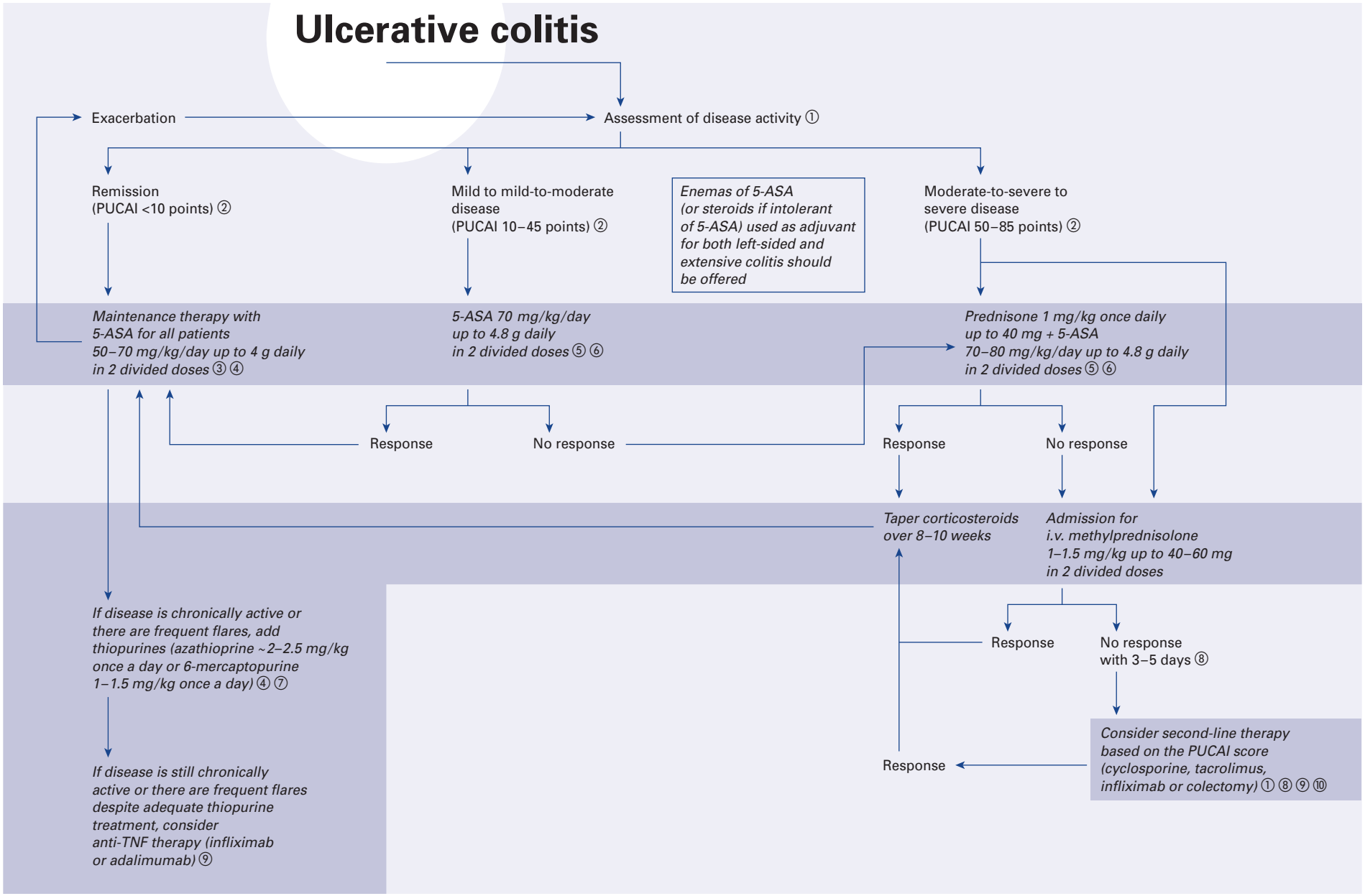
Ulcerative colitis



Medical therapies in IBD should be divided into those that induce remission (5-ASA, corticosteroids, anti-TNF therapy, and likely probiotics) and those that maintain remission (5-ASA, thiopurines, anti-TNF therapy, and likely probiotics).

