aspects of self-care that might improve migraine, including healthy habits with lifestyle modification, potential migraine triggers/aggravating factors, and the risk of overusing medication. Maintaining a headache diary is helpful to track response to any new therapy. Patients and families will benefit from understanding the limitations of current available treatments. Overuse of medication to treat acute attacks has been associated with medication overuse headache in adults[33] but has not been well-studied in children. Methods to prevent medication overuse headache are included in adult treatment plans.

Statement 6a

Clinicians should counsel children and adolescents with migraine and their families about migraine-healthy habits, including lifestyle modification, identification/disproof/resolution of migraine triggers/aggravating factors, and avoidance of medication overuse (Level B).

Statement 6b

Clinicians should make collaborative agreements with children and adolescents with migraine and their families on treatment goals that are individualized to the patient (Level B).

Statement 6c

Clinicians may counsel children and adolescents with migraine and their families to maintain a headache diary to monitor their response to treatments (Level C).

Statement 6d

Clinicians should counsel patients and families to use no more than 14 days of ibuprofen or acetaminophen per month, no more than 9 days of triptans per month, and no more than 9 days per month of any combination of triptans, analgesics, or opioids for more than 3 months to avoid medication overuse headache (Level B). (There is no evidence to support the use of opioids in children with migraine. Opioids are included in this statement to be consistent with the International Classification of Headache Disorders[1] regarding medication overuse.)

Contraindications and precautions to triptan use

Recommendation 7 rationale

According to the FDA, triptans are contraindicated in patients with a history of cardiovascular disease, including stroke, TIA, myocardial infarction, severe peripheral vascular disease, ischemic bowel disease, and coronary vasospasm, including Prinzmetal angina. Triptans are also contraindicated in patients with cardiac accessory conduction pathway disorders, including Wolff-Parkinson-White syndrome. Although the 2004 American Headache Society consensus statement does not consider these as absolute contraindications,[34] these contraindications are based on the known pharmacology of the triptans[35] and triptan effects on vascular muscle.[36] While these medical contraindications are less prevalent in the pediatric population, they are important to consider.

Statement 7

Clinicians must not prescribe triptans to those with a history of ischemic vascular disease or accessory conduction pathway disorders to avoid the morbidity and mortality associated with aggravating these conditions (Level A).

Recommendation 8 rationale

In adults who have migraine with typical aura, there is evidence that it is safe to take triptans during the aura, although the triptan may be more effective if taken at the onset of pain.[37,38] The use of triptans during the aura phase is of concern because of potential difficulties differentiating early stroke symptoms from migraine aura. While this is unlikely a problem in those with established migraine with visual aura, caution is warranted in those with more complex aura presentations. According to the FDA, triptans are contraindicated in those with a history of hemiplegic aura or migraine with brainstem aura. This contraindication was based on a view of migraine pathophysiology that is no longer considered current.

Statement 8a

Clinicians should counsel adolescent patients with migraine with aura that taking their triptan during a typical aura is safe, but that the triptan may be more effective if taken at the onset of head pain (Level B).

Statement 8b

Clinicians may consider referral of children and adolescents with hemiplegic migraine or migraine with brainstem aura who do not respond to other treatments to a headache specialist to find effective treatment (Level C).

Suggestions for future research

Most adults with migraine have onset in childhood or adolescence. Accurate diagnosis and treatment in childhood and adolescence can prevent migraine-related disability and significantly improve quality of life.[19] Lifestyle modifications and acute pharmacologic treatments are the mainstay of management. Although the pathophysiology of migraine is presumed to be the same as in adults, a higher placebo response is observed in children and adolescents, with a lower therapeutic gain measured in clinical trials.[39] Patterns of migraine presentation and associated symptoms in children and adolescents evolve into the adult patterns and their shortest headaches may be shorter in duration.[1] These factors should be considered when designing clinical trials. The fact that all acute treatment trials in children and adolescents are performed after proven efficacy in adults may be a contributor to the expectation response adding to the placebo effect. This expectation response is widely seen in pain studies and may explain why so few trials of acute migraine therapy in children and adolescents have shown positive results.

Although there is a growing body of evidence to support recommendations for the acute treatment of pediatric