prevention', 'Secondary prevention', Antibiotic, Norfloxacin, Rifaximin, Ciprofloxacin and TMP-SMX. Only those randomised studies were included which evaluated the role of antibiotics in high-risk cirrhosis patients of more than 18 years of age for primary or secondary prophylaxis of spontaneous bacterial peritonitis. Our outcomes were occurrence/recurrence of SBP episode, extra-peritoneal infections, any adverse effects and reduction in mortality. We did random-effects network meta-analysis using a Bayesian approach, and calculated odds ratios (ORs) and 95% CrI; agents were ranked using rank probabilities.

Results We found total 1211 records in our systematic database search and out of these 17 randomised trials were found eligible for network meta-analysis.

In aggregate group of both primary and secondary SBP, for the outcome of SBP occurrence/recurrence Rifaximin daily, Norfloxacin daily, Rifaximin Norfloxacin daily, Ciprofloxacin intermittent and Trimethoprim-sulfamethoxazole daily were found to be having an odds of 0.050(0.0049–0.21), 0.17(0.048–0.41), 0.053(0.0036–0.35), 0.17(0.028–0.76) and 0.16(0.027–0.62) as compared to that of placebo. The rank probability showed that Rifaximin Norfloxacin daily and Rifaximin daily has a probability of 0.42 and 0.41 respectively for getting ranked as one.

Conclusions Ciprofloxacin, Norfloxacin, Trimethoprim-sulfamethoxazole and Rifaximin are useful in prophylaxis of SBP in patients with cirrhosis.

IDDF2019-ABS-0347 PLATELET COUNT AFTER LIVING DONOR LIVER TRANSPLANTATION AS A SURROGATE FOR PORTAL VEIN PRESSURE MONITORING AND PREDICTOR OF GRAFT HYPERPERFUSION SYNDROME: THE '5-67-8' RULE

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Background Thrombocytopenia early after living donor liver transplantation (LDLT) mainly occurs secondary to hepatic/splenic sequestration, a product of Portal vein pressure (PVP). Portal vein flow (PVF) unlike PVP, is mainly an inflow parameter and does not directly reflect sinusoidal pressure and predict graft dysfunction secondary to hyperperfusion syndrome (HPS). The aim of this study is to determine whether post-LDLT platelet count (PC) can reflect PVP and serve as a biomarker to predict HPS.

Methods A total of 757 consecutive adult to adult LDLTs were performed from July 2010 to January 2018 at Kaohsiung Chang Gung Memorial Hospital. After excluding recipients who underwent splenectomy or splenic artery ligation, a total of 690 patients were included. Postoperative liver function, the volume of ascites and graft hemodynamics were recorded on days 1,3,5,7 and 14. Correlation analysis was done using Generalized estimating equations and Receiver operating characteristic analysis (ROC) with Youden's index to determine the optimal cut-off point.

Results A total of 201 patients (29%) developed HPS in this study. Post LDLT PC significantly correlated to PVF ($p<0.001$) and HPS ($p<0.001$). Multiple linear regression analysis showed that PC was a better predictor of HPS

when compared to PVF (R^2 0.02 vs 0.003). PC at postoperative day 5 (POD5) was also a satisfactory biomarker for PVP and predictor of HPS with an AUC of 0.628. Youden's index revealed that the optimal cut-off point for PC was 67,000 per mm³ with a sensitivity of 0.78 and specificity of 0.59.

Conclusions Platelet counts within the first 2 weeks after LDLT can serve a surrogate for PVP monitoring and can be used as a guide for further inflow modulation. Furthermore, a PC on POD5 of less than or equal to 67,000 per mm³ is 80% sensitive in predicting HPS hence, the '5-67-8' rule.

Basic Gastroenterology

IDDF2019-ABS-0027 URINARY FORMATE AND GLYCINE ARE ASSOCIATED WITH TREATMENT RESPONSE IN PATIENTS TREATED WITH ANTIBIOTICS FOR POUCHITIS

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Background Restorative proctocolectomy (RPC) is considered the preferred surgical choice for patient with ulcerative colitis (UC) who have failed medical therapy and in some patients with familial adenomatous polyposis (FAP). It has been shown through metabolic profiling of urine that CD patients have higher levels of formate and lower levels of hippurate and 4-cresol sulfate when compared to healthy controls. To date, extensive metabolic profiling in RPC has yet to be studied.

This study aimed to determine compounds found in urine that are associated with treatment response in patients that have been treated for pouchitis

Methods Patients with pouchitis were recruited from a single centre. Pouchitis was defined using the pouch disease activity index (PDAI) and pouchitis was considered when the score was ≥ 7 . Response to antibiotics was defined as either a 2 points reduction in PDAI.

Mid-stream morning urine samples were collected. Samples were stored at -80°C until analysis. ¹H-NMR profile was recorded using the Bruker® Avance III 600 MHz spectrometer, with a SampleJet 96 well autosampler. The full resolution ¹H NMR spectra were imported into the SIMCA-P software package, and multivariate data analyses were carried out. Metabolite assignment was performed by comparing chemical shifts, Jres coupling, and peaks multiplicity

Abstract IDDF2019-ABS-0027 Figure 1 UV PLS DA showing differences between responders vs non-responders

with information in databases (such as Human Metabolome DataBase, HMDB).

