stenosis in the future. Pre-endoscopic treatment for AIS has high safety and definite short-term efficacy, which can improve the prognosis and the quality of life of patients. The long-term effect needs to be further followed up.

**DEVELOPMENT AND VALIDATION OF A NEW ALGORITHM MODEL FOR DIFFERENTIAL DIAGNOSIS BETWEEN CROHN’S DISEASE AND INTESTINAL TUBERCULOSIS**

Yi Lu*, Jiayin Yao, Min Zhi. The Sixth Affiliated Hospital, Sun Yat-sen University, China

10.1136/gutjnl-2021-IDDF.107

**Background** Sometimes it was a great challenge to distinguish Crohn’s disease (CD) and intestinal tuberculosis (ITB); we conducted this study was to identify a simple and useful algorithm for distinguishing them.

**Methods** We retrospectively reviewed the medical history of the patients who were diagnosed as ITB or CD. We firstly identified ITB patients, and then the patients diagnosed with CD were matched by age, sex, and admission time in a 1:1 ratio. Patients who were admitted between May 1, 2013 and April 30, 2019 were regarded as training cohort, and patients admitted between May 1, 2019 and May 1, 2020 were regarded as validation cohort. We used multivariate analysis to identify the potential variables, and then we used R package part to build the classification and regression tree (CART), and validated the newly developed model.

**Results** In total, the training cohort included 84 ITB and 84 CD patients, and the validation cohort included 22 ITB and 22 CD patients. Multivariate analysis showed that positive T-SPOT, ≥4 segments involved, longitudinal ulcer, circular ulcer, and aphthous ulcer, were confirmed as independent discriminating factors. Using these parameters to build the CART model made an overall accuracy rate was 88.64%, with sensitivity, specificity, NPV, and PPV being 90.91%, 86.36%, 90.48%, and 86.96%, respectively.

**Conclusions** We developed a simple and novel algorithm model covering laboratory, imaging, and endoscopy parameters with CART to differentiate ITB and CD with good accuracy.