CI=1.5%-3.8%) and TSAs (0.3%, 95% CI=0.1%-0.8%) were shown in figure 1 (figure 1). Subgroup analysis indicated their higher prevalence among male (22.0%, 95% CI=16.4%-28.2%) than female (14.0%, 95% CI=8.2%-21.0%), and Caucasian (25.9%, 95% CI=16.4%-28.2%) than Asian (14.6%, 95% CI=11.6%-18.2%). The prevalence of SSPs was also higher among Caucasian (2.9%, 95% CI=1.5%-4.7%) than Asian (0.7%, 95% CI=0.4%-1.2%). However, their prevalence were similar between male (2.9%, 95% CI=1.0%-5.7%) and female (2.4%, 95% CI=0.8%-4.9%).

Conclusions This was the first systematic review and meta-analysis to determine the overall prevalence of serrated lesions and their different subtypes. The pooled prevalence estimates can be used as indicators for establishing high-quality CRC screening programmes. Future studies should be performed to evaluate the factors independently associated with the presence of serrated lesions, which could inform clinical practice to enhance their detection rate.

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COMPARISON OF POST ENDOSCOPIC MUCOSAL RESECTION BLEEDING BETWEEN EPINEPHRINE AND HYPERTONIC SALINE SUBMUCOSAL INJECTION FOR COLON POLYPS IN PATIENTS TAKING ANTITHROMBOTIC AGENTS

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Background The present study has investigated the comparison of the clinical outcomes of prophylactic submucosal saline-epinephrine injection and hypertonic saline injection for colon polyps in patients taking antithrombotic agents.

Methods We retrospectively investigated the medical records of 183 patients who taking antithrombotic agents among 891 patients who underwent colonic endoscopic mucosal resection (EMR) from January 2013 to March 2018. The patients were divided into two groups: group A, 92 patients with saline-epinephrine injection use; and group B, 91 patients with hypertonic saline (10%NaCl) injection use. Clinical characteristics, type of antithrombotic agents, treatment outcomes and adverse events were compared between the two groups. (figure 1)

Results The mean age was 73.5 and 74.0 years in group A and B, sex and patient characteristics were not different between the two groups. The main antithrombotic agents were low-dose aspirin (A: 33, B: 31 patients), warfarin (A: 9,

B: 22 patients), and clopidogrel (A: 20, B: 11 patients). Before colonic EMR, heparin bridge therapy (A: 20, B: 23 patients) and cilostazol replacement (A: 15, B: 11 patients) were equally performed.

There was no significant difference between the two groups in characteristics of colonic polyps. En bloc resection rate was similar successfully between the two groups (94.6% vs 97.8%). EMR procedure was performed by trainees more frequently in group A than B (73.9% vs 48.4%; $p < 0.001$). There were no significant differences in post EMR bleeding (7.6% vs 4.4%), immediate EMR bleeding (6.5% vs 3.3%) and other adverse events between the two groups.

Conclusions The post EMR bleeding in patients taking antithrombotic agents was similar between saline-epinephrine and hypertonic saline submucosal injection.

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EFFECT OF MULTIDONOR INTENSIVE FECAL MICROBIOTA TRANSPLANTATION BY CAPSULES FOR ACTIVE UNCREATIVE COLITIS: A PROSPECTIVE TRIAL

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Background Fecal microbiota transplantation (FMT) can induce remission in patients with ulcerative colitis(UC). We aim to establish the efficacy of multidonor, easy way FMT by capsules in active UC, and identify the factors associated with response to therapy.

Methods We conducted a prospective trial in Zhongshan Hospital Affiliated to Xiamen University, Xiamen, China. A total of 28 adults with active UC (Mayo score 4–11) were enrolled in this trial, followed by capsules 3 days one week. One donor's fecal microbiota was made into one capsule, and fecal microbiota transplantation was each derived from two or three unrelated donors. The primary outcome was steroid-free clinical remission with endoscopic remission or response. We performed 16S rDNA stool analysis to access associated microbial changes. Based on LC-MS/MS technology metabolomic researches were carried out to study metabolome of the serum.