Results There were 21 patients. The median age of the cohort was 50 years (range 28–79). A total of 11 patients were on antibiotics and 10 patients were off antibiotics. Nine were responders. On multivariate modelling there were significant differences found between responders and non-responders (CV-ANOVA $p=0.05$) (figure1). Significant spectral differences that corresponded to the multivariate model correlated with Formate (8.84 PPM) Trigonelline (4.45PPM) and Glycine 3.57(PPM) all of which were higher in responders.

Conclusions Trigonelline, formate and glycine may help differentiate patients with pouchitis who will respond to treatments versus those that do not. It is currently unclear as to the mechanism as to why these metabolites are reduced in non-responders and further work is required to understand this and validate our findings.

IDDF2019-ABS-0030

BIOSYNTHESIS OF SILVER NANOPARTICLES USING PLANT NEPENTHES *spp.* AND ITS BACTERICIDAL EFFECT

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Background The use of nanotechnology has grown rapidly for the past few years and has been implemented in various types of area including healthcare. The main aim of the proposed study is to synthesize safe and stable nanosilver by using the extract of plant *Nepenthes spp.* These nanoparticles will be characterized by various microscopic techniques to study the size and nature of nanoparticles. These nanoparticles will further be evaluated for its antibacterial activity against various bacterial pathogens and also evaluate its synergistic effect with ciprofloxacin.

Methods

1. Collection of plant material.
2. Extraction
3. Biosynthesis of silver nanoparticles.
4. Characterization of silver nanoparticles.
 - 4.1 UV-Vis Spectroscopy
 - 4.2 Transmission Electron Microscope (TEM) Spectroscopy
5. Determination of anti-microbial activity of AgNPs by disc diffusion method.
 - 5.1 Preparation of agar plate
 - 5.2 Bacterial strain was cultured.
 - 5.3 Antimicrobial activity test
 - 5.4 Synergistic effect test

Results Colour change observed in the leaves sample of *Nepenthes spp.* at different time intervals upon addition of AgNO₃. UV-Vis spectrophotometer analysis was used to detect and confirmed the presence of silver nanoparticles and the reduction of silver ion into silver nanoparticles was analyzed by spectral data obtained. It showed an absorbance peak around 405nm, specific for silver nanoparticles. Based on the TEM analysis data, the size of silver nanoparticles were approximately around 26.90nm to 34.47nm. The zone of inhibition was measured by using disc diffusion method and the highest zone of inhibition against *Bacillus Cereus* (18 mm for 25 μ l). These nanoparticles were further evaluated for its synergistic effect with

ciprofloxacin. Synthesized silver nanoparticles showed the best results against *Salmonella Enterica*. (47 mm for 20 μ l AgNPs + Ciprofloxacin).

Conclusions *Nepenthes spp.* acts as a good source for the biosynthesis of silver nanoparticles. Silver nanoparticles synthesized from the *Nepenthes spp.* showed good antibacterial activity against *Escherichia Coli*, *Salmonella Enterica*, *Bacillus Cereus* and *Staphylococcus Aureus* and showed excellent synergistic effect with ciprofloxacin. Hence, because of this strong antibacterial possessed by silver nanoparticles, it may be helpful to counter the bacterial resistance. Moreover, by conducting this study, it will be helpful for researchers as a future reference on the subject of nanotechnology.

IDDF2019-ABS-0040

A RARE CASE OF ILEO-COLIC TUBERCULOMA PRESENTING AS INTUSSUSCEPTION IN AN ADULT. A CASE PRESENTATION

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Background Abdominal tuberculosis is regarded as a great mimicker of other abdominal pathology and is an increasingly common disease that poses a diagnostic challenge. On the other hand, Intussusception in the adult population is a very rare occurrence and a demonstrable etiology is found in 70–90% of cases. We present a very rare event of secondary intussusception wherein tuberculoma is the lead point.

Methods A case of 42-year-old female who presented with abdominal distention for one week, with decreased in bowel movement. On physical examination of the abdomen, it revealed a distended with tenderness on the left quadrant area.

A CT scan was done and revealed a high probability of ileocecal intussusception, and a chest radiograph of Pulmonary Tuberculosis.

Results Exploratory Laparotomy was immediately scheduled and revealed ascites, bowel thickening, massive mesenteric lymphadenopathy, bowel stricture 60 cm from the ileocecal valve and an ileocolic intussusception with tuberculoma as the lead point. A right hemicolectomy extending to the midportion of the jejunum was done. The postoperative course was uneventful and she was discharged on the 6th post-operative day.

Histopathology revealed necrotising granulomatous inflammation highly suggestive of TB.

Conclusions Abdominal tuberculosis is still a major health problem in many parts of the world. Even in developed countries, incidence has been steadily increasing due to AIDS epidemic, transglobal migration and increased number of immunosuppressed patients. Due to lack of specific symptoms and signs of intestinal tuberculosis, most patients present with complications like intestinal perforation or obstruction or even fistula formation. Still, intussusception as a presentation of intestinal tuberculosis is a very rare event. Inflammatory adhesions around the ileocecal region might be the probable reason for intussusception in our case