



DIVISION OF

GASTROENTEROLOGY HEPATOLOGY AND NUTRITION



University of
Pittsburgh

DEPARTMENT OF MEDICINE

ANNUAL REPORT | FY20

DIVISION OF
**GASTROENTEROLOGY,
HEPATOLOGY AND NUTRITION**
ANNUAL REPORT

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DIVISION OF GASTROENTEROLOGY

Excelling in translational research and advanced clinical care, the Division is committed to the education of gastroenterology and liver trainees as well as physician colleagues.

The University of Pittsburgh Division of Gastroenterology, Hepatology and Nutrition enjoyed continued success in Fiscal Year 2020. Strategic goals were defined and implemented to provide for continued growth and success in the Division. The Division was ranked among the top ten “Best Hospitals for Gastroenterology & GI Surgery” (Rank #8, U.S. News and World Report, July 2019).

The Division of Gastroenterology, Hepatology and Nutrition boasts seven centers of excellence: Inflammatory Bowel Disease Center, Center for Liver Diseases, GI Cancer Prevention & Treatment Center, Pancreas & Biliary Center, Center for Intestinal Health & Nutrition Support, Center for Women’s GI Health, and Neurogastroenterology & Motility Center. The full faculty complement in FY20 was 63: 51 clinical faculty, 12 research faculty, 59 full Division faculty, and four adjunct faculty. The Division budget hovers at \$70 million, with \$7 million allocated to direct and indirect research commitments. New clinical recruits are required to maintain and grow Division operations, including general gastroenterologists and hepatologists, to compensate for pending faculty retirements and additional separations in FY21.

While among the medical specialties most in danger of COVID-19 infection, Division physicians and faculty embraced the required adaptations related to the pandemic. March 2020 procedural volume dropped to 70%, and April 2020 volume dropped to 22%. However, clinical operations rose to 58% in May 2020 and by June volume had returned to 100%. The Division’s early work with telemedicine proved fortuitous, since 80 to 90% of our clinicians used telemedicine within the final quarter of FY20, which was one of the highest rates in the Department of Medicine.

We were honored to welcome five new faculty members in FY20:

- **Jeffrey Dueker, MD, MPH:** assistant professor



Robert E. Schoen, MD, MPH Chief



FY20 was a year of successful research grants, clinical advancements, and faculty recognitions.

The Division raised significant new income of more than **three million dollars** (direct and F&A) in extramural grant support in FY20 alone. In addition to these new grants, **Eva Szigethy, MD, PhD** continues work on her landmark \$6.3 million PCORI grant and its aims to integrate behavioral health, technology, and telemedicine. Other faculty all maintained active research portfolios (i.e., **Gavin Arteel, PhD; Ramon Bataller, MD, PhD; Juliane Beier, PhD; Jaideep Behari, MD, PhD; David Binion, MD, PhD; Randall Brand, MD; Richard Durr, MD; Jing, Hu, MD; David Levinthal, MD, PhD; Yang Liu, PhD; Shari Rogal, MD, MPH; Jami Saloman, PhD; Robert E. Schoen, MD, MPH; David Whitcomb, MD, PhD;** and **Dhiraj Yadav, MD, MPH**).

FY20 also saw the continued growth of the Division’s UPMC Mercy Digestive Health Center. **Kapil Chopra, MD**, was named the vice chair of Medicine at UPMC Mercy, and **Michael Pezzone, MD, PhD**, serves as the director of Gastroenterology at UPMC Mercy. This office is also the home to the Division’s new UPMC Program for Gut-Brain Health (UPMC PGH) led by **David Levinthal, MD, PhD**, and **Eva Szigethy, MD, PhD**, which replaces the Division’s Visceral Inflammation & Pain Center and expands patient care to include complementary treatments centering on behavioral health and new social support services for gastroenterology patients, with special emphasis on GI motility patients.

of medicine, previous UPMC chief GI fellow, and IBD specialist, with joint VA and UPMC appointment

- **Jing Hu, PhD:** associate professor of medicine & GI cancer researcher
- **Shari Rogal, MD, MPH:** assistant professor of medicine, previous UPMC GI fellow, and previous adjunct faculty with the Division, with a VA appointment
- **Jami Saloman, PhD:** assistant professor of medicine & pancreas researcher
- **Harkirat Singh, MD:** assistant professor, previous UPMC GI fellow & advanced endoscopy fellow, and upper-GI procedure specialist, with a focus on advanced therapeutics and work at Mercy Hospital

The following three physicians left the Division in FY20:

- **Alison Jazwinski Faust, MD, MHS,** moved for an academic position with the Division of Gastroenterology and Hepatology at PennState Health, Milton S. Hershey Medical Center.
- **Georgios Papachristou, MD, PhD,** left to join The Ohio State University Wexner Medical Center as the Dr. Samuel T. and Lois Felts Mercer Endowed Professor of Medicine and Pharmacology. He now serves as the director of Advanced Endoscopy and the medical director for Ambulatory Endoscopy for the OSU Division of Gastroenterology, Hepatology and Nutrition as well as the vice chair of Translational Research for the OSU Department of Internal Medicine.
- **Vikrant Rachakonda, MD,** moved west to pursue an associate professor of medicine appointment with the Division of Hepatology and Gastroenterology at the UC Davis Medical Center and the Northern California VA Medical Center.

Robert E. Schoen, MD, MPH

Chief, Division of Gastroenterology, Hepatology and Nutrition
Professor of Medicine & Epidemiology

Steven R. Abo, MD

Assistant Professor of Medicine
Director, Center for Womens' GI Health

Gavin E. Arteel, PhD

Professor of Medicine
Associate Chief for Basic Science
Pilot and Feasibility Core Director,
Pittsburgh Liver Research Center

Arthur M. Barrie III, MD, PhD

Assistant Professor of Medicine

Ramon Bataller, MD, PhD

Professor of Medicine
Chief of Hepatology

Jaideep Behari, MD, PhD

Associate Professor of Medicine

Juliane I. Beier, PhD

Assistant Professor of Medicine

David G. Binion, MD

Professor of Medicine
Co-Director, IBD Center
Director, Nutrition Support Service

Randall E. Brand, MD

Professor of Medicine
Academic Director, GI-Division, UPMC Shadyside
Director, GI Malignancy Early Detection, Diagnosis & Prevention Program

Rhonda M. Brand, PhD

Visiting Associate Professor of Medicine

Jennifer S. Chennat, MD

Associate Professor of Medicine
Director, Interventional Endoscopy Fellowship Program
Co-Director of Endoscopic Ultrasound Program, Liver-Pancreas Institute

Kapil B. Chopra, MD

Professor of Medicine and Clinical & Translational Science
Vice Chair of Medicine, UPMC Mercy
Medical Director, Comprehensive Liver Program, UPMC Liver Pancreas Institute

Rohit Das, MD

Assistant Professor of Medicine
Associate Director, GI & Hepatology Fellowship Program

Andres Duarte-Rojo, MD, DSc

Associate Professor of Medicine

Howard Dubner, MD

Clinical Associate Professor of Medicine

Jeffrey M. Dueker, MD, MPH

Assistant Professor of Medicine

Richard H. Duerr, MD

Professor of Medicine
Inflammatory Bowel Disease Genetic Research Chair
Professor of Medicine, Human Genetics, and Clinical & Translational Science
Co-Director and Scientific Director, UPMC Inflammatory Bowel Disease Center

Michael A. Dunn, MD

Professor of Medicine and Biomedical Informatics
Associate Chief for Translational Research

Kenneth E. Fasanella, MD

Assistant Professor of Medicine
Director, Gastroenterology Fellowship Program

Swaytha R. Ganesh, MD

Assistant Professor of Medicine
Medical Director, Living Donor Program, UPMC Thomas E Starzl Transplant Institute

Julia B. Greer, MD, MPH

Assistant Professor of Medicine

Janet R. Harrison, MD

Assistant Professor of Medicine

Jing Hu, PhD

Research Associate Professor of Medicine

Elyse R. Johnston, MD

Clinical Instructor of Medicine

Naudia L. Jonassaint, MD, MHS

Assistant Professor of Medicine
Vice Chair for Diversity and Inclusion, Department of Medicine

Asif Khalid, MD

Associate Professor of Medicine
Chief, GI Services, VA Pittsburgh Healthcare System

Michael J. Kingsley, MD

Clinical Assistant Professor of Medicine

David J. Levinthal, MD, PhD

Assistant Professor of Medicine
Director, Neurogastroenterology & Motility Center

Yang Liu, PhD

Associate Professor of Medicine and Bioengineering
Director, Biomedical Optical Imaging Laboratory
Member, University of Pittsburgh Cancer Institute (UPCI)
Core faculty member, Department of Biomedical Informatics

Shahid M. Malik, MD

Clinical Assistant Professor of Medicine
Associate Program Director, Transplant Hepatology Fellowship
Co-Director, Liver Outreach Program

James B. McGee, MD

Associate Professor of Medicine
Assistant Dean for Medical Education Technology
Director, Laboratory for Educational Technology

Kevin M. McGrath, MD

Professor of Medicine
Director, Endoscopic Ultrasound
Director, GI Endoscopy Lab

David Mulock, MD

Clinical Assistant Professor of Medicine

Alex H. Myint, MD

Clinical Assistant Professor of Medicine

Sudhir K. Narla, MD

Clinical Assistant Professor of Medicine
Chief, Division of Gastroenterology, UPMC McKeesport Hospital
Director, Center for Digestive Disorders, UPMC McKeesport Hospital

Stephen J.D. O'Keefe, MD, MSc

Professor of Medicine

Michael A. Pezzone, MD, PhD

Associate Professor of Medicine

Anna Evans Phillips, MD, MSc

Assistant Professor of Medicine

Siobhan Proksell, MD

Assistant Professor of Medicine
Subspecialty Education Coordinator, Division of Gastroenterology

Joseph Pusateri, MD

Clinical Assistant Professor of Medicine

Mordechai Rabinovitz, MD

Professor of Medicine

Vikrant P. Rachakonda, MD

Assistant Professor of Medicine

Shari S. Rogal, MD, MPH

John J. Fung Assistant Professor of Transplant Surgery
Assistant Professor of Medicine
Core Faculty, Center for Health Equity Research and Promotion
Staff Physician, VA Pittsburgh Healthcare System

Jami L. Saloman, PhD

Assistant Professor of Medicine and Neurobiology

Savreet Sarkaria, MD

Clinical Associate Professor of Medicine

Marc B. Schwartz, MD

Assistant Professor of Medicine

Obaid S. Shaikh, MD, FRCP

Professor of Medicine
Director, Transplantation Medicine, VA Pittsburgh Healthcare System

Harkirat Singh, MBBS

Clinical Assistant Professor of Medicine

Adam Slivka, MD, PhD

Professor of Medicine
Associate Chief of Clinical Affairs, Division of Gastroenterology, Hepatology and Nutrition
Associate Director, Liver Pancreas Institute

Eva M. Szigethy, MD, PhD

Professor of Medicine, Psychiatry, and Pediatrics
Director, Behavioral Health with the Chief Medical and Scientific Office
Founder, Visceral Inflammation & Pain (VIP) Center
Director, Total Care-IBD

Dan R. Trellis, MD

Clinical Assistant Professor of Medicine

Lee Weinberg, MD

Clinical Assistant Professor of Medicine

David C. Whitcomb, MD, PhD

Professor of Medicine, Cell Biology & Physiology, and Human Genetics
Giant Eagle Foundation Professor of Cancer Genetics
Director, UPMC Precision Medicine Service

John Wood, MD

Clinical Assistant Professor of Medicine

Kirk L. Works, MD

Clinical Assistant Professor of Medicine

Jianquan Xu, PhD

Research Assistant Professor of Medicine

Dhiraj Yadav, MD, MPH

Professor of Medicine

CLINICAL ACTIVITIES

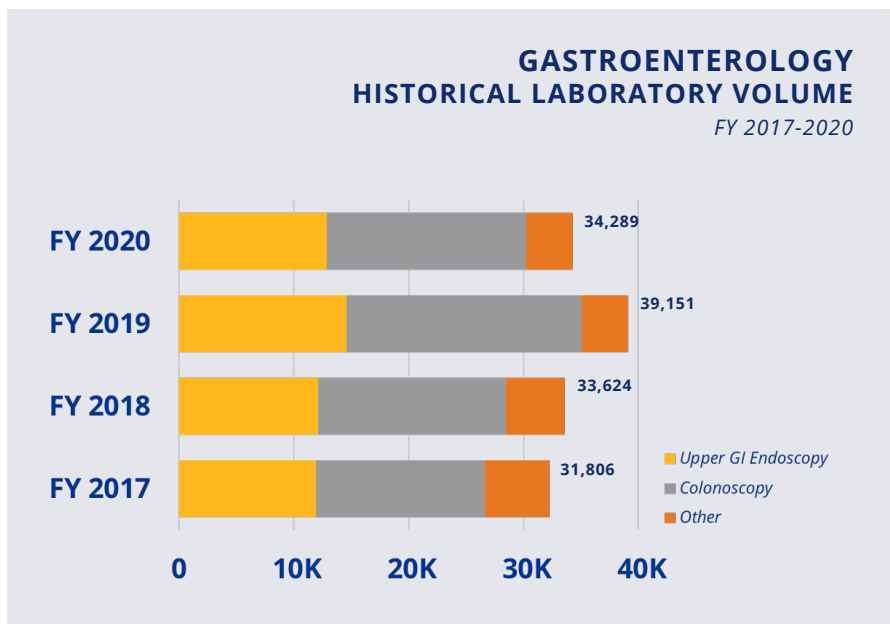
The Division demonstrates superior clinical expertise within all aspects of gastrointestinal and hepatology patient care.

