Abdominal Migraine Can Cause Recurrent Pain

BY MIRIAM E. TUCKER

NATIONAL HARBOR, MD. — Abdominal migraine may be responsible for up to 15% of all cases of idiopathic recurrent abdominal pain in children, according to an analysis of records from more than 400 children.

Abdominal migraine is an idiopathic disorder characterized by moderate to severe midline abdominal pain lasting 1-72 hours associated with vasomotor symptoms, nausea, and vomiting. It is recognized by the International Headache Society (IHS) as being among the "periodic syndromes of childhood that are commonly precursors of migraine" (Cephalagia 2004;24:suppl 1:9-160).

Most of the literature on the topic is from Europe, and the diagnosis is far more common there than it is in the United States, where it is largely underdiagnosed, Dr. Laura D. Carson and her associates said in a poster she presented at the annual meeting of the North American Society of Pediatric Gastroenterology, Hepatology, and Nutrition.

In a retrospective chart review of 600 children and young adults (ages 1-21 years, 59% female) who were referred to a pediatric gastroenterologist during 2006-2007 for recurrent abdominal pain, 23.5% (141) were excluded because of a preexisting diagnosis. Of 458 who met inclusion criteria, 4% (20) met the IHS diagnostic criteria for abdominal migraine (see box), while another 11% (50) were considered probable diagnoses of abdominal migraine with documentation lacking for at least one diagnostic criterion. The remaining 85% (388) did not meet the criteria, said Dr. Carson and her associates, of Eastern Virginia Medical School and Children's Hospital of the King's Daughters, both in Norfolk, Va.

No relationship has been identified among those with abdominal migraine and those who had family histories of either abdominal pain or headache. However, children who met the abdominal migraine criteria were four times more likely to have migraine headaches.

Despite its inclusion in both the IHS classification as well as the 2006 Rome III GI Criteria (Gastroenterology 2006; 130:1527-37), abdominal migraine is infrequently considered in the differential diagnosis of recurrent abdominal pain in children. Expertise in migraine lies with neurologists, who are rarely called upon to evaluate abdominal pain.

Abdominal migraine occurs only in children, whereas in adulthood it presents to neurologists as classic migraine headache. Children with recurrent abdominal pain often are referred to gastroenterologists, who rule out other organic causes but might not consider migraine as an etiology, Dr. Carson said.

"Given the spectrum of treatment modalities now available for pediatric migraine, increased awareness of cardinal features of abdominal migraine by pediatricians and pediatric gastroenterologists may result in improved diagnostic accuracy and early institution of both acute and preventative migraine-specific treatments," Dr. Carson and her associates said in their poster.

The study was funded by the Children's Specialty Group Chairman's Fund, based at Children's Hospital of the King's Daughters, Norfolk. Dr. Carson stated that she had no other disclosures. ■

Criteria in Brief

A. At least 5 attacks fulfilling criteria B-D.
B. Attacks of abdominal pain lasting 1-72 hours.
C. Abdominal pain has all of the following characteristics:
1. Midline, periumbilical, or poorly localized.
2. Dull, or "just sore" quality.
3. Moderate or severe intensity.

D. During abdominal pain, at least two of the following:
1. Anorexia.
2. Nausea.
3. Vomiting.
4. Pallor.

E. Not attributed to another disorder.

Note: ROME criteria are similar, but also specify intervening periods of usual health and include headache and photophobia among the possible symptoms during abdominal pain.
Source: 2004 International Classification of Headache Disorders

COX-2 Inhibitors Ease IBD, Joint Disease

BY SALLY KOCH KUBETIN

SANTA MONICA, CALIF. — How to treat a patient with concurrent inflammatory bowel disease and rheumatic disease depends on which condition is "hot" and which is quiescent.

Using standard anti-inflammatory agents to treat the rheumatic disease is problematic because it may exacerbate the IBD. Conventional NSAIDs are associated with reversible colitis and ulceration in patients without IBD, and NSAID enteropathy—often subclinical—is present in up to 60% of patients who take these agents, according to Dr. Bennett E. Roth, director of the digestive disease center and chief of clinical gastroenterology at the University of California, Los Angeles.

Data do support the use of available cyclooxygenase-2 (COX-2) inhibitors in patients with both active IBD and active joint disease, Dr. Roth said at a meeting sponsored by RHEUMATOLOGY NEWS and Skin Disease Education Foundation.

Why some patients develop both IBD and arthritis is not fully understood, Dr. Roth noted. Possible explanations include the potential relocation of the immune reaction from the intestine to the joints and the activation of immune cells in the gut.

