose that it be a shared care initiative or a practice guidelines template. However, both the Specialist Services Committee and Guidelines and Protocols Advisory Council felt the scope of this program fell outside their respective mandates.

So, how else to approach this important issue? Let's try a poster to display the location of all British Columbia hospital emergency departments, with a dot on the graphic sized to indicate total annual volume of patients seen.

Until better data are available, we can assume that the ratio of patients presenting to each ER after TBI is the same, but, of course, it is not. Refining the existing injury registry will provide better data in the future.

The color of the dots will indicate the regional status of this project. The color of the dot will change from red to yellow as contacts are activated, and then from yellow to green, as an ER waiting room poster about TBI and protocol for physicians and take-home information for patient and family are made available at each site. The latest version of the poster and links to clinical resource material will be posted on the BCMA website when they become available.

Please consider this an invitation for at least one physician affiliated with each emergency department around the province to be a communications point of contact as the Brain Care Project evolves.

The US Centers for Disease Control and Prevention has peer-reviewed material available in the public domain, including Heads Up: Brain Injury in Your Practice (www.cdc.gov /concussion/HeadsUp/physicians tool kit.html), which is a tool kit for primary care physicians. The CDC material includes a patient assessment tool (Acute Concussion Evaluation or ACE), a care plan to help guide a patient's recovery, and a palm card for the on-field management of sportrelated concussion. Let's customize the project for our province by adding other features to this initiative. For instance, we can draw from the experience and protocols used by our medical volunteers in the 2010 Winter

I would welcome your ideas about how to improve on this initiative and to hear from volunteers who would like to act as local ER contacts. This should take very little of your time but result in great benefits for patients throughout the province. Please contact me at president@bcma.bc.ca.

> —Ian Gillespie, MD **BCMA President**

## References

- 1. Center for Disease Control and Prevention. Injury Prevention & Control: Traumatic Brain Injury. www.cdc.gov/Traumatic BrainInjury/index.html.
- 2. Gilchrist J, Thomas KE, Wald M, et al. Nonfatal Traumatic Brain Injuries from Sports and Recreation Activities, United States, 2001-2005. MMWR, July 27, 2007 / 56(29);733-737. www.cdc.gov /mmwr/preview/mmwrhtml/mm5629a2 .htm.