The **Digestive Disorders Center (DDC)** is located in UPMC Presbyterian and is the hub of outpatient gastroenterology care. The **Center for Liver Diseases (CLD)** is located in the Thomas E. Starzl Transplantation Center in UPMC Montefiore and is the outpatient clinic for liver disease care. Division clinicians also see patients at UPMC Shadyside, Magee Womens Hospital of UPMC, UPMC St. Margaret’s, UPMC Mercy, UPMC McKeesport, and UPMC South Hills. In FY20, Division services at UPMC McKeesport were reduced to outpatient care only.

The Division’s **Visceral Inflammation & Pain Center** has been restructured to support the behavioral health needs of patients with functional bowel disorders. This new initiative is called the UPMC Program for Gut-Brain Health (UPMC PGH) and is located at UPMC Mercy under the leadership of **Dr. David Levinthal, MD, PhD**, and **Eva Szigethy, MD, PhD**. This program includes in-person and tele-visits complemented by behavioral health technology. These services provide behavior disorder screening as well as the tools needed to support the patient’s medical and behavioral needs. The aim is to enable patients to regain control over their GI illness. The Pittsburgh Center for Gut-Brain Health complements the first-of-its-kind leadership work of the Total Care-IBD medial home, which remains in full operation. While providing coordinated medical and behavioral health care for IBD patients, Total Care-IBD has received the ultimate compliment: replication at many other U.S. academic medical centers, including Mt. Sinai and the University of Chicago.

The COVID-19 pandemic has been a fluid situation requiring Divisional flexibility despite limited resources. Medical staff rationed PPE and maintained appropriate patient care protocols. The Division implemented a jeopardy schedule to ensure adequate coverage for Division clinicians who may be quarantined.

The **Veterans Administration Pittsburgh Healthcare System (VAPHS) GI section**, led by **Asif Khalid, MD**, experienced significant change in FY20 due to the departure of key faculty members: Georgios Papachristou, MD, PhD, in pancreatology and therapeutic endoscopy, and Fadi Francis, MD in hepatology. To address the void left by Dr. Francis, **Alex Myint, MD**, an existing Division faculty member



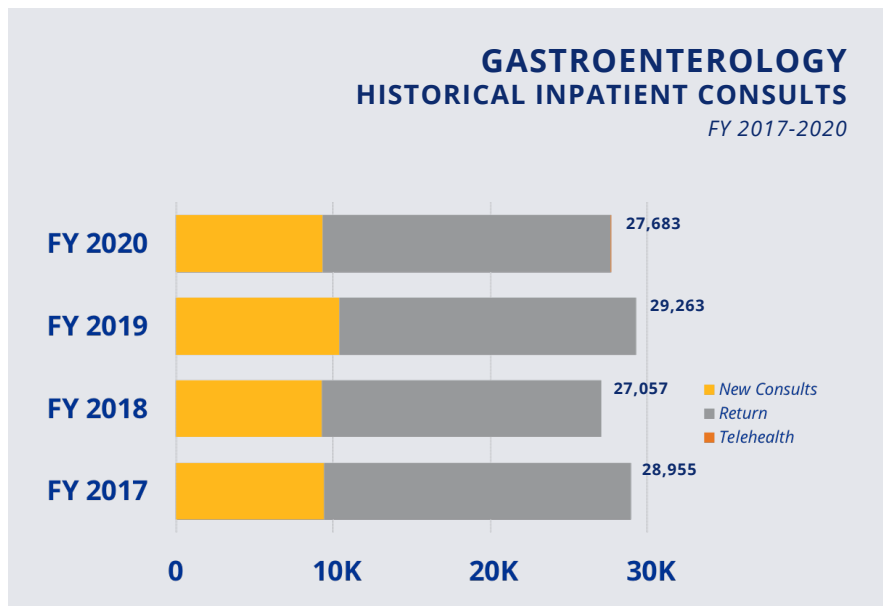
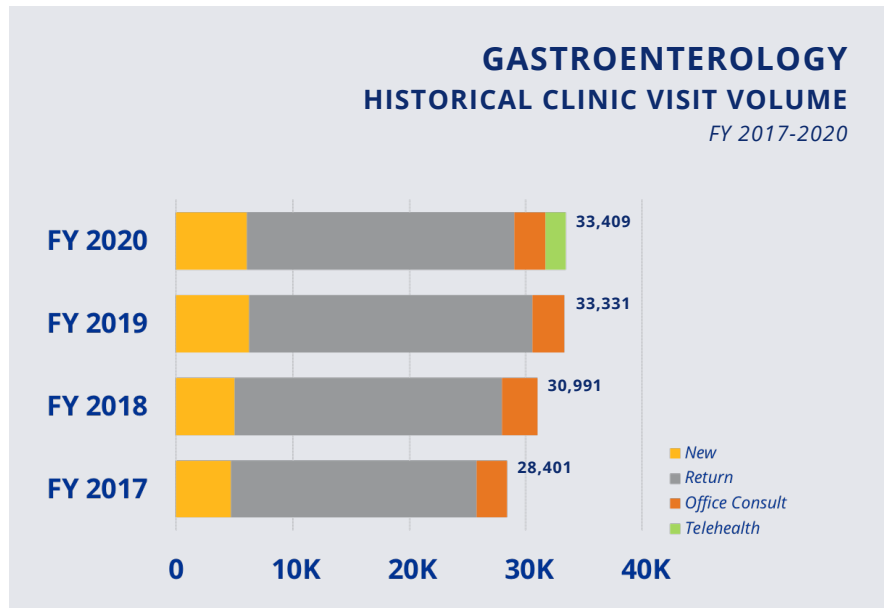
was reassigned from UPMC McKeesport inpatient service to support the VAPHS hepatology and liver transplant programs. Dr. Myint is leading an effort to provide liver transplantation care at remote VA Centers. To strengthen the VAPHS IBD program, **Jeffrey Dueker, MD, MPH**, joined **Elyse Johnston, MD**; a proposal to institute a VAPHS clinical IBD medical home will be submitted in FY21.

The weight of the COVID-19 pandemic on the VAPHS's operational structure has led to multiple clinical challenges. The VAPHS GI section rapidly deployed CDC, VA Central Office, and Pennsylvania guidelines to continue emergent and urgent endoscopy services. At the start of the pandemic, outpatient clinic visits were converted to phone visits, and the clinic structure has now evolved to encompass video visits. The judicious use of e-consults and telehealth was augmented by the incorporation of face-to-face visits at the end of FY20. The VAPHS GI section currently has no back log of urgent GI procedures (priority 1 and 2) and began to schedule priority 3 procedures (e.g., surveillance colonoscopy) by the end of FY20.

Despite efforts to convert average-risk CRC screening to Fecal Immunochemical Tests (FIT), a backlog of priority 4 procedures (e.g., screening colonoscopy) remain. By the close of FY20, VA guidelines did not support priority 4 procedure scheduling due to the pandemic, so a large backlog of priority 4 procedures is anticipated in FY21. A study published by the VA GI section last year, first authored by **Dr. Elyse Johnston**, on the risk of facial exposure to microorganisms by endoscopists has received a lot of attention and many citations during the current pandemic.

With hepatitis C treatment modalities secured, Nonalcoholic Fatty Liver Disease (NFLD) has emerged as a primary liver disease treatment target. The **UPMC FLOW** (Fatty Liver, Obesity and Wellness) Clinic is among the top programs in the U.S., due to the program development and leadership by **Jaideep Behari, MD, PhD**. He and his multidisciplinary team of endocrinology, cardiology, bariatrics, and transplant professionals have developed a variety of diets and activity regimens to address this national epidemic.

Ramon Bataller, MD, PhD, chief of Hepatology, has developed one of the most eminent Alcoholic Liver Disease (ALD) programs in the world. Ninety to 100 percent of heavy drinkers have fatty liver disease as well, while about ten to 15 percent of patients with alcoholic hepatitis have fulminant



disease with a high mortality rate (American Liver Foundation, 2020). **Dr. Bataller's** team addresses the patient's alcoholism first and then proceeds with available treatments, all while maintaining a full basic science research lab. His hepatology expertise is complemented by comprehensive support from behavioral health and addiction experts as well as transplantation and related support for patients with advanced disease.

In partnership with the Thomas E. Starzl Transplantation Institute, Division hepatology faculty have continued the expansion of the Living Donor Liver Transplant (LDLT) programming and surgery. Led by hepatologist **Swaytha Ganesh, MD**, UPMC led the nation with 76 (adult and pediatric) living-donor liver transplants and was the **only** center to perform more living-donor liver transplants than deceased-donor liver transplants for the past three years. In February 2020, UPMC reached a milestone of 500 LDLT procedures. In collaboration with the **UPMC Center for Liver Diseases**, the UPMC Liver Transplant Program remains committed to ending waiting list deaths by increasing access to living donation through a national educational initiative targeted to patients, caregivers, and health providers.

Telemedicine has been a staple clinical care component of Division operations for some time. **Eva Szigethy, MD, PhD**, and the IBD Center have been utilizing telemedicine to care for patients in Total Care-IBD, the subspecialty medical home. When the pandemic arrived in spring 2020, the Division's technology and equipment were in place already. The faculty embraced telemedicine's capabilities with **80% to 90%** of physicians using telemedicine during the pandemic. While these numbers have appropriately decreased as FY20 comes to a close and face-to-face visits increase, telemedicine will remain part of the Division's clinical care package, especially related to patient follow up and for patients who travel from a remote location.

In addition to medical home expansion and immersion in telehealth, the Division has conducted other innovative clinical advancements in FY20 as well. Fecal Microbial Transplant (FMT) is available to treat *C. diff* infections, and new obesity management procedures offer novel treatment choices outside of the surgical realm.

QUALITY IMPROVEMENT INITIATIVES

The safety and quality of patient care is a key Division priority. **Elyse R. Johnston, MD** and **Jeffrey Dueker, MD, MPH** lead quality improvement projects for the Division in collaboration with **Naudia L. Jonassaint, MD, MHS**; **James B. McGee, MD**; **Siobhan Proksell, MD**; and **Belinda Marino** (administrator).

Jeffrey Dueker, MD, MPH, and **Asif Khalid, MD**, conducted a study of the Veterans Choice Program (VCP) related to colonoscopy quality and healthcare access, which was published in FY20. The VCP provides veterans access to health care outside of the VA, when wait times at the VA are greater than 30 days. During the study time period (July 2015 - March 2017), 3,855 veterans were referred for colonoscopy, and 190 colonoscopies were performed through VCP. The time between colonoscopy scheduling and the actual procedure through VCP was measured in addition to procedure documentation, quality metrics, and VCP utilization. This study found that colonoscopies were not performed sooner through VCP compared to VAPHS, resulted in incomplete records, and were deficient in colonoscopy performance metrics. The overall utilization of VCP for colonoscopy access was low. The researchers recommended additional monitoring of timeliness, quality, and cost-effectiveness for newer healthcare programs such as VCP. The national director for gastroenterology services at the VA commended **Dr. Dueker** and **Dr. Khalid** on the impact of their work. The director stated that he will use their research to propose national policy changes.

MEDUMO patient-based digital health tools are being implemented as a value metric project to improve colonoscopy quality under the leadership of **Elyse Johnston, MD**. Trackable data points include bowel preparation quality and reduction in cancellations and no-show rates. An additional objective is to improve patient satisfaction and the overall patient experience by streamlining endoscopy and colonoscopy orders to deliver real-time, automated patient instructions. This value metric project is designed to improve outpatient colonoscopy bowel preparation through the overhaul and streamlining of patient instructions and bowel preparation options. From an internal perspective, this project also involves the creation of new EPIC order sets and a partnership with MEDUMO to deliver automated digital instructions to patients.

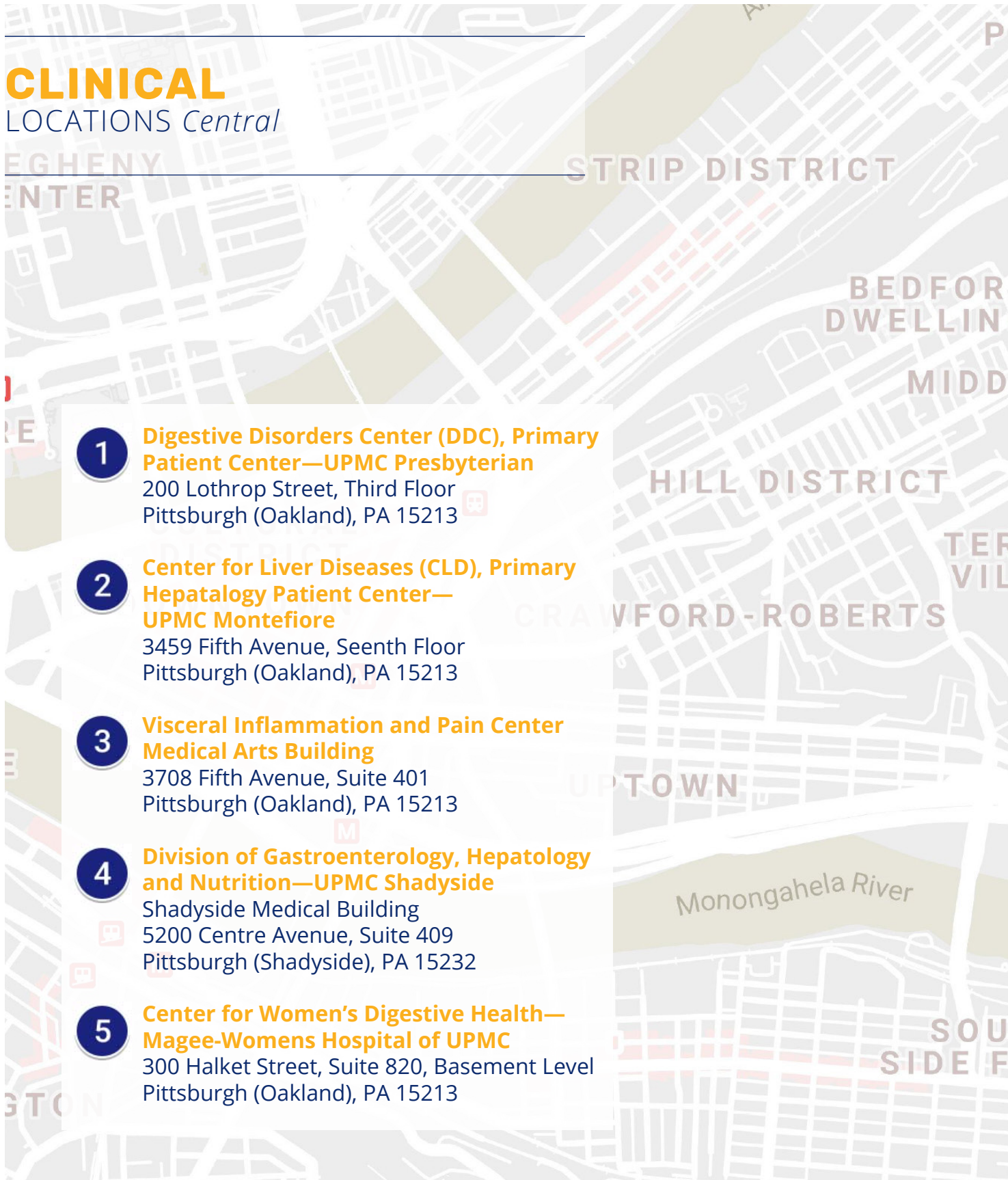
The 2019-2020 Gastroenterology Fellows group quality improvement project investigated inpatient bowel prep workflow. The fellows have submitted an abstract on this research to the American College of Gastroenterology's national annual meeting in 2020.

