
Helicobacter pylori and vitamin b12 deficiency

Haematologica 2006; 91:(8)e110

We have read with interest Hvas and Nexø's very informative update article about the diagnosis and treatment of vitamin B12 deficiency.¹ Authors also stated that vitamin B12 deficiency is an important public health problem. It is well known that diagnostic approach to this deficiency is very important to reveal the underlying cause that is usually attributed to malabsorption. Carmel et al.'s found that patients with food-cobalamin malabsorption and low levels of serum cobalamin had a higher seroprevalence of *Helicobacter pylori* (*H pylori*) infection.^{2,3} The association between *H pylori* infection and food-cobalamin malabsorption suggests that gastritis induced by *H pylori* infection predisposes to a more severe form of food-cobalamin malabsorption. In Kaptan et al.'s study, upper gastrointestinal endoscopy documented *H pylori* infection in 77 (56%) of 138 patients with cobalamin deficiency.⁴ It has also been shown that *H pylori* is a causative agent in the development of adult cobalamin deficiency, and eradication of *H pylori* infection alone may correct cobalamin levels.⁴ It may be speculated that association of cobalamin deficiency and *H pylori* infection is coincidental, but restoration of anemia and the cobalamin deficient state in a significant group of patients via eradication therapy is strongly suggestive of this gram-negative rod's role in the pathogenesis. Hershko et al.'s study also suggests that pernicious anemia possibly starts many years before the establishment of clinical cobalamin deficiency, by an autoimmune process likely trig-

gered by *H pylori*.⁵ If the microorganism could be eradicated, patient does not need lifelong cyanocobalamin replacement therapy and it may be possible to impede development of pernicious anemia.

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