diseases, increased intracranial pressure, toxic ingestions, food intolerances and allergies, mechanical obstruction of the GI trace, metabolic disorders, nephrologic disease, and psychogenic problems (Singhi, Shah, Bansal, et al, 2013). Vomiting is common in childhood, is usually self-limiting, and requires no specific treatment. However, complications may occur, including acute fluid volume loss (dehydration) and electrolyte disturbances, malnutrition, aspiration, and Mallory-Weiss syndrome (small tears in the distal esophageal mucosa).

Characteristics of the emesis and pattern of vomiting help determine the cause. The color and consistency of the emesis vary according to the cause. Green bilious vomiting suggests bowel obstruction. Curdled stomach contents, mucus, or fatty foods that are vomited several hours after ingestion suggest poor gastric emptying or high intestinal obstruction. Gastric irritation by certain medicines, foods, or toxic substances may cause vomiting. Forceful vomiting is associated with pyloric stenosis. Cyclic vomiting is a rare disorder characterized by bouts of vomiting that can last from hours to several days with an unknown etiology (Cuvellier and Lépine, 2010). Vomiting is a well-recognized response to psychological stress due to a rise in adrenaline levels that stimulate the chemoreceptor trigger zone.

Associated symptoms also help identify the cause. Fever and diarrhea accompanying vomiting suggest an infection. Constipation associated with vomiting suggests an anatomic or functional obstruction. Localized abdominal pain and vomiting often occur with appendicitis, pancreatitis, or peptic ulcer disease (PUD).

Therapeutic Management

Management is directed toward detection and treatment of the cause of the vomiting and prevention of complications, such as dehydration and malnutrition. If vomiting leads to dehydration, oral rehydration or parenteral fluids may be required. Antiemetic drugs may be indicated (see Translating Evidence into Practice box). Adverse effects with earlier-generation antiemetics (such as promethazine and metoclopramide) include somnolence, nervousness, irritability, and dystonic reactions and should not be routinely administered to children (Singhi, Shah, Bansal, et al, 2013). Ondansetron (Zofran) is an antiemetic with limited adverse