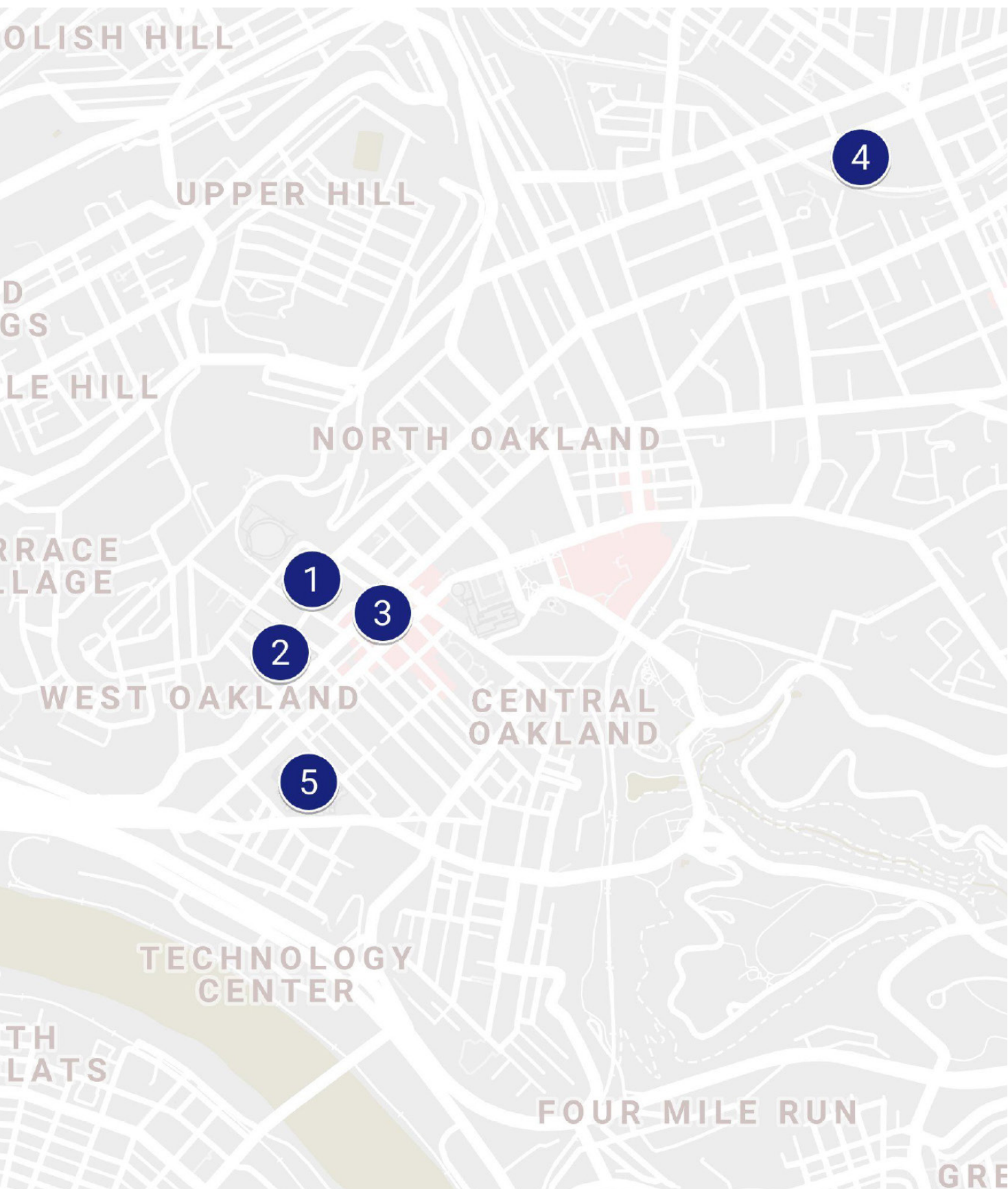
Quality issues are being addressed for Division faculty as well. Stress, overwork, and compensation issues can have negative ramifications on job satisfaction and wellbeing. **Savreet Sarkaria, MD**, has championed the Division's participation in Stanford University's Physician Wellness Academic Consortium, led internally by **Jennifer Berliner, MD**. This multi-institution study will seek to explore both systematic and individual education to address stress reduction, physician wellbeing, interpersonal approaches, and individual management of unconscious bias. The Division is committed to this study to retain a cohesive and effective team and looks forward to incorporating similar programmatic approaches with other clinical, research, and staff personnel.

CLINICAL

LOCATIONS *Central*

- 1** **Digestive Disorders Center (DDC), Primary Patient Center—UPMC Presbyterian**
 200 Lothrop Street, Third Floor
 Pittsburgh (Oakland), PA 15213
- 2** **Center for Liver Diseases (CLD), Primary Hepatology Patient Center—UPMC Montefiore**
 3459 Fifth Avenue, Seenth Floor
 Pittsburgh (Oakland), PA 15213
- 3** **Visceral Inflammation and Pain Center Medical Arts Building**
 3708 Fifth Avenue, Suite 401
 Pittsburgh (Oakland), PA 15213
- 4** **Division of Gastroenterology, Hepatology and Nutrition—UPMC Shadyside**
 Shadyside Medical Building
 5200 Centre Avenue, Suite 409
 Pittsburgh (Shadyside), PA 15232
- 5** **Center for Women’s Digestive Health—Magee-Womens Hospital of UPMC**
 300 Halket Street, Suite 820, Basement Level
 Pittsburgh (Oakland), PA 15213





CLINICAL

LOCATIONS *Peripheral*

1

UPMC Gastroenterology—UPMC Horizon

110 North Main Street, 2nd Floor, and 125 North Main Street, Suite 102 (Kirk Works, MD)
Greenville, PA 16125

2

**Center for Liver Diseases—
UPMC Passavant**

9100 Babcock Boulevard, Basement Level
Pittsburgh, PA 15237

3

**UPMC Gastroenterology—
UPMC St. Margaret's**

Medical Arts Building
100 Delafield Road, Suite 307
Pittsburgh (Aspinwall), PA 15215

4

UPMC South Hills

1300 Oxford Drive
Bethel Park, PA 15102

5

St. Clair Outpatient Hospital Building

2000 Oxford Drive, Suite 680
Bethel Park, PA 15102

6

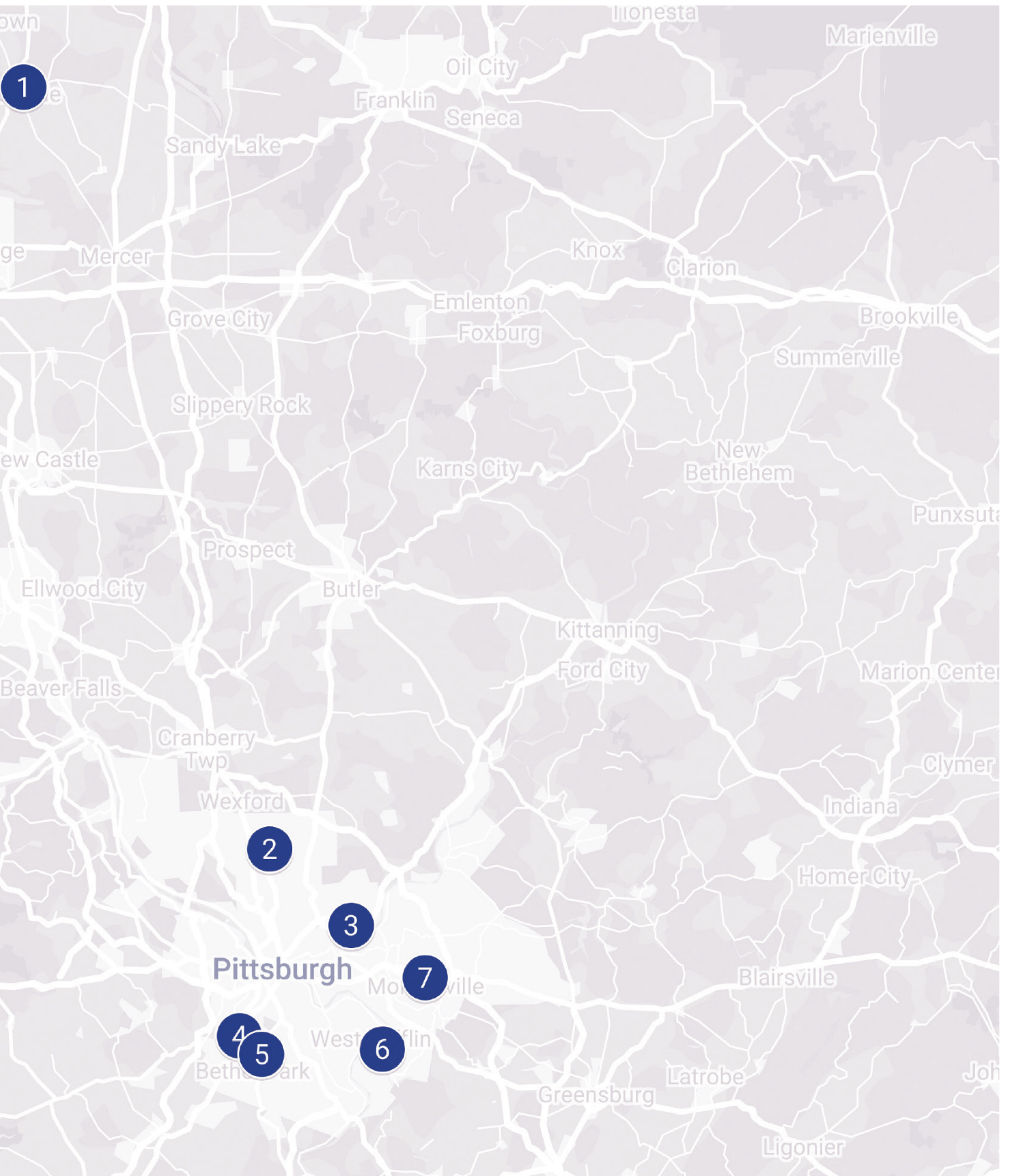
**Gastroenterology and Center for Liver
Diseases—UPMC McKeesport**

Painter Building
500 Hospital Way, Suite 401
McKeesport, PA 15132

7

**Gastroenterology and Center for Liver
Diseases—UPMC Monroeville**

125 Daugherty Drive, Suite 200
Monroeville, PA 15146



RESEARCH ACTIVITIES

The Division is a unique blend of clinical excellence, complemented by superb translational research capacity and capability. Thematic areas include inflammatory bowel disease (IBD), pancreatic diseases, hepatitis and liver diseases, functional and pain disorders, nutrition deficits, digestive system cancer risk, endoscopic management of GI cancers, and women's digestive health.

Core scientific disciplines include epidemiology, cell biology and physiology, genetics, immunology, neurosciences, tissue regeneration, transplantation, and oncogenesis. Applied sciences include biomarker development and clinical trial outcome studies.

The Division's basic research programming is led by **Gavin Arteel, PhD**. Dr. Arteel has updated the research section of the Division's Pitt website to describe all faculty research initiatives, and, in FY20, he added graphic research images for key labs to further demonstrate team innovations. Moreover, Dr. Arteel has championed Division efforts to open labs appropriately during the COVID-19 pandemic, and through his leadership, the Division labs were among the first to return to productivity in FY20.

Dr. Schoen revised the Division's clinical trial organization in FY20. He ensured that clinical trial indirect support was captured by the Division and ensured transparency with all clinical trial development, management, and outcomes. Dr. Schoen encourages clinical trial involvement to keep faculty current and to support an intellectually stimulating investigative environment. Division clinical trial income will be used for novel project start up resources.

Research Grants

The Division faculty received 17 new grants in FY20 totaling over 3 million dollars (direct and F&A) in new extramural grant support. The following grants of \$100,000 or more contributed to this new FY20 income:

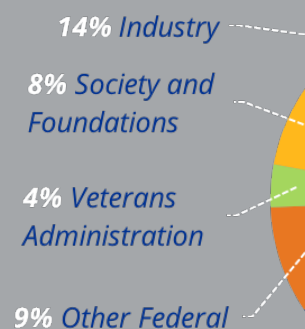
- "Biomarkers of Alcoholic Hepatitis" from the NIAAA to **Gavin Arteel, PhD**
- "Pittsburgh Liver Research Center" from the NIDDK to **Gavin Arteel, PhD**
- "Vinyl Chloride-induced Changes to the Epitranscriptome: Interaction with Diet" from the NIEHS to **Juliane I. Beier, PhD**

RESEARCH

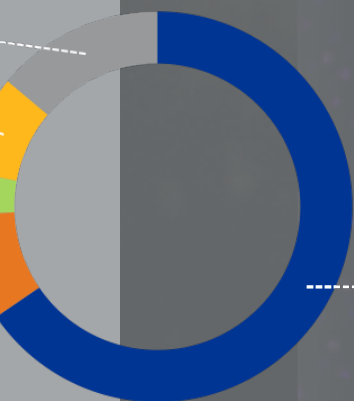
BY THE NUMBERS

In FY20, the Division of Gastroenterology received over \$9.1m in research funding from the Public Health Service, Veterans Administration, and other federal sources, as well as from industry and various societies and foundations. Research expenditures exceeded \$7.9m, a slight increase from FY19.