IBD arthropathy can take two forms: spondyloarthropathy (SpA) and peripheral arthropathy. Each has its own course and relationship to IBD, Dr. Roth said.

The degree of SpA activity in IBD patients is independent of the IBD activity. Among patients with both conditions, 20%-25% have sacroiliitis on x-ray; 50% of cases of sacroiliitis in IBD are asymptomatic. Ankylosing spondylitis (AS)—be it HLA-B27 negative or positive—has a prevalence of 3%-10% in this population, according to Dr. Roth.

Young patients who present with axial arthropathy may be candidates for a gastrointestinal evaluation, said Dr. Roth, who is also director of the center for esophageal disorders at UCLA.

The treatment regimen for AS includes physiotherapy, 5-aminosalicylic acid (5-ASA) or immunomodulatory therapy with agents such as 6-mercaptopurine or azathioprine (6MP/AZA), or methotrexate. Fallback treatments are short courses of steroids. If these are insufficient, biologic anti-TNF antibodies may be effective.

One large study showed that infliximab was efficacious in 61% of a group of IBD patients with peripheral arthritis (Am. J. Gastroenterol. 2002;97:2688-90). Infliximab has been shown to be effective in 53% of patients with AS, regardless of the presence of concurrent IBD (Lancet 2002;359:1187-93). Findings from randomized controlled trials of patients who had both AS and IBD and were treated with infliximab show a significant drop in BASDAI (Bath Ankylosing Spondylitis Disease Activity Index) scores but not CDAI (Crohn's Disease Activity Index) scores (Ann. Rheum. Dis. 2004;63:1664-9).

Peripheral arthropathy is divided into types 1 and 2 for classification purposes. Type 1 peripheral arthropathy can involve the large joints, specifically ankles, knees, hips, elbows, and shoulders, in a pauciarticular pattern.

When it comes to the treatment of type 1, Dr. Roth said that as the IBD goes, "so goes the arthritis." In other words, because the joint inflammation corresponds to the activity of the disease in the gut, there is likely to be a concomitant joint response once the bowel disease is placed into remission. Standard approaches to treating the IBD are employed, including anti-inflammatory agents such as 5-ASA and steroids with the additional use of immunosuppressants 6MP/AZA, or anti-TNF agents as needed.

Type 2 peripheral arthropathy involves the small joints of the hands, is persistent and polyarticular, and follows a course that is independent of the IBD course. Treatment consists of physical therapy, simple analgesics, short courses of steroids with progression to immunosuppressive agents, and/or biologics.

Dr. Roth reported that he has no financial disclosures that are relevant to the topic of his presentation. Skin Disease Education Foundation and this news organization are owned by Elsevier. ■

Chronic PPI Use Not Shown to Lower BMD

BY MIRIAM E. TUCKER

NATIONAL HARBOR, MD. — Bone mineralization was not significantly altered among 17 children receiving chronic proton pump inhibitor therapy, including 12 who were also using inhaled steroids.

The 17 patients (12 boys) had a mean age of 7.8 years (range 0.8-16.7 years). All had severe gastroesophageal reflux secondary to esophageal atresia and had received proton pump inhibitor (PPI) therapy at a mean dosage of 2.0 mg/kg daily (1.0-3.2 mg/kg) for a mean of 2.6 years (0.6-11.3 years). Twelve of the children were also receiving chronic inhaled steroid therapy for pulmonary disease, Dr. Stephanie Willot said in at the annual meeting of the North American Society for Pediatric Gastroenterology, Hepatology, and Nutrition.

Lumbar spine areal bone mineral density (BMD) was assessed by using dual-energy x-ray absorptiometry and was compared with normative data. Volumetric BMD, a parameter that more accurately assesses BMD in patients with short stature, was also calculated in order to account for differences in bone size, said Dr. Willot of the division of pediatric gastroenterology at Sainte-Justine Hospital, University of Montreal, who conducted the study with colleagues from the division of pediatric endocrinology.

No patient had a history of traumatic fracture. Five patients (29%) had a statural growth delay of less than –2 standard deviations for age. Among the 14 children older than 2 years, 5 (35%) had a body mass index less than the 10th percentile.

No patient had a significantly low BMD, defined as a *z* score less than –2 standard deviations for age. Although six patients (35%) had a *z* score BMD of less than –1 standard deviation for age, they all had normal volumetric BMD (ranging from –0.8 to 0.6 standard deviation), as did the other seven children who were older than 4 years of age.

Given the small sample size of the study and its cross-sectional nature, "We cannot conclude about the association between PPI and fracture risk," said Dr. Willot, who reported having no disclosures. ■