① — In any state of active disease, the following must be ruled out: infectious colitis and *Clostridium difficile*, 5-ASA-related colitis, and wrong diagnosis (e.g. immune deficiency, chronic granulomatous disease, or Behcet's disease).

② — In children, endoscopic evaluation of the rectal mucosa is conceived to be too invasive for repeated monitoring of disease activity and response to therapy. Therefore, reliance on noninvasive indirect markers of disease activity should be used at most visits. The Pediatric UC activity index (PUCAI) was developed for the use in children and has proved to be highly correlated with the endoscopic appearance of the colonic mucosa. Cutoff values for remission and mild, moderate, and severe disease activity have been previously validated in two independent pediatric cohorts. Endoscopic evaluation of the colonic mucosa is indicated before major treatment changes, when the clinical presentation is in question and during acute severe exacerbation not responding to intravenous steroid therapy.

③ — Recent data in adults suggest that 3 g Pentasa once a day is superior to a dose administered twice a day.

④ — In high-risk patients (such as those presenting with severe colitis, especially at a young age), thiopurine may be considered for maintenance therapy at onset.

⑤ — In clinical practice, a dose of up to 100 mg/kg is often used effectively but without solid evidence.

⑥ — In cases resistant to the newer 5-ASA regimes (e.g. Asacol, Pentasa, Rafassal), it may be beneficial to switch to sulfasalazine that may be more effective but is also associated with a higher adverse event rate (e.g. hypersensitivity, headache, GI side effects, or azoospermia). A gradual dose increase over 7–14 days may decrease the adverse event rate.

⑦ — Measurement of TPMT (genotyping or enzymatic activity) at baseline and after 2–3 months also of 6-TG and 6-MMP levels may aid in optimizing thiopurine dosing.

⑧ — According to pediatric cohorts, PUCAI >45 points at day 3 warrants preparation for second-line therapy (cyclosporine, infliximab, or colectomy) and >65–70 points at day 5 warrants execution of the planned therapy. Those children not meeting these cutoff values may be slow responders and should be treated with corticosteroids for 2–5 more days until a decision is made.

⑨ — Level 1 evidence for using biologics in pediatric UC is currently available for infliximab in patients with moderate to severe disease but not in those hospitalized for acute severe colitis.

⑩ — Colectomy should also be considered in chronically active, resistant disease and in cases of complications (e.g. toxic megacolon, dysplasia, or uncontrolled bleeding).

Selected reading

McGinnis JK, Murray KF: Infliximab for ulcerative colitis in children and adolescents. J Clin Gastroenterol 2008;42:875–879.

Oussalah A, Laclotte C, Chevaux JB, Bensenane M, Babouri A, Serre AA, et al: Long-term outcome of adalimumab therapy for ulcerative colitis with intolerance or lost response to infliximab: a single-centre experience. Aliment Pharmacol Ther 2008;28:966–972.

Rutgeerts P, Sandborn WJ, Feagan BG, Reinisch W, Olson A, Johanns J, et al: Infliximab for induction and maintenance therapy for ulcerative colitis. N Engl J Med 2005;353:2462–2476.

Turner D, Hyams J, Markowitz J, Lerer T, Mack DR, Evans J, et al: Appraisal of the pediatric ulcerative colitis activity index (PUCAI). Inflamm Bowel Dis 2009;15:1218–1223.

Turner D, Levine A, Escher JC, Griffiths AM, Russell RK, Dignass A, et al: Management of pediatric ulcerative colitis: joint ECCO and ESPGHAN evidence-based consensus guidelines. J Pediatr Gastroenterol Nutr 2012;55:340–361.

Turner D, Otley AR, Mack D, de Bruijne J, Uusoue K, Walter T, et al: Development and evaluation of a Pediatric Ulcerative Colitis Activity Index (PUCAI): a prospective multicenter study. Gastroenterology 2007;133:423–432.

Turner D, Travis SP, Griffiths AM, Ruemmele FM, Levine A, Benchimol EI, et al: Consensus for managing acute severe ulcerative colitis in children: a systematic review and joint statement from ECCO, ESPGHAN, and the Porto IBD Working Group of ESPGHAN. Am J Gastroenterol 2011;106:574–588.

Turner D, Walsh CM, Benchimol EI, Mann EH, Thomas KE, Chow C, et al: Severe paediatric ulcerative colitis: incidence, outcomes and optimal timing for second-line therapy. Gut 2008;57:331–338.