GRANTS & CONTRIBUTIONS FY20



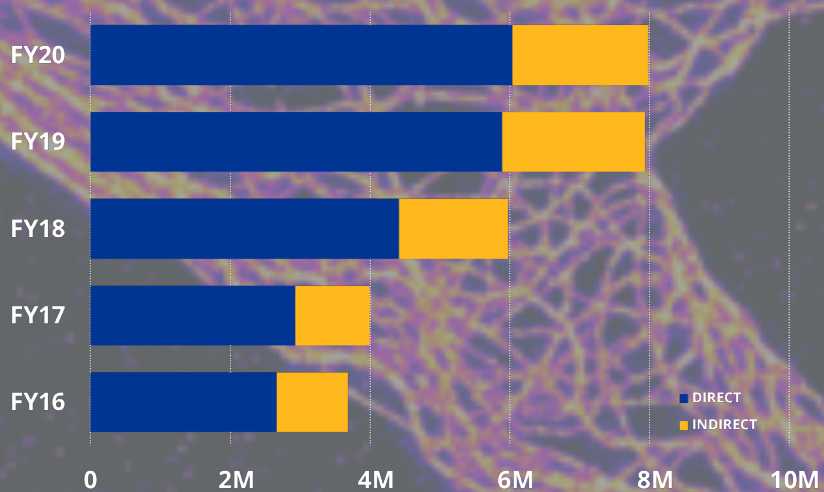
TRACTS AWARDED



65% Public Health Service

RESEARCH EXPENDITURES

FY16-FY20



- “The IMAGES Study: Imaging-based Assessment of Grade of Steatosis in NAFLD” from Endra Live Sciences to **Jaideep Behari, MD, PhD**
- “Lamin B2 Regulates Nuclear Remodeling in Cardiomyocyte Terminal Differentiation” from the NHLBI to **Yang Liu, PhD**
- “Improving Pain Management and Opioid Safety for Patients with Cirrhosis” from the NIDA to **Shari Rogal, MD, MPH**
- “Using Data-Driven Implementation Strategies to Improve Cirrhosis Care” VA Grant, as well as a supplement for this grant, “Using Implementation Science to Address Racial Disparities in Hepatocellular Carcinoma Screening and Treatment,” from the Quality Enhancement Research Initiative (QUERI) to **Shari Rogal, MD, MPH**.
- “Mechanisms and Treatment Development for Pancreatitis Resulting from Alcohol Abuse and Smoking” from the DOD (Cedars-Sinai Medical Center) to **Dhiraj Yadav, MD, MPH**
- “Consortium for the Study of Chronic Pancreatitis, Diabetes and Pancreatic Cancer (CPDPC): Pittsburgh Clinical Center” from the NIDDK to **Dhiraj Yadav, MD, MPH**

Two NIH K awards were awarded in FY20, one for **Shari Rogal, MD, MPH**, who is investigating the role of behavioral interventions to address liver disease pain management, and one for **Jami Saloman, PhD**, who is exploring the intersecting disciplines of neuroscience and pancreatology. Both Dr. Rogal and Dr. Saloman were Division research recruits in FY20, and we welcome their expertise.

The Division excels in multidisciplinary and cross-institutional research collaborations. Key examples include **Eva Szigethy, MD, PhD**'s partnership with CMU to explore depression biometric screening; **Ramon Bataller, MD, PhD**'s international studies to explore alcoholism and its effects on the liver; **Jaideep Behari, MD, PhD**'s fatty liver disease partnerships throughout our institution; and **Dhiraj Yadav, MD, MPH**'s collaborations with multiple academic institutions to address pancreatitis diagnosis and treatment regimens.

Research Centers

The **Translational Research Center (TRC)** in UPMC Montefiore is the Division's new initiative to formally address translational research opportunities. This clinical and research space is shared with the **Division of Endocrinology and Metabolism**, with outpatient care, patient testing, and laboratory processing space all contained in one location. This arrangement enables scientific research and promotion of patient care advances, development of new pharma- and bio-technologies, and related patient care innovations. Many TRC enhancements were added in FY20 including new exam tables and a new recliner for the phlebotomy station, as well as portable room dividers in unique artistic designs to enhance patient safety, privacy, and overall center atmosphere. The Division of Gastroenterology, Hepatology and Nutrition contributions to the TRC feature **Jaideep Behari, MD, PhD**, and **David Levinthal, MD, PhD**. Dr. Behari and his research team treat and study NAFLD patients at the TRC, while Dr. Levinthal's novel work is aimed at the application of non-invasive brain stimulation to influence gastrointestinal function. Dr. Levinthal's lab enjoys state-of-the-art equipment for neuronavigation-guided transcranial magnetic stimulation and electrophysiological recording. Structural renovation in the TRC is planned for FY21 including remodeling to create another functional exam room, and redoing one of the laboratories for specimen processing. Under the supervision of **Lynda Dzubinski, RN**, the TRC atmosphere and physical plant has been radically upgraded.

The **Pittsburgh Liver Research Center (PLRC)** is a multidisciplinary center under the leadership of **S. Paul, Monga, MD**, Division of Gastroenterology, Hepatology and Nutrition adjunct professor, and is the research core for the Division's hepatology investigations. The PLRC leads novel translational and basic science research in hepatic pathobiology to enable and promote improved clinical outcomes through multidisciplinary research. Key research areas include chronic liver injury, liver tumorigenesis, and regenerative medicine. The PLRC is committed to intellectual exchange among

clinicians and researchers to provide a platform to enhance, enrich, and synergize scientific interactions and collaborations among multidisciplinary researchers committed to liver disease science. In FY20, the PLRC became one of only 20 research centers nationwide to receive the Digestive Diseases Research Core Center (DDRCC) designation from the NIDDK.

Research Activities

Major, ongoing research programs for the Division of Gastroenterology, Hepatology and Nutrition are as follows:

- ✦ The lab of **Ramon Bataller, MD, PhD**, has uncovered a new mechanism of alcoholic hepatitis that has the potential to lead to new therapies. He demonstrated that epigenetic mechanisms lead to fetal reprogramming and defective production of HNF4alpha, contributing to liver failure. He has a patent on this discovery and is seeking industry collaboration to further expand on its potential promise in mitigating alcoholic hepatitis.
- ✦ **David Binion, MD**, and **David Whitcomb, MD, PhD**, continue to investigate big data implications in two Department of Defense grants. Dr. Binion mines this data for IBD research, and Dr. Whitcomb uses this support to discover new pancreas care models.
- ✦ The lab of **Yang Liu, PhD**, has developed a highly innovative approach to visualize molecular scale structures in real time. Her team was the first to discover the dual-layered scaffolding of cell nuclei as a previously unrecognized structural support for nuclear function. Recently, her group uncovered the fragmentation of chromatin folding occurring early in neoplasia, even prior to tumor formation, which has potential to improve early detection of aggressive cancers.
- ✦ **Shari Rogal, MD, MPH**, is a hepatologist at the VAPHS and joined the Division as full faculty in FY20. Dr. Rogal has developed and used novel implementation strategy assessments to evaluate how sites across the VA approach the uptake of evidence-based practices. With novel analytics that include traditional and configurational comparative methods to show how to improve VA care, her research reaches a number of relevant domains such as HCV care, cirrhosis care, HIV, addiction care, opioid safety, and intimate partner violence initiatives. She is the site PI for the VA's "Consortium to Disseminate and Understand Implementation of Opioid Use Disorder Treatment (CONDUIT)". At the University of Pittsburgh, Dr. Rogal has launched the Dissemination and Implementation Science Collaborative (DISC), an interdisciplinary collaboration that crosses University schools and departments. In FY20, she became co-core director of two CTSI new modules for renewal, the Implementation Lab and the IMPACT Core.
- ✦ The efforts of **Robert E. Schoen, MD, MPH**, in early detection and prevention of colorectal cancer continue to pioneer new fronts to expand and improve colorectal screening, implementation, and quality. He is a lead investigator on multiple clinical research initiatives:
 - As a principal investigator and member of the executive committee for the National Cancer Institute's Early Detection Research Network, Dr. Schoen is collaborating with Drs. Kenneth Kinzler and Bert Vogelstein at Johns Hopkins University to evaluate a blood test for cancer that uses circulating tumor DNA (ctDNA).
 - Dr. Schoen and colleagues had previously published multiple papers using a natural language processing tool to analyze colonoscopy and pathology reports to measure physician quality. UPMC has now developed such a tool, and plans are underway to implement it for use in the UPMC system. The tool will measure adenoma detection rate (ADR), and other ancillary metrics including serrated adenoma and advanced adenoma detection.
 - The National Cancer Institute will fund a 15,000-patient randomized trial in conjunction with the NRG oncology group and NCORP (National Community Oncology Research Program). This study will evaluate intervals for surveillance colonoscopy after detection of one to two non-advanced adenomas. Dr. Schoen is the national principal investigator for the study, and **Jeffrey Deuker, MD, MPH**, is serving as the protocol co-chair.

- † **Eva Szigethy, MD, PhD**, reports that chronic GI conditions have high rates of behavioral comorbidities, but cost-effective, integrated, medical-behavioral care remains challenging. She is the lead investigator on two clinical research initiatives:
 - Dr. Szigethy's \$6.3 million PCORI study investigates effectiveness of the Division's specialty medical home, Total Care-IBD. This study will seek to identify how health technology can provide for accessible, scalable, high-quality, and integrated care for patients with chronic medical conditions like IBD. Two strategies for the delivery of integrated medical and behavioral care will be compared: 1) in-person care in the GI Clinic (TEAM); and 2) a technology-supported approach, in which care will be provided by telemedicine and digital apps primarily (TECH). She anticipates that outcomes may be scalable to other common chronic conditions.
 - Dr. Szigethy is also investigating how to provide more effective screening for Diseases of Gut-Brain Interaction (DGBI), especially related to common psychiatric disorders such as mood and anxiety disorders, PTSD, and substance abuse disorders. Dr. Szigethy, **David Levinthal, MD, PhD**, and their colleagues will use adaptive computerized testing and vocal and visual behavior markers to identify these disorders, and she and her team will investigate the effectiveness of coach-facilitated digital behavioral tools to improve mood, behavior, and pain. This study operates within the new UPMC Program for Gut-Brain Health (UPMC PGH) at the UPMC Mercy GI Outpatient Clinic.
- † • **Dhiraj Yadav, MD, MPH**, is co-leading three multi-institutional projects:
 - The PROCEED study is the first longitudinal, observational cohort study of chronic pancreatitis in the U.S. and is one of four cohorts that have been established by the ten-center U01 Consortium for the Study of Chronic Pancreatitis, Diabetes, and Pancreatic Cancer (CPDPC). Primary objectives include the establishment of a longitudinal research cohort of adult subjects to study chronic pancreatitis (CP) and its complications, estimate the risk of disease progression, test the predictive capability of candidate biomarkers for the diagnosis and prognosis of CP, and develop a platform for conducting biomarker, genetic, and mechanistic studies using clinical information and longitudinal biospecimens. Dr. Yadav is also the site PI for other CPDPC projects including the DETECT study, which will enroll subjects with either Type 2DM, DM related to CP, or pancreatic cancer to undergo a mixed meal tolerance test with a goal to develop a clinical test to differentiate between these conditions. He is also the site PI for an R01-funded ancillary study of the CPDPC, MINIMAP, which is evaluating novel MRI features to predict early changes in chronic pancreatitis.
 - The SpHincterotomy for Acute Recurrent Pancreatitis (SHARP) study is NIDDK-funded through a U01 consortium. Dr. Yadav is co-leading this 17-center international randomized clinical trial with two gastroenterologists from MUSC. The trial will aim to determine whether an ERCP with minor papilla sphincterotomy reduces the risk for subsequent pancreatitis in patients with recurrent acute pancreatitis and pancreas divisum, an issue that has been debated for more than 30 years. Study results will impact clinical practice directly.
 - ACCESS-AP is a case crossover study designed to examine the role of short-term increases in alcohol consumption and the risk of pancreatitis in patients who report regular drinking. This study is part of a focused program award from the Department of Defense. Results from this four-site study will inform tailored interventions to prevent pancreatitis recurrence and disease progression in regular drinkers. A biorepository will be established to uncover mechanisms of pancreatitis related to alcohol and smoking and to support translational studies proposed in award.

Faculty Research Interests and Activities

Robert E. Schoen, MD, MPH *Division Chief*

Dr. Schoen is a Professor of Medicine and Epidemiology and his research interests center on the early detection and prevention of colorectal cancer (CRC). He is a Principal Investigator in the PLCO cancer screening trial, a randomized trial of over 154,000 individuals that evaluated flexible sigmoidoscopy. He has used PLCO data to study surveillance colonoscopy utilization and yield, interval cancers, or cancers detected shortly after endoscopic procedures, as well as the risk of colorectal cancer among subjects with a family history of cancer. In collaboration with the Mayo Clinic in Minnesota, Dr. Schoen is the Principal Investigator of a multicenter randomized immunotherapy trial, evaluating a vaccine for prevention of recurrent adenomatous polyps. He is also a Principal Investigator for the Early Detection Research Network and collaborates with scientists nationally and internationally to identify biomarkers, including circulating tumor DNA and tissue-based markers, to detect and monitor cancer. Additionally, as part of, the Genetics and Epidemiology of Colorectal Cancer Consortium (GECCO), a consortium studying genetic and environmental risk factors for CRC, including genome-wide association studies, Dr. Schoen is conducting several exploratory studies to identify risk markers for surveillance colonoscopy.