Results The primary outcome with clinical remission was achieved in 16 out of 28 patients (57.14%), and 11 out of 22 patients(50%) had the mucosal healing. No adverse events were identified in these patients. The effects have no significant relationship with the age, gender, severity and extent of disease.FMT increased microbial diversity and altered composition. After FMT, unlike non-responders, the intestinal flora structure of responders was close to the donor, and the significant change began 1 week after transplantation. After FMT, responders had enrichment of *Alloprevotella* compared with non-responders and had increased levels of taurochenodeoxycholate and taurocholate. *Escherichia-Shigella* were decreased after FMT in responders, but no change in non-responders. The correlation analysis between the differential metabolites and the differential flora showed that the bile acid-related metabolites were positively correlated with the abundance of *Alloprevotella* and *Prevotella* 9.

Conclusions Intensive-dosing, multidonor, FMT by capsules induces clinical remission in active ulcerative colitis and is associated with the changes of intestinal flora. *Alloprevotella*

Abstract IDDF2019-ABS-0249 Figure 1 Flow diagram of the study

and bile acid-related metabolites were related to curative effect. The enrichment of *Alloprevotella* after FMT may be able to treat ulcerative colitis by regulating bile acid metabolism, improving mucosal permeability and regulating immunity. Future work should focus on the multi center verification and the relationship of immunity and gut microbiome.

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EXPLAINED VARIANCE AND PREDICTABILITY OF INFLAMMATORY BOWEL DISEASES BY GENETIC RISK SCORE IN FIVE ASIAN POPULATIONS (RESULTS FROM THE INTERNATIONAL IBD GENETICS CONSORTIUM)

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Background In the absence of properly designed studies, the clinical implication of genetic findings in Inflammatory Bowel Disease (IBD) is a matter of persistent debate especially in Asian population where the prevalence of IBD including Crohn's Disease (CD) and Ulcerative Colitis (UC) is rising. We aimed to investigate the predictability of IBD, CD, and UC by the means of Genetic Risk Score (GRS), in yet unaffected high-risk individuals from East Asia (EA) and Central Asia (CA).

Methods This present study included 9,698 subjects, consisting of 2,003 CD, 2,730 UC and 4,965 countries, age and gender-matched controls, genotyped on the Immunochip array of three EA (Japan, South-Korea and China) and two CA countries (India and Iran). We generated a multi-locus GRS for each population by combining information from up to 201 known genome-wide significant IBD associated variants to

summarize a total load of genetic risk for each phenotype. We estimated explained variance and predictability of IBD, CD, and UC by GRS. We shuffled the EA data into training set including two out of the three EA populations to build a model to calculate the odds ratio (OR) for each IBD variants, and a test set including the third population for the validation of predictive model built in the training set. For Indian and Iranian populations, we used the previously estimated ORs for the Caucasian population, to build GRS and test the predictive model in these two populations.

Results GRS of IBD could significantly explain up to 4.40% and 4.14% of IBD variance in EA and CA populations but given a prevalence of 0.01% and 0.04% for IBD it yields to a negligible predictive probability up to 8.8×10^{-4} and 5.52×10^{-4} . GRS of CD and UC could significantly explain CD and UC to a lesser extent compared to IBD given a lower prevalence of CD and UC (figure1).

Conclusions The present study shows that genetic findings based on Trans-ethnic analyses are applicable across Asian populations. GRS alone can explain a limited percentage of disease occurrence in general population (<5% of disease susceptibility) and may not predict IBD in the Asian populations.

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FACTORS ASSOCIATED WITH READINESS TO SCREEN FOR COLORECTAL CANCER: A POPULATION-BASED STUDY USING THE STAGES OF CHANGE MODEL

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Background Colorectal cancer (CRC) screening is crucial in reducing its mortality yet its success depends on long-term participation. To promote the screening programme, there is a need for understanding the factors associated with its uptake. Nevertheless, most previous studies only evaluated the factors associated with screening adherence as a binary outcome. The Stages of Change model (SOC) provides an alternative means to categorise prospective participants into more precise groups. This study aims to investigate the social-demographic factors associated with readiness to CRC screening using the SOC.

Methods A population-based telephone survey was conducted among 2,400 individuals aged 61–70 years old. Data on the social-demographic factors (age, gender, educational level, marital status, occupation, income, smoking and self-perceived health status), past experience; current status; and future intention to receive CRC screening were collected

Abstract IDDF2019-ABS-0253 Figure 1 Odds ratio and explained variance in target populations per phenotype and per state