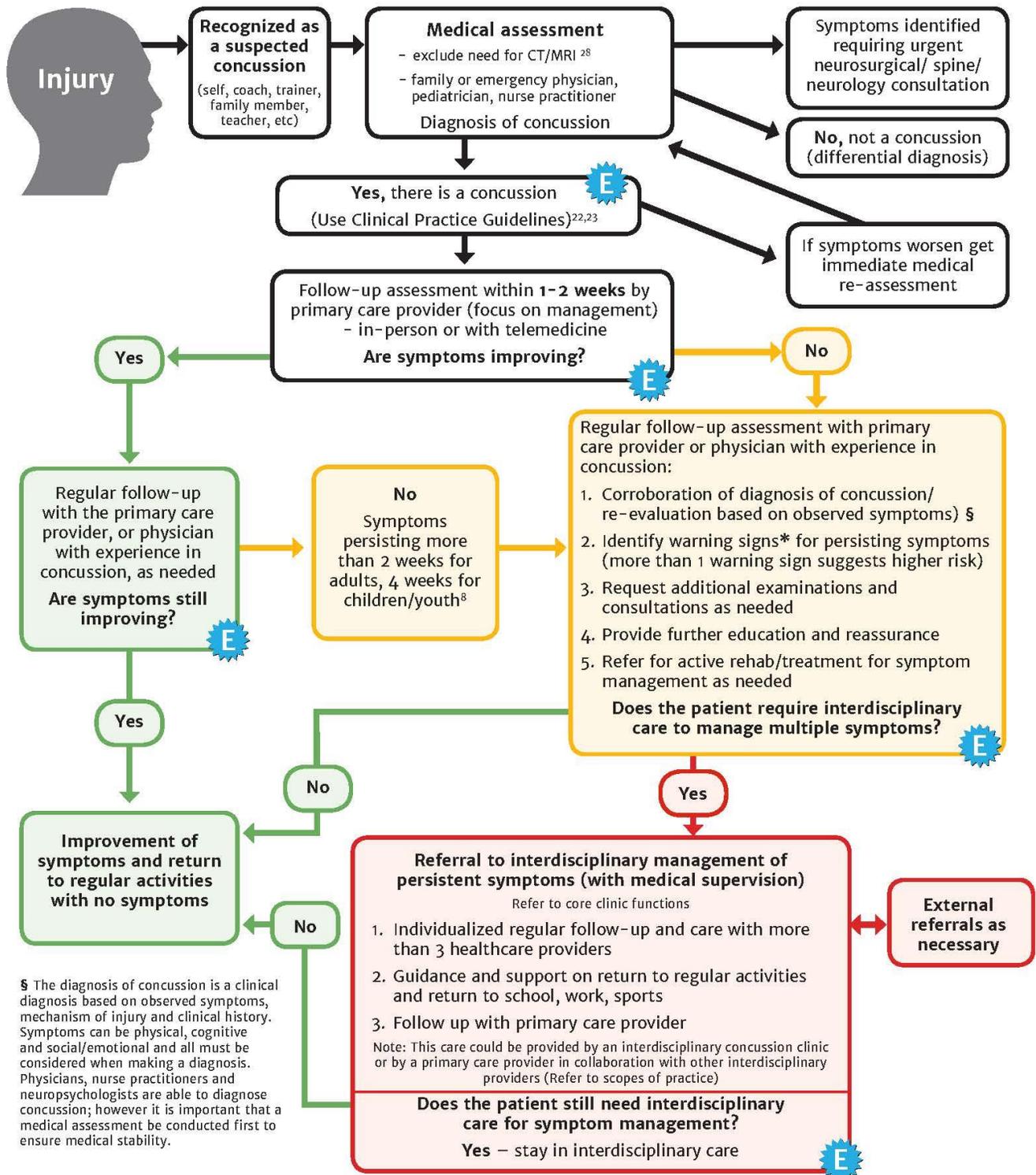


# Post-Concussion Care Pathway †



§ The diagnosis of concussion is a clinical diagnosis based on observed symptoms, mechanism of injury and clinical history. Symptoms can be physical, cognitive and social/emotional and all must be considered when making a diagnosis. Physicians, nurse practitioners and neuropsychologists are able to diagnose concussion; however it is important that a medical assessment be conducted first to ensure medical stability.

**Legend:**

- E Provide education (written and verbal), and where appropriate, reassurance
- Patient has risk factors identified, or is experiencing persistent symptoms that aren't resolving and require specialized care
- Warning sign that, while the patient was expected to recover, there is some persistence of symptoms that may need specialized care
- Patient is improving towards recovery
- Research suggests about 15%-20% of patients will take this pathway
- Research suggests about 30% of patients will take this pathway
- Research suggests about 55% of patients will take this pathway

† A patient can enter this pathway immediately, shortly following injury, or after a period of time when it is recognized that concussion-like symptoms are not resolving. It is necessary that all patients be properly assessed and diagnosed. Patients suspected of having had an earlier concussion should enter the pathway from the beginning so that they can be assessed and diagnosed by the appropriate professional.

**\* Warning Signs (risk factors) for poor prognosis**

- High score on the Post-Concussion Symptom Scale (PCSS) >40<sup>4,25</sup>, OR on the Rivermead Post-Concussion Questionnaire<sup>15</sup>
- Previous Concussion History<sup>5,12,19,27</sup>
- Persistent post-traumatic headache and migraine<sup>19,32</sup>
- Depression/Anxiety<sup>2,16,19,21,24,26,27</sup>
- Symptoms/signs of vestibulo-ocular abnormalities (problems maintaining visual stability during head movements)<sup>7,9,12</sup>
- Signs/symptoms of cognitive difficulties (problems with perception, memory, judgment, and reasoning)<sup>5,12,18,26</sup>
- Pre-injury history of sleep disturbance and/or post-injury changes in sleep patterns, difficulty sleeping<sup>2,29,31</sup>
- Increased symptoms with return to school, work, or exercise<sup>9</sup>
- Returning to a contact/risk of contact sport activity<sup>8,21</sup>

**Note:**

1. Research has found that being female seems to be a risk factor for prolonged recovery and this should be considered along with the other risk factors when determining if multidisciplinary care is required<sup>3,4,6,14,26,32</sup>
2. The impact that any single risk factor or combination of risk factors will have on a person's care must be assessed on an individual basis. Presence of one or more risk factors should be identified in care plans and referrals.
3. A recent pediatric study conducted in the emergency department indicates a risk profile with a combination of these factors that results in a risk factor score<sup>32</sup>. Research has not yet connected this risk score to long term prognosis.