Advisory Committee Memberships and Leadership Positions

- President, Pittsburgh Gut Club, 2008-present
- Executive Committee, Early Detection Research Network, 2016-present

Editorships

- Reviewer, Multiple journals (*Gastroenterology, Digestive Diseases and Sciences, Preventive Medicine, American Journal of Gastroenterology, Journal of the National Cancer Institute, Cancer Epidemiology, International Journal of Cancer, JAMA, Oncology, Gut*), 2007-present

Honors and Awards

- Honoree, Best Doctors, *Pittsburgh Magazine*, 2012-present

Steven R. Abo, MD

Dr. Abo is an Assistant Professor whose research interests include clinical research studies pertaining to the pathogenesis and treatment of irritable bowel syndrome. He also serves as the Director for the Center for Women's GI Health.

Advisory Committee Memberships and Leadership Positions

- Director, Center for Women's Digestive Health, Magee-Women's Hospital of UPMC, 2000-present

Gavin E. Arteel, PhD

Dr. Arteel's research focuses on the interaction between hepatotoxicants (e.g., arsenic) and lifestyle choices (e.g., obesity and alcohol) in the initiation and progression of chronic liver diseases. His current research foci are based on the understanding that transitional changes to the ECM proteome (i.e., "matrisome") play an underappreciated role in the initiation and progression of liver disease. He is developing computational tools to attempt to predict mechanism(s) and to develop biomarkers (or surrogate biomarkers) for use in the clinics.

Advisory Committee Memberships and Leadership Positions

- Member, American Association for the Study of Liver Diseases Review Committee, 2006-present
- Co-Director and Co-Founder, Enhancing MEntoring to Improve Research in Gastroenterology (EMERGE), Division of Gastroenterology, Hepatology and Nutrition, University of Pittsburgh, 2018-present
- Director, Pilot & Feasibility Core, Pittsburgh Liver Research Center, University of

Pittsburgh, 2018-present

- Co-Director, Second-Year Medical School Course, University of Pittsburgh School of Medicine, 2019-present

Professional Affiliations and Society Memberships

- Member, Research Society on Alcoholism, 2002-present
- Member, International Society for Biomedical Research on Alcoholism, 2002-present
- Member, Society of Toxicology, 2002-present
- Member, Ohio Valley Society of Toxicology, 2002-present
- Member, American Association for the Study of Liver Diseases, 2003-present
- Member, American Gastroenterological Association, 2010-present

Editorships

- Editorial Board, *Archives of Biochemistry and Biophysics*, 2003-present
- Editorial Board, *World Journal of Gastroenterology*, 2005-present
- Editorial Board, *Hepatology*, 2006-present
- Editorial Board, *Alcohol*, 2008-present

Major Lectureships and Seminars

- Visiting Professor, Jutendo University, Kenichi Ikejima, Japan, August 2019

Honors and Awards

- Alumni of the Year, Pharmacology-Toxicology Program, University of Wisconsin, Madison, WI, July 2019

Arthur M. Barrie III, MD, PhD

Dr. Barrie focuses on IBD patient outcomes and optimizing IBD treatment.

Advisory Committee Memberships and Leadership Positions

- Medical Director, Magee Infusion Center, 2017-present

Ramon Bataller, MD, PhD

As the Chief of Hepatology, Dr. Bataller's research interests include liver fibrosis and the mechanisms and determinants of mortality of alcoholic liver disease. He has performed translational studies primarily including human samples and experimental models of liver disease. A more recent research interest of Dr. Battaler involves his exploration of the global public health aspects of alcoholic liver disease and is the PI for an NIH-funded consortium (InTeam) for translational research of alcoholic hepatitis that seeks to identify molecular subtypes and novel targets for therapy.

Study Sections

- Permanent Member, Hepatobiliary Pathophysiology Study Section, NIH, 2018-present

Advisory Committee Memberships and Leadership Positions

- Principle Investigator (Overall), NIAAA-funded InTeam Consortium, 2013-present
- Member, American Association for the Study of Liver Diseases Education Committee,



Photo

As Chief of Hepatology, Dr. Bataller works with several liver faculty in the division: (Front row, left to right) Obaid S. Shaikh, MD; Naudia Jonassaint, MD, MHS; Ramon Bataller Alberola, MD, PhD; Vikrant Rachakonda, MD; (Back row, left to right) Mordechai Rabinovitz, MD; Shahid Malik, MD; Andres Duarte-Rojo, MD, MS, DSc; and Michael Dunn, MD.

2016-present

Professional Affiliations and Society Memberships

- Member, European Association for the Study of the Liver, 2009-present
- Member, American Association for the Study of Liver Disease, 2013-present
- Member, Research Society of Alcoholism, 2013-present
- Member, International Society in Biomedical Research in Alcoholism, 2013-present
- Member, American College of Gastroenterology, 2016-present
- Member, Latino-American Association for the Study of the Liver, 2016-present

Editorships

- Editorial Board, *World Journal of Gastroenterology*, 2006-present
- Editorial Board, *Gastroenterology Research and Practice*, 2009-present
- Editorial Board, *Nature Reviews in Gastroenterology and Hepatology*, 2012-present
- Co-editor, *Journal of Hepatology*, 2014-present

Major Lectureships and Seminars

- Course Director, 2019 Annual Update in Medical Hepatology, Pittsburgh, PA, December 2019

Honors and Awards

- Honoree, Best Doctors, *Pittsburgh Magazine*, 2019-present

Jaideep Behari, MD, PhD

Dr. Behari's research investigates the role of intracellular signaling pathways in the pathogenesis of liver diseases. He is also interested in nonalcoholic fatty liver disease, alcoholic fatty liver disease and hepatocellular carcinoma.

Advisory Committee Memberships and Leadership Positions

- Co-director, Liver Translational Research Program, Liver Pancreas Institute, University of Pittsburgh, 2017-present
- Director, Fatty Liver, Obesity, & Wellness (FLOW) Clinic, UPMC Center for Liver Diseases, 2017-present
- Director, Fatty Liver Coalition, Community Liver Alliance, 2017-present

Professional Affiliations and Society Memberships

- Member, American Gastroenterological Association, 2005-present
- Member, American Association for the Study of Liver Diseases, 2005-present
- Member, The Obesity Society, 2018-present

Major Lectureships and Seminars

- Course Director, Community Liver Alliance NAFLD Public Forum, August 2019

Julianne I. Beier, PhD

Dr. Beier's research focus is on environmental vinyl chloride exposure in the context of existing underlying liver disease. Clearly high occupational exposure to vinyl chloride is directly hepatotoxic; what is less well clear is the impact of lower environmental exposure on exacerbating existing liver disease. Given the fact that a significant portion of the population has risk factors for liver disease (most commonly, obesity), and that 30% of the US population has elevated indices of liver damage, any potential impact of low environmental exposure could be dramatic. Dr. Beier's findings indicate that indeed vinyl chloride will exacerbate liver damage caused by another factor. This work shifts the paradigm of current risk assessment for not only this compound, but any other environmental agent that may potentially damage the liver.

Advisory Committee Memberships and Leadership Positions

- Abstract Reviewer, American Association for the Study of Liver Diseases Annual Liver Meeting, 2015-present

- Abstract Reviewer, Digestive Disease Week, 2015-present

Professional Affiliations and Society Memberships

- Member, American Association for the Study of Liver Diseases, 2007-present
- Member, International Society for Hepatic Sinusoidal Research, 2010-present
- Member, Society of Toxicology, 2013-present
- Member, Society of Toxicology, Mechanisms Specialty Section, 2015-present
- Member, Society of Toxicology, Women in Toxicology Section, 2015-present
- Member, Allegheny-Erie Society of Toxicology, 2019-present

David G. Binion, MD

Dr. Binion is an inflammatory bowel disease (IBD) investigator whose career has focused on defining the cellular and molecular mechanisms underlying human chronic gut inflammation and translating that knowledge into improved care for patients suffering from Crohn's disease and ulcerative colitis. His current work centers on Big Data analytics and the development and transformation of the UPMC IBD Registry, a prospective, multi-year, longitudinal natural history registry database of >3,000 consented IBD patients, into a metadata platform for scientific discovery. Through a collaboration with computer scientists from the University of Pittsburgh School of Information Science, this relational database continuously curates and transforms observational clinical information from the electronic medical record (EMR) and maintains >10,000 person-years of associated metadata in a secure data warehouse. Areas of active investigation include: Developing prognostic biomarkers of IBD severity, characterizing the impact of diet and nutrition on IBD natural history, identifying biomarker patterns to predict development of dysplasia/cancer in IBD, identifying predictive biomarkers to guide therapeutic selection in IBD, comparative effectiveness studies in IBD maintenance therapy, defining the impact of surgical anastomotic technique on longterm clinical outcomes in Crohn's disease, use of healthcare charge data as a comprehensive phenotype, defining the impact of *Clostridium difficile* infection on IBD natural history, characterizing extra-intestinal manifestations--including anemia and autonomic dysfunction--on the natural history of IBD, developing clinical decision support tools to optimize IBD care, and implementing precision medicine.

Advisory Committee Memberships and Leadership Positions

- Member, Executive Board, Crohn's and Colitis Foundation of America, 1999-present
- Director, Translational Inflammatory Bowel Disease Research, University of Pittsburgh, 2008-present
- Member, Nutrition Subcommittee, UPMC Presbyterian-Shadyside Hospitals, 2013-present
- Director, Nutrition Support Service, 2013-present
- Medical Director, GI and Nutrition Therapy (GIANT), 2013-present

Editorships

- Editorial Advisory Board, *World Journal of Gastroenterology*, 2007-present
- Editorial Advisory Board, *American Journal of Gastroenterology*, 2007-present
- Editorial Advisory Board, *Clinical and Translational Science*, 2008-present
- Editorial Advisory Board, *Clinical Gastroenterology and Hepatology*, 2014-present

Honors and Awards

- Honoree, Best Doctors in America, 2002-present
- Honoree, Best Doctors, *Pittsburgh Magazine*, 2014-present

Randall E. Brand, MD

Dr. Brand is a physician-scientist with an extensive background in pancreatic diseases, and his research focuses primarily on the early diagnosis of pancreatic cancer and cystic lesions of the pancreas. He also studies familial pancreatic cancer and other hereditary GI disorders. He is leader of the University of Pittsburgh's Pancreatic Adenocarcinoma Gene-Environment Registry (PAGER). The

biospecimen repository, developed as part of the PAGER study, is nationally recognized and serves as an excellent resource for multiple NIH/NC-funded projects as well as for national and international collaborations with outside researchers. Dr. Brand is a key contributor to the Early Detection Research Network, especially in research related to pancreatic cancer and cystic neoplasms. He is currently funded in the network as a principal investigator to lead both a multi-center Pancreatic Cancer Clinical Validation Center and a Biomarker Developmental Laboratory.

Advisory Committee Memberships and Leadership Positions

- Member, GI Fellowship Committee, University of Pittsburgh, 2007-present
- Member, GI Fellowship Planning Committee, UPMC, 2007-present
- Member, Pancreatic Cancer Clinical Pathways Committee, University of Pittsburgh Medical Center, 2008-present
- Member, Collaborative Alliance for Pancreatic Education and Research, 2009-present
- Member, Health Sciences Bridge Funding Committee, 2010-present
- Chief, Therapeutic Endoscopy, Division of Gastroenterology & Hepatology, University of Pittsburgh Medical Center, 2011-present
- Advisory Board, Collaborative Alliance for Pancreatic Education and Research, 2012-present
- Member, Advisory Committee, Pancreas Section Councilor, American Gastroenterology Association, 2013-present
- Appointed Member, NCI Pancreas Task Force, 2016-2020
- Governor of Western PA, American College of Gastroenterology, 2016-present
- President Elect, Collaborative Groups of America on Inherited Gastrointestinal Cancers, 2019-2020

Editorships

- Ad hoc Reviewer, *Clinical Cancer Research*, 2000-present
- Ad hoc Reviewer, *American Journal of Human Genetics*, 2001-present
- Ad hoc Reviewer, *Pancreas*, 2001-present
- Ad hoc Reviewer, *Cancer Epidemiology Biomarkers & Prevention*, 2002-present
- Editorial Board, *Nature Clinical Practice Gastroenterology & Hepatology*, 2006-present
- Advisory Board, *Nature Reviews Gastroenterology and Hepatology*, 2006-present
- Ad hoc Reviewer, *Gut*, 2007-present
- Editorial Board, *Annals of Gastroenterology and Hepatology*, 2010-present
- Ad hoc Reviewer, *Familial Cancer*, 2010-present
- Editorial Board, *Case Reports in Gastroenterology*, 2011-present
- Ad hoc Reviewer, *Clinical Colorectal Cancer*, 2011-present

Major Lectureships and Seminars

- Course Director and Teaching Faculty, GI Fellowship State of the Art Lecture Series, 2013-present

Honors and Awards

- Courage Award, National Pancreas Foundation, NPF Gala, Pittsburgh, PA, September 2019
- Fellow, American Gastroenterological Association, 2007-present
- Honoree, Best Doctors, *Pittsburgh Magazine*, 2012-present

Rhonda M. Brand, PhD

Dr. Brand is engaged in mucosal research related to dermatology and gastroenterology.

Study Sections

- Reviewer, NIH Study Section, AAR ZRGAARR-P, November 2019

Professional Affiliations and Society Memberships

- Member, International AIDS Society, 2016-present

Jennifer S. Chennat, MD

Dr. Chennat is an Associate Professor of Medicine and her research comprises Barrett's esophagus neoplasia, endotherapies for pancreatitis, novel imaging techniques such as confocal endomicroscopy, and endoscopic devices and product designs related to guided visualization and targeted tissue ablation. Her clinical focus is patients who require advanced endoscopic evaluation for disorders such as complex pancreatitis, Barrett's esophagus, and gastrointestinal lumen and pancreato-biliary cancer staging.

