End to End Colonic Content Assessment: ColonMetry
Application

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The analysis of colonic contents is a valuable tool for the gastroenterologist and has multiple applications in clinical routine. When considering magnetic resonance imaging (MRI) modalities, T2 weighted images are capable of segmenting the colonic lumen, whereas fecal and gas contents can only be distinguished in T1 weighted images. In this paper, we present an end-to-end quasi-automatic framework that comprises all the steps needed to accurately segment the colon in T2 and T1 images and to extract colonic content and morphology data to provide the quantification of colonic content and morphology data. As a consequence, physicians have gained new insights into the effects of diets and the mechanisms of abdominal distension.

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