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# COLAZAL® DELIVERS HIGHER DISTAL COLONIC MUCOSAL CONCENTRATIONS* THAN ASACOL

A recent study was designed to determine distal colonic mucosal concentrations of 5-ASA and *N*-acetyl 5-ASA (Nac-5ASA) in UC patients treated with either **Colazal**® or pH-dependent Asacol. Thirteen patients treated with a mean of 6.75 g/d of Colazal (containing 2.4 g/d of 5-ASA) were compared with 17 patients treated with a mean of 3.74 g/d of Asacol, respectively. Patients in both groups had similar disease activity index scores. Four quadrant biopsies were taken from each patient at three different sites in the distal-most colon: 5, 15, and 25 cm from the anal verge for measurements of 5-ASA and Nac-5-ASA concentrations. The study concluded that at similar oral doses, UC patients treated with Colazal had a mean of 96% greater distal colonic mucosal concentrations of 5-ASA than patients treated with similar doses of Asacol (*3*). Mean mucosal 5-ASA concentrations were markedly higher with Colazal versus Asacol at the three different sites: 5 cm (102 percent greater) , 15 cm (84 percent greater) and 25 cm (102 percent greater). Similar differences were seen for mucosal Nac-5ASA concentrations at each site. According to Asher Kornbluth, MD, Associate Clinical Professor of Medicine, Mt. Sinai Medical Center (New York, NY), "The consistent pattern at each of these sites for both the 5-ASA compounds and its primary metabolite demonstrated the consistency of the findings." Dr. Kornbluth goes on to say, "Colazal is designed to deliver 5-ASA throughout the entire colon and these mucosal 5-ASA levels demonstrate approximately twice the amount of 5-ASA in patients taking Colazal compared with patients taking equivalent amounts of mesalamine in the form of Asacol, in the distal-most areas of the colon."

Although use of mesalamine-containing compounds should be the first line of therapy in patients with UC, different mesalamine therapies have variable release systems to deliver the 5-ASA to the colonic mucosa. Colazal, as a "pro-drug", does not release the active 5-ASA component of the drug until it reaches the colon, which is the site of desired action for this drug. Asacol, on the other hand, has a pH-dependent mechanism, so the drug begins its release wherever the intestinal pH ≥ 7.0. Because of pH variability from patient to patient, drug release may be unpredictable. 99% of each dose of Colazal reaches the colon intact, where it begins the release of its 5-ASA, whereas, per dose of Asacol, only 72% reaches the colon intact and, presumably, the other 28% has already been released in the distal small intestine.

Colazal® (balsalazide disodium) Capsules 750 mg, a product of **Salix Pharmaceuticals** (Morrisville, NC), was approved by the FDA in July 2000 for the treatment of mildly to moderately active ulcerative colitis (UC). Colazal was the first new oral chemical entity approved in ten years and the first new therapy approved in seven years by the FDA for this indication. Each Colazal capsule contains 750 mg of balsalazide disodium, a prodrug that is enzymatically cleaved in the colon to produce mesalamine (5-ASA) at the site of inflammation in the colon. Approximately 99% of an administered dose reaches the colon intact, where the 5-ASA works topically. 5-ASA appears to have multiple sites of impact on the immune system and the inflammatory process that characterizes ulcerative colitis. Colazal has been proven effective and well tolerated in clinical trials. Colazal has been shown to improve patients' signs and symptoms of acute ulcerative colitis significantly (*1*, *2*).

The recommended adult prescription dose for the treatment of active ulcerative colitis is three 750-mg Colazal capsules, taken 3 times a day for a total daily dose of 6.75 g for a duration of 8 weeks. Some patients in clinical trials required treatment for up to 12 weeks. Each daily dose of Colazal (6.75 grams) is equivalent to 2.4 grams of mesalamine.

** 5-ASA and N-acetyl 5-ASA*

For more information concerning Salix Pharmaceuticals, call 1-866-669-7597, or visit the company's Web site at www.salix.com.

**References:**

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