Advisory Committee Memberships and Leadership Positions

- Director, Therapeutic Endoscopy, Division of Gastroenterology, Hepatology and Nutrition, UPMC, 2011-present
- Member, American Society for Gastrointestinal Endoscopy Innovation, Training, & Technology Committee, 2012-present
- Member, Auto Islet Cell Transplantation Committee, UPMC, 2012-present

Professional Affiliations and Society Memberships

- Member, American Medical Association, 2001-present
- Member, American College of Physicians, 2004-present
- Member, American Society for Gastrointestinal Endoscopy, 2004-present
- Member, American Gastroenterological Association, 2004-present
- Member, American College of Gastroenterology, 2004-present
- Member, American Association for the Study of Liver Diseases, 2004-present
- Member, APA, 2010-present
- Member, IAP, 2010-present

Editorships

- Editorial Board, *Society for Gastrointestinal Intervention Journal*, 2012-present

Kapil B. Chopra, MD

Dr. Chopra's research interests center on the cholestatic liver diseases primary sclerosing cholangitis and primary biliary cirrhosis. He has participated in collaborative research projects with the Starzl Transplant Institute and the Liver Cancer Center, and has served as co-investigator on several multi-center trials investigating novel therapies and approaches to the management of viral hepatitis. His research has culminated in 50 scientific presentations at national and international conferences. Dr. Chopra was a co-investigator on numerous NIH-funded research studies including PSC Resource of Genetic Risk, Environment and Synergy Studies (PROGRESS) (Principal Investigator: Dr. K Lazaridis, Mayo Clinic College of Medicine); A Preliminary Study of the Efficacy and Safety of Carbamazepine in Severe Liver Disease Due to Alpha-1-Antitrypsin Deficiency (Principal Investigator: Dr. David Perlmutter, Children's Hospital, Pittsburgh); and a prospective study comparing surgical therapies versus interventional radiologic interventions for management of gastrointestinal bleeding in patients with chronic liver disease. In recognition of his role as a mentor and his contributions to the Clinical Research Scholars Program (CRSP) of the Clinical and Translational Science Institute (CTSI), he was offered a secondary appointment in Clinical and Translational Science at the University of Pittsburgh in September 2012.

Advisory Committee Memberships and Leadership Positions

- Member, UPMC Presbyterian/ Shadyside Hospitals Transplant Patient Safety Council, 2010-present
- Board Member, Community Liver Alliance, 2014-present
- Medical Director, Liver Transplantation, 2016-present
- Member, Pharmacy and Therapeutics Committee, UPMC Health Plan, 2016-present
- Member, UPMC Mercy Credential Committee, 2019-present
- Member, UPMC Mercy Patient Safety Peer Review Committee, 2019-present
- Vice Chair, Department of Medicine, UPMC Mercy, 2019-present

Professional Affiliations and Society Memberships

- Primary Physician, Liver Transplantation Program, UNOS, 2017-present

Andres Duarte-Rojo, MD, DSc

Dr. Duarte-Rojo conducts clinical and translational research in disorders of physical function and exercise in advanced liver disease. He is also interested in clinimetrics, with an emphasis on the use of noninvasive assessment of liver disease, and the development of methods to predict clinical outcomes.

Professional Affiliations and Society Memberships

- Member, American Gastroenterological Association, 2009-present
- Member, American Association for the Study of Liver Diseases, 2010-present
- Member, Mayo Alumni Association, 2011-present
- Member, European Association for the Study of the Liver, 2013-present
- Member, American College of Physicians, 2014-present
- Member, International Society of Hepatic Encephalopathy & Nitrogen Metabolism, 2016-present
- Member, American Society of Transplantation, 2017-present

Editorships

- Editorial Board, *Annals of Hepatology*, 2014-present
- Editorial Board, *Clinical & Translational Investigation*, 2015-present
- Editorial Board, *Revista de Gastroenterologia de Mexico*, 2015-present
- Editorial Board, *Liver Transplantation*, 2019-present
- Editorial Board, *Clinical Gastroenterology & Hepatology*, 2019-present

Honors and Awards

- Member, F1000 Prime, 2016-present

Jeffrey M. Dueker, MD, MPH

Dr. Dueker's research interests focus on quality improvement and patient safety, healthcare utilization, and advancements in medical education.

Major Lectureships and Seminars

- Course Director, IBD UNITE (Unify, Network, Inspire, Treat, & Educate) Patient Education Conference, 2018-2019

Richard H. Duerr, MD

A Professor of Medicine, Human Genetics, and Clinical and Translational Science at the University of Pittsburgh, Dr. Duerr holds the Inflammatory Bowel Disease Genetic Research Chair and is Co-Director and Scientific Director of the University of Pittsburgh Medical Center Inflammatory Bowel Disease Center--and has been involved in research related to inflammatory bowel disease throughout his career. He leads one of six genetic research centers that comprise the NIH/NIDDK Inflammatory Bowel Disease Genetics Consortium. His research program has had uninterrupted funding from the NIH, CCFA, and other foundations since 1995. He was recently appointed Associate Chief Scientist, Translational Research on the Leadership Team of the Crohn's & Colitis Foundation of America (CCFA) IBD Plexus research and information exchange platform. Dr. Duerr is a member of the American Gastroenterological Association, the American Society of Human Genetics, and CCFA. He has been an invited lecturer in local, national, and international venues, and he has published original inflammatory bowel disease genetics research articles in journals such as *Nature*, *Science*, *Nature Genetics*, *American Journal of Human Genetics*, and *Human Molecular Genetics*. He has served on grants review committees for the NIH and CCFA.

Advisory Committee Memberships and Leadership Positions

- Steering Committee, NIH/NIDDK IBD Genetics Consortium Genotyping Committee,

2003-present

- Co-Director & Scientific Director, UPMC Inflammatory Bowel Disease Center, 2008-present
- Management Committee, International Inflammatory Bowel Disease Genetics Consortium, 2008-present
- Associate Chief Scientist for Translational Research, IBD Plexus Leadership Team, Crohn's & Colitis Foundation, 2014-present

Professional Affiliations and Society Memberships

- Physician Member, Crohn's and Colitis Foundation, 2007-present

Michael A. Dunn, MD

In a collaboration with colleagues from the Thomas E Starzl Transplantation Institute and the School of Health and Rehabilitation Sciences, Dr. Dunn leads a UPMC hospital-funded initiative to improve the fitness and activity of liver transplant candidates with the objective of producing a 20% decrease in waitlist hospital days and waitlist mortality. Wearable personal-activity monitoring and quantitation of muscle mass with imaging segmentation analysis are being explored as enabling technologies. Dr. Dunn formed and now leads the FLEXIT (Fitness, Life Enhancement and Exercise in Transplantation) Consortium of investigators at the University of California San Francisco, Mayo Clinic Arizona, Cleveland Clinic, Duke University, University of Alberta, and University of Pittsburgh. The consortium is engaged in multi-center collaborations to define, prevent, and reverse physical decline in cirrhosis. Dr. Dunn helped Dr. Binion design and continues to assist in operating a Department of Defense-supported searchable prospective electronic clinical registry for our inflammatory bowel disease team. It has enabled significant advances in disease modeling with over 20 major publications in the last three years. He also serves as the site Principal Investigator of an industry-sponsored FDA registration trial of obeticholic acid therapy for primary sclerosing cholangitis.

Advisory Committee Memberships and Leadership Positions

- Member, Board of Directors, Central Pennsylvania Veterans Community Initiatives, 2005-2020
- Policy Co-Chair, Pennsylvania Diabetes Action Plan, 2006-2020
- Member, Board of Directors, Easter Seals of Western Pennsylvania, 2008-present
- Member, Advisory Panel, U.S. Army Surgeon General on Military Medicine and Prevention, 2008-present
- Member, Board of Directors, National Flag Foundation, 2012-present
- Member, American Association for the Study of Liver Diseases Abstract Review Committee, 2013-2020
- National Medical Society Service Officer, American Association for the Study of Liver Diseases Federal Agencies Liaison Committee, 2016-2020

Honors and Awards

- Fellow, American Association for the Study of Liver Disease, 2017-present

Kenneth E. Fasanella, MD

Dr. Fasanella is an Assistant Professor of Medicine whose research includes studying surveillance and risk stratification of pancreatic cystic lesions; biomarkers of risk in Barrett's esophagus; outcomes of endoscopic treatment of high-risk Barrett's esophagus and Barrett's-related neoplasia; appropriate surveillance intervals of gastric stromal tumors; and educational research in endoscopic feedback tools.

Advisory Committee Memberships and Leadership Positions

- Member, Education Review Committee, National Pancreas Foundation, 2003-present
- Member and Chair, Common Fellowship Curriculum Committee, 2007-present
- Member, Residency Selection Committee, Department of Medicine, University of

Pittsburgh School of Medicine, 2007-present

- Member, Selection Committee, University of Pittsburgh School of Medicine, 2009-present
- Course Director, GI Grand Rounds, UPMC, 2012-present
- Co-director, Endoscopic Ultrasound Program, UPMC Liver Pancreas Institute, 2015-present

Professional Affiliations and Society Memberships

- Member, North American Pancreas Study Group, 2005-present

Swaytha R. Ganesh, MD

Dr. Ganesh is an Assistant Professor of Medicine investigating issues related to living donor liver transplants and drug metabolism in patients post-living donor transplant. Dr. Ganesh also researches the safety and preliminary efficacy of donor-derived regulatory dendritic cell infusion and immunosuppression withdrawal in living donor transplant recipients, as well as Remodulin and ischemic reperfusion injury in patients post-liver transplant.

Professional Affiliations and Society Memberships

- Member, American College of Physicians, 2016-present
- Member, American Medical Association, 2016-present
- Member, American College of Gastroenterology, 2016-present

Julia B. Greer, MD, MPH

Dr. Greer investigates cancer epidemiology as it relates to colon and pancreatic cancer, acute and chronic pancreatitis, nutrition, inflammatory bowel disease risk factors and case management, bioinformatics, and medical education in digestion and nutrition.

Professional Affiliations and Society Memberships

- Member, Wayne Fusaro Pancreatic Cancer Research Foundation, 2005-present
- Member, Minority Affairs Consortium, 2006-present
- Member, Complementary Medicine Interest Group, Integrative Medicine Center Pittsburgh, 2007-present
- Admissions Committee, University of Pittsburgh School of Medicine, 2012-present
- Member, NBME Article Reviewer for USMLE, 2012-present

Editorships

- Editorial Board, *World Journal of Gastroenterology*, 2006-present
- Editor, *Pitt Digest*, 2012-present
- *Major Lectureships and Seminars*
- Guest speaker, Gilda's Club of Southwestern Pennsylvania, 2008-present

Janet R. Harrison, MD

Dr. Harrison's research interests include Inflammatory bowel disease and women's health.

Editorships

- Editor, *Pitt Digest*, 2008-present

Jing Hu, PhD

Using genetically engineered mouse models of colorectal cancers (CRC), Dr. Hu's lab focuses on the identification and validation of crucial molecular changes that confer high-risk for tumor progression in mutant BRAF-induced serrated intestinal tumorigenesis. Her lab works to identify novel factors essential for serrated CRC development that can serve as pharmacological targets for the prevention of serrated CRC at an early and curable stage. Dr. Hu's lab also works to identify and validate novel functionally relevant and druggable targets for PDAC.

Study Sections

- Ad hoc Reviewer, Italian Ministry of Health Research Proposals, 2015-present
- Member, NIH ZRG-1 CB-s (02)/Special Emphasis Panel, 2019

Professional Affiliations and Society Memberships

- Member, American Association for Cancer Research, 2002-present

Elyse R. Johnston, MD

Dr. Johnston's research investigates enhanced methodology for quality healthcare performance and patient safety.

Advisory Committee Memberships and Leadership Positions

- Gastroenterology Faculty Quality Leader, Division of Gastroenterology, Hepatology and Nutrition, 2018-present

Professional Affiliations and Society Memberships

- Member, American College of Gastroenterology, 2015-present
- Member, American Gastroenterological Association, 2016-present

Naudia L. Jonassaint, MD, MHS

Dr. Jonassaint researches specific biologic markers involved in the development and progression of liver disease in both the pre- and post- transplant populations, with a focus on disparities in liver transplant outcomes. This research program also explores why some patients experience rapid fibrosis progression or accelerated graft loss post-transplant.

Advisory Committee Memberships and Leadership Positions

- Advisory Member, Johns Hopkins Second Decade Society, 2009-present
- Member, American Association for the Study of Liver Diseases Diversity Committee, 2016-present
- Medical Director, Center for Liver Diseases (CLD), Division of Gastroenterology, Hepatology and Nutrition, University of Pittsburgh, 2017-present

Asif Khalid, MD

An Associate Professor of Medicine, Dr. Khalid's research involves pancreatic tumors and cysts, EUS, ERCP, pancreatitis, molecular diagnoses, and early cancer detection.

Advisory Committee Memberships and Leadership Positions

- Member, Adverse Events & Procedures Committee, Oakland Veterans Administration Medical Center, 2004-present

Professional Affiliations and Society Memberships

- Member, American Society for Gastrointestinal Endoscopy, 2008-present

Honors and Awards

- Fellow, American College of Gastroenterology, 2008-present

Michael J. Kingsley, MD

As a Clinical Assistant Professor of Medicine, Dr. Kingsley is interested in GI motility clinical trials and translational functional bowel studies.

Professional Affiliations and Society Memberships

- Member, American College of Gastroenterology, 2013-present
- Member, American Gastroenterological Association, 2013-present
- Member, American Society for Gastrointestinal Endoscopy, 2013-present
- Member, American Neurogastroenterology and Motility Society, 2016-present

David J. Levinthal, MD, PhD

Dr. Levinthal's lab uses both neuroanatomical tracing and neurophysiological techniques to explore the neural basis for central nervous system influences over autonomic regulation in both health and disease. Dr. Levinthal centers his research on the neural mechanisms by which the cerebral cortex influences GI tract function. Initial studies have uncovered the surprising finding that a visceromotor map of sympathetic function is embedded within the classic cortical somatotopic map of motor function. Further work is aimed at understanding the cortical regions that influence vagal function. The goal of this effort is to use the visceral maps to guide brain stimulation as a means to influence GI tract function. This line of work will lead to the development of brain-based therapies for those with forms of severe GI dysfunction refractory to standard treatments.

Advisory Committee Memberships and Leadership Positions

- Member, Quality Initiative Steering Committee, Division of Gastroenterology, Hepatology, and Nutrition, Department of Medicine, University of Pittsburgh School of Medicine, 2014-present
- Invited Member, Adult Cyclic Vomiting Syndrome Clinical Guidelines Development Committee, co-sponsored by Cyclical Vomiting Syndrome Association and American Neurogastroenterology and Motility Society, 2015-2019
- Member, GI Research (non-T32) Steering Committee, Division of Gastroenterology, Hepatology, and Nutrition, Department of Medicine, University of Pittsburgh School of Medicine, 2015-present
- Instructor, Dean's Summer Research Programs (DRSP) for medical students, University of Pittsburgh School of Medicine, 2015-present
- Clinical Expert Moderator, Neurogastroenterology & Motility Section, American Gastroenterological Association Community Online Member Communication Platform, 2017-present
- Membership Committee, American Psychosomatic Society, 2017-present
- Co-Director, UPMC Program for Gut-Brain Health (UPMC PGH), Division of Gastroenterology, Hepatology and Nutrition, 2019-present
- Elected Councilor, American Neurogastroenterology and Motility Society (ANMS), 2020-present

Professional Affiliations and Society Memberships

- Member, Society for Neuroscience, 1999-present
- Member, American College of Gastroenterology, 2010-present
- Member, American Gastroenterological Association, 2012-present
- Member, American Neurogastroenterology and Motility Society, 2014-present
- Member, American Psychosomatic Society, 2015-present

Editorships

- Associate Editor, *Clinical and Translational Gastroenterology*, 2017-present
- Editorial Board, *Frontier in Neuroscience: Autonomic Neuroscience*, 2018-present
- Editorial Board, *Physiological Reports*, 2018-present
- Ad Hoc Reviewer, *American Journal of Gastroenterology*, 2018-present
- Ad Hoc Reviewer, *Neurogastroenterology and Motility*, 2018-present
- Ad Hoc Reviewer, *Clinical and Translational Gastroenterology*, 2018-present
- Ad Hoc Reviewer, *World Journal of Gastroenterology*, 2018-present
- Ad Hoc Reviewer, *ACG Case Reports Journal*, 2018-present
- Ad Hoc Reviewer, *European Journal of Gastroenterology & Hepatology*, 2018-present
- Ad Hoc Reviewer, *Experimental Brain Research*, 2018-present
- Ad Hoc Reviewer, *Cerebral Cortex*, 2018-present
- Ad Hoc Reviewer, *Journal of Neuroscience*, 2018-present
- Ad Hoc Reviewer, *Acta Neurologica Scandinavica*, 2018-present
- Ad Hoc Reviewer, *International Neuropsychiatric Disease Journal*, 2018-present

- Ad Hoc Reviewer, *Nephrology Dialysis Transplantation*, 2018-present
- Ad Hoc Reviewer, *British Journal of Pharmaceutical Research*, 2018-present
- Ad Hoc Reviewer, *British Journal of Medicine and Medical Research*, 2018-present
- Ad Hoc Reviewer, *Irish Journal of Medical Science*, 2018-present
- Ad Hoc Reviewer, *Journal of Clinical Pharmacy and Therapeutics*, 2018-present
- Ad Hoc Reviewer, *Journal of Basic and Applied Research International*, 2018-present

Honors and Awards

- Research Recognition Award, Basic/Translational Science Investigator, International Foundation for Gastrointestinal Disorders (IFFGD), September 2019

Yang Liu, PhD

The laboratory of Dr. Yang Liu works to develop personalized approaches to improve early cancer detection. Current clinical practice relies on a one-size-fits-all approach, which screens the entire at-risk population to identify a small percentage of truly high-risk patients, as with colonoscopy and mammography. Frequent, invasive surveillance of patients at risk for developing cancer carries financial, physical, and emotional burdens and can do more harm than good to the patients. Given that nuclear architecture is one of the hallmarks in cancer diagnostics, the lab's premise is based on nanoscale nuclear architecture mapping to identify earlier and more accurate markers and to understand the characteristic alteration of nanoscale

(i.e., less than 100 nm) nuclear architecture in cancer initiation and progression. Current tools to visualize nuclear architecture are mostly limited to microscale. The lab's multi-disciplinary team integrates optics, physics, engineering, bioinformatics, chemistry, biology, and clinical medicine, and develops imaging technologies to address this highly unmet clinical need. Current projects include: (1) Development of clinically applicable imaging technology for the high-throughput nanoscale nuclear architecture mapping (nanoNAM) of clinical samples to predict early-cancer progression in inflammatory bowel disease (IBD), Barrett's esophagus and breast pre-cancerous lesions prior to the detection of clinically significant lesions; (2) Development of high-throughput super-resolution fluorescence nanoscopy (STORM, PALM) for nanoscale imaging of chromatin organization and epigenetics in cancer initiation and progression; and, (3) Development of 3D super-resolution fluorescence nanoscopy for imaging thick tissue.

Advisory Committee Memberships and Leadership Positions

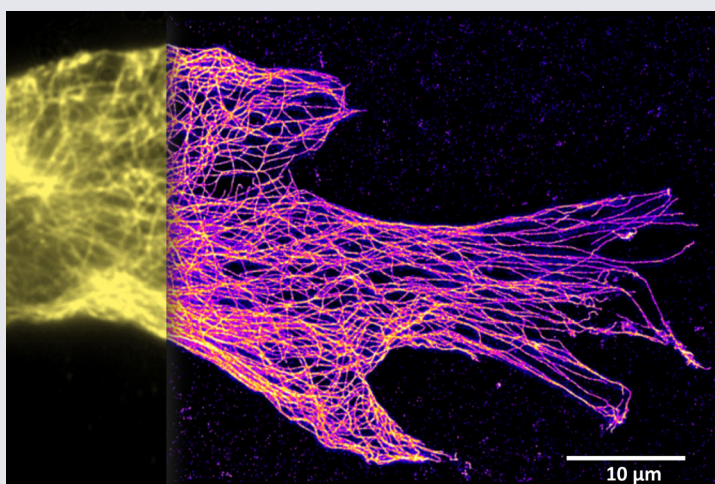
- Consultant, NanoVision Diagnostics, 2014-present
- Course Director, GI Research Rounds, Division of Gastroenterology, Hepatology, and Nutrition, Department of Medicine, University of Pittsburgh School of Medicine, 2015-present

Professional Affiliations and Society Memberships

- Member, Optical Society of America, 2003-present
- Member, International Society for Optical Engineering, 2003-present

Editorships

- Editorial Board, *Scientific Reports*, 2016-present



Photo

Dr. Liu is currently developing high-throughput super-resolution fluorescence nanoscopy, including WindSTORM, for imaging of chromatin organization and epigenetics in cancer initiation and progression. Here, conventional imaging on the left is compared to the imaging achieved through WindSTORM on the right.

Shahid M. Malik, MD

Dr. Malik's research focuses on outcomes in patients with end stage liver disease/cirrhosis and post-liver transplant.

Advisory Committee Memberships and Leadership Positions

- Course Director, Hepatology Case Conference Series, 2011-present
- Co-Director, Portal Hypertension Case Conference, 2012-present
- Co-Director, Liver Outreach Program, 2012-present
- Program Director, Transplant Hepatology Fellowship Program, 2018-present

Professional Affiliations and Society Memberships

- Member, American Association for the Study of Liver Diseases, 2010-present
- Member, PA Society of Gastroenterology, 2014-present

Editorships

- Ad hoc Reviewer, British Medical Journal, 2012-present
- Ad hoc Reviewer, *American Journal of Transplantation*, 2012-present
- Member, *GI Fellowship Education Committee*, 2012-present
- Ad hoc Reviewer, *Liver Transplantation*, 2013-present

James B. McGee, MD

An Associate Professor of Medicine, Dr. McGee's research efforts center on the effectiveness of technology-based education, with a focus on simulation and web-based learning. This research applies virtual patient simulation, technical standards, and education analytics (big data) to improve clinical decision-making and educational outcomes.

Advisory Committee Memberships and Leadership Positions

- Member, Council on Academic Computing (University-level Committee), 2003-present
- Member, Curriculum Development and New Initiatives Committee, 2004-present
- Member, Computer Technology Subcommittee, American Gastroenterological Association, 2004-present
- Advisory Board, Health Sciences Online, 2005-present
- Reviewer, Association of American Medical Colleges, 2005-present
- Reviewer, American Medical Informatics Association, 2005-present
- Chairman, Consortium on Medical Education Technology, American Association of Medical Colleges, 2005-present
- Chairman, Working Group on Virtual Patients, MedBiquitous, 2007-present
- Executive Committee, MedBiquitous, 2007-present
- Member, LCME Task Force, American Association of Medical Colleges, 2007-present
- Course Director, Innovative Teaching Strategies: Distance Learning, Web-Based Teaching and Simulation, Master's in Medical Education Curriculum, University of Pittsburgh, 2014-present
- Member, Emerging Technologies Task Force, American Gastroenterological Association, 2015-present

Editorships

- Editorial Board, American Association of Medical Colleges, MedEdPortal, 2006-present
- Reviewer, *Medical Teacher (journal)*, 2006-present
- Reviewer, *International Journal of Medical Informatics*, 2007-present
- Editor for Online Education, American Gastroenterological Association, 2007-present
- Editorial Board, *International Journal of Medical Informatics*, 2007-present

Honors and Awards

- Member, Academy of Master Educators, University of Pittsburgh School of Medicine, 2007-present

Kevin M. McGrath, MD

Dr. McGrath investigates endotherapy for the management of Barrett's esophagus and superficial esophageal cancer, evaluation of pancreatic cystic lesions and cyst aspirate analysis, and EUS-guided tissue acquisition.

Advisory Committee Memberships and Leadership Positions

- Course Director, EUS Conference, 2004-present
- Co-Director, Barrett's Esophagus Specialty Treatment Clinic, UPMC, 2008-present
- Leader, GI Procedure Reviews, Gastroenterology Fellows/Peer Faculty, 2008-present

Professional Affiliations and Society Memberships

- Member, American College of Gastroenterology, 1998-present

Editorships

- Editorial Board, *Digestive Diseases and Science*, 2002-present
- Ad hoc Reviewer, *Endoscopy*, 2005-present
- Editorial Board, *Diseases of the Esophagus*, 2006-present
- Editorial Board, *Journal of Clinical Gastroenterology*, 2006-present
- Editorial Board, *Pancreatology*, 2006-present
- Editorial Board, *Journal of Clinical Gastroenterology*, 2006-present
- Ad hoc Reviewer, *Journal of Clinical Oncology, Pancreatology, and Gastrointestinal Endoscopy*, 2006-present
- Ad hoc Reviewer, *Digestive and Liver Disease*, 2007-present
- Ad hoc Reviewer, *Scandinavian Journal of Gastroenterology*, 2008-present
- Ad hoc Reviewer, *Annals of Thoracic Surgery*, 2009-present
- Editorial Review Board, *Gastrointestinal Endoscopy*, 2012-present
- Ad hoc Reviewer, *Gastroenterology and Hepatology*, 2013-present
- Ad hoc Reviewer, *American Journal of Gastroenterology*, 1998-present

Honors and Awards

- Honoree, Best Doctors, *Pittsburgh Magazine*, 2012-present

Alex H. Myint, MD

Dr. Myint's research interests focus on liver disease, cirrhosis, and liver transplantation.

Professional Affiliations and Society Memberships

- Member, American Gastroenterological Association, 2014-present
- Member, American College of Gastroenterology, 2014-present
- Member, American Society of Transplantation, 2016-present
- Member, American Association for the Study of Liver Diseases, 2016-present

Stephen J. D. O'Keefe, MD, MSc

Dr. O'Keefe performs translational research into the physiological and pathophysiological responses to feeding and nutritional deprivation. He has received NIH R01 grant support for his studies on the physiological effects of feeding in pancreatic enzyme synthesis in humans with and without disease, the optimal feeding in patients with severe acute pancreatitis, and, most recently, the role of diet, the microbiome, and its metabolites in determining colon cancer risk in extreme-risk Alaska Natives, high-risk African Americans (AA), and minimal risk rural South Africans (NA). His pivotal 2015 study in *Nature Communications* showed that switching the diets of AA and NA (i.e., Americans were given a traditional African diet high in fiber, low in meat and fat, while Africans were given a westernized diet high in meat and fat and low in fiber) led to profound changes in the colonic microbiome and its metabolome and reciprocal changes in colonic mucosal biomarkers of cancer risk within two weeks. This supports the hypothesis that diet drives colon cancer risk and that it is largely preventable by a high fiber diet. Studies are underway in Alaska to determine whether fiber supplementation will annul the health disparity and extreme rates of colon cancer risk and mortality.

in Alaska Natives. Finally, Dr. O’Keefe is partnering with the University of Stellenbosch in South Africa to direct the African Microbiome Institute to study the ecology of the microbiome through the Faculties of Medicine, Agrisciences, and Plant Biology, with the overarching aim of improving the health of all Africans.

Advisory Committee Memberships and Leadership Positions

- Director, African Microbiome Institute, Stellenbosch University, 2017-present
- Executive Committee & Head of Cancer Microbiome Group, Center for Medicine & the Microbiome, University of Pittsburgh, 2017-present
- Councilor, American Gastroenterological Association, 2018-2020
- Nominating Committee, Nutrition & Obesity Section, American Gastroenterological Association, 2018-2020

Editorships

- Associate Editor, *Frontiers in Gastrointestinal Physiology & Science*, 2010-present
- Associate Editor in Chief, *World Journal of Gastroenterology*, 2011-present
- Editorial Board, *Gastroenterology Research & Practice*, 2013-present

Major Lectureships and Seminars

- Plenary Speaker, P-POD Biennial International Conference on Plant Based Foods (Virtual), September 2019
- Course Director, Stellenbosch University, First Stellenbosch University International Workshop & Symposium on the Microbiome, South Africa, November 2019

Michael A. Pezzone, MD, PhD

Dr. Pezzone collaborates currently with Dr. Steven Badylak at the McGowan Institute for Regenerative Medicine to investigate the cytokine response to extracellular matrix (ECM) and determination of the phenotype of immune cells in fixed specimens from patients with ulcerative colitis. Additional research interests include: macrophage phenotype modulation in tissue regeneration and down regulation of inflammation, the role of glial cells and the peripheral nervous system in the development of malignancy in chronic inflammatory states, modulation of mast cells and their role in visceral pain, neuromodulation of pain, development of pain biomarkers, and visceral afferents in the gastrointestinal and urinary tracts and their role in visceral hyperalgesia.

Advisory Committee Memberships and Leadership Positions

- Charter Member, Brain, Behavior & Immunity Center, University of Pittsburgh & Carnegie Mellon University, 1990-present
- Director, Gastroenterology at UPMC Mercy, Division of Gastroenterology, Hepatology and Nutrition, 2018-present

Professional Affiliations and Society Memberships

- Member, Society for Neuroscience, 1991-present
- Member, American Association for the Advancement of Science, 1992-present
- Member, American Gastroenterological Association, 1995-present
- Member, American College of Gastroenterology, 1998-present
- Member, American Association for the Study of Liver Diseases, 2012-present

Anna Evans Phillips, MD, MSc

Dr. Phillips researches the mechanisms of fatty acid toxicity in severe acute pancreatitis, the perception of pain in chronic pancreatitis, and the mechanisms of pain processing in chronic pancreatitis.

Advisory Committee Memberships and Leadership Positions

- Board Member, National Pancreas Foundation, Western PA Chapter, 2018-present
- Co-Leader, UPMC Nutrition Subcommittee, Education & Training Working Group, 2019-present

Professional Affiliations and Society Memberships

- Member, American Gastroenterological Association, 2015-present
- Member, American Pancreatic Association, 2015-present
- Member, International Association of Pancreatology, 2015-present
- Member, European Pancreas Club, 2017-present
- Member, CAPER, 2017-present
- Member, American College of Gastroenterology, 2019-present

Editorships

- Associate Editor, Allegheny County Medical Society Bulletin, 2018-present

Major Lectureships and Seminars

- Management of Pain in Chronic Pancreatitis: State of the Art, Johns Hopkins University, 45th Annual Topics in Gastroenterology & Hepato-Biliary Update, Baltimore, MD, October 2019

Siobhan Proksell, MD

Dr. Proksell's research interests include inflammatory bowel disease and patient safety research.

Advisory Committee Memberships and Leadership Positions

- LEAD Project Mentor, Development of Pre-Clinic Nutrition Curriculum, Internal Medicine Residency, University of Pittsburgh, 2017-present
- Organizer, Quarterly Gastroenterology Clinic, Birmingham Clinic, 2017-present
- Co-Director, 2nd Year Medical School Digestion & Nutrition Module, 2018-present
- Coordinator, Gastroenterology Subspecialty Education, 2018-present

Professional Affiliations and Society Memberships

- Member, American College of Gastroenterology, 2018-present
- Member, American Gastroenterological Association, 2018-present

Mordechai Rabinovitz, MD

Dr. Rabinovitz is a Professor of Medicine whose research involves the assessment and treatment of chronic viral hepatitis, focusing on combination therapy for chronic hepatitis C patients. Additional research efforts focus on developing new therapies for non-alcoholic fatty liver disease (NALFD), biological agents for patients with low platelet count undergoing invasive procedures, and new therapies for patients with hepatic encephalopathy.

Editorships

- Reviewer, *Digestive Diseases and Sciences*, 1987-present
- Reviewer, *Hepatology*, 1992-present
- Reviewer, *Gastroenterology*, 1993-present
- Reviewer, *Mayo Clinic Proceedings*, 2003-present

Vikrant P. Rachakonda, MD

Dr. Rachakonda researches malnutrition and dysregulation of lipid metabolism in chronic liver disease and the role of muscarinic receptors in the regulation of acute and chronic liver injury.

Professional Affiliations and Society Memberships

- Member, American Association for the Study of Liver Diseases, 2010-present
- Member, American Gastroenterology Association, 2010-present
- Member, American Society of Gastrointestinal Endoscopy, 2010-present

Honors and Awards

- Champion of Nursing Award, from Transplant ICU Nurses, UPMC, 2019-2020
- Teaching Award, from GI Fellows, Division of Gastroenterology, Hepatology and Nutrition, 2019-2020

Shari S. Rogal, MD, MPH

Leveraging her extensive, collaborative experience with Transplant Surgery and the VA Healthcare System, Dr. Rogal studies liver transplant outcomes with particular interests in addiction and pain with chronic liver disease patients. She is also interested in the implementation of science to combat health disparities.

Study Sections

- Grant Reviewer, Thomas E. Starzl Transplantation Center, 2016-present

Advisory Committee Memberships and Leadership Positions

- NAFLD Strategic Planning Committee, VA Central Office, 2014-present
- Core Investigator, Center for Health Equity Research & Promotion, VAPHS, 2014-present
- Lead Program Evaluator, National VA Hepatitis C Innovation Team Collaborative, 2015-present
- Member, Hepatitis C Task Force, VAPHS, 2015-present
- Advisory Board Member, Advanced Liver Disease Technical Advisory Board, VAPHS, 2017-present
- Co-Director, CTSI IMPACT and Implementation Lab Cores, 2019-present
- Co-Founder, Dissemination & Implementation Science Core, CTSI, University of Pittsburgh, 2019-present
- Member, Viral Hepatitis Subcommittee, U.S. Dept. of Health & Human Services, 2019-present
- At-Large Steering Committee Member, American Association for the Study of Liver Diseases Public Health Special Interest Group, 2020-present
- Interviewer, Internal Medicine Residency, UPMC, 2018-present
- Member, Hep C Free Allegheny Treatment Workgroup, Allegheny County Health Department, 2018-present
- GI Fellowship Review Committee, Division of Gastroenterology, Hepatology and Nutrition, 2019-present
- Member, Research Committee, Division of Gastroenterology, Hepatology and Nutrition, 2019-present

Professional Affiliations and Society Memberships

- Member, American Association for the Study of Liver Diseases, 2012-present
- Member, American Society of Transplantation, 2013-present

Editorships

- Editorial Board, *Hepatology*, 2017-2019

Major Lectureships and Seminars

- Invited Visiting Professor, VA Health Services, Research & Development Cyberseminar, July 2019
- Speaker, UPMC, Starzl Network Annual Meeting, October 2019
- Speaker, Veterans Health Administration, Ending the HIV Epidemic in VHA National Virtual Conference, December 2019

Honors and Awards

- Honoree, Distinguished Faculty Reception, University of Pittsburgh, 2020

Jami L. Saloman, PhD

The Saloman Lab uses both in vitro and in vivo animal models as well as clinical samples to conduct anatomical, behavioral, optogenetic, chemogenetic, Ca²⁺ Imaging, and cell/molecular studies to investigate the role of the nervous system in regulating homeostasis, as well as pathological conditions, including pancreatitis pain and tumorigenesis. Currently, she is investigating several signaling mechanisms that contribute to chronic pancreatitis pain. Dr. Saloman is also focused on the role of peripheral nerves and neuro-immune interactions that regulate tumorigenesis and cancer pain.

Advisory Committee Memberships and Leadership Positions

- Poster Judge, Center for Neuroscience Retreat, University of Pittsburgh, 2019
- Founder, Pancreas Animal Models Consortium (PAMC), 2020-present
- Member, CPDPC Biospecimen Committee, 2020-present

Professional Affiliations and Society Memberships

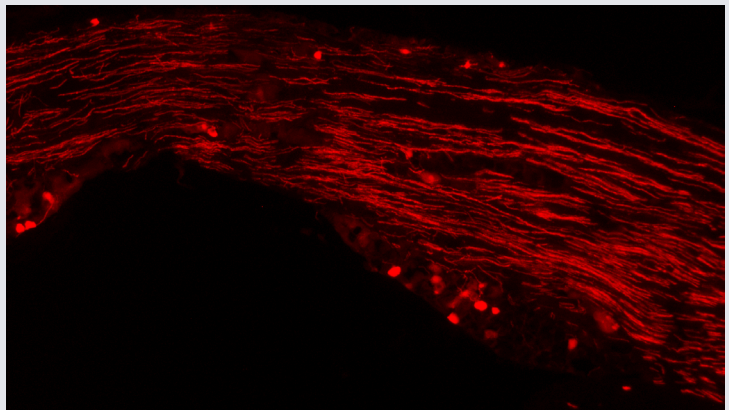
- Member, Society for Neuroscience, 2007-present
- Member, International Association for the Study of Pain, 2009-present
- Member, Pittsburgh Center for Pain Research, 2017-present
- Member, American Pancreatic Association, 2018-present
- Member, Biobehavioral Oncology Program, UPMC Hillman Cancer Center, 2019-present
- Teaching Faculty, Center for Neuroscience, University of Pittsburgh, 2019-present

Editorships

- Editorial Board, Pancreapadia.org, 2019-present

Major Lectureships and Seminars

- Speaker, Neural Influences in Cancer Think Tank Meeting, Heidelberg, Germany, November 2019
- Speaker, The Nervous System in Cancer, Cold Spring Harbor, NY, December 2019



Photo

The primary focus of the Saloman lab is peripheral mechanisms of pain. The major themes currently pursued are derived from a growing body of evidence indicating that peripheral neuron signaling mechanisms contribute to the prognosis, response to therapy, and pain associated with complex disorders such as cancer and chronic inflammatory diseases.

Savreet Sarkaria, MD

Dr. Sarkaria's research focuses on screening, early detection, and endoscopic therapies for gastrointestinal cancers, including pancreas, bile ducts, gallbladder, esophagus, stomach, and colon, as well as benign pancreaticobiliary diseases and pancreatic cysts.

Advisory Committee Memberships and Leadership Positions

- Division Representative, Physician Well-being Committee, University of Pittsburgh Physicians, 2018-present

Professional Affiliations and Society Memberships

- Member, American Gastroenterological Association, 2001-present
- Member, American Society for Gastrointestinal Endoscopy, 2002-present

Honors and Awards

- Awardee, 2019 UPMC Excellence in Patient Experience, February 2020

Marc B. Schwartz, MD

An Assistant Professor of Medicine, Dr. Schwartz's research interests include cost and utilization of IBD care as well as colon cancer in IBD patients.

Advisory Committee Memberships and Leadership Positions

- Co-Course Director, University of Pittsburgh, IBD Collaborative, Pittsburgh, PA, 2015-present
- Clinical Director, IBD Center, 2018-present

Professional Affiliations and Society Memberships

- Physician Member, Crohn's & Colitis Foundation of America, 2009-present

Honors and Awards

- Physician Award, Crohn's & Colitis Foundation, Western PA/WV Chapter, Night of Steel Gala, Pittsburgh, PA, November 2019

Obaid S. Shaikh, MD

Dr. Shaikh is a Professor of Medicine at the University of Pittsburgh School of Medicine. He also serves as the Director of Transplantation Medicine at the Veterans Affairs Pittsburgh Healthcare System. Dr. Shaikh is well known for his research in acute liver failure and viral hepatitis. His current research interests include advanced liver disease and its associated complications including renal failure and hepatocellular carcinoma. He is an author of several seminal studies. Most recently, he contributed to the determination of hepatitis C as a risk factor for cardiovascular disease. Dr. Shaikh is an active member of the American Association for the Study of Liver Diseases (AASLD). He has served on several AASLD committees.

Advisory Committee Memberships and Leadership Positions

- Member, Clinical Research Committee, American Association for the Study of Liver Diseases, 2007-present
- Member, Liver Transplantation and Surgery (Special Interest Group), American Association for the Study of Liver Diseases, 2008-present

Editorships

- Editorial Board, *Liver Transplantation*, 2005-present
- Reviewer, *Hepatology*, 2007-present
- Reviewer, *Digestive Diseases & Sciences*, 2007-present
- Reviewer, *Gastroenterology*, 2007-present
- Reviewer, *Liver Transplantation*, 2007-present
- Reviewer, *American Journal of Gastroenterology*, 2007-present
- Reviewer, *Archives of Internal Medicine*, 2007-present

Honors and Awards

- Member, Royal College of Physicians, London (UK)–Fellow (FRCP), 2003-present

Harkirat Singh, MBBS

Dr. Singh's research interests concentrate on pancreatic and biliary diseases and related advanced procedures to treat these diseases. He is interested in the natural history of acute pancreatitis as well as outcomes in acute pancreatitis. He also conducts research on the management of subepithelial upper GI tract lesions.

Professional Affiliations and Society Memberships

- Member, American Society of Gastrointestinal Endoscopy, 2017-present
- Member, American College of Gastroenterology, 2018-present
- Member, American Gastroenterological Association, 2018-present

Adam Slivka, MD, PhD

A Professor of Medicine, Dr. Slivka researches the non-invasive diagnosis of pancreaticobiliary cancer, development and testing of new drugs and devices used during ERCP, and the development of new strategies to treat pancreatitis and pancreatic cancer.

Advisory Committee Memberships and Leadership Positions

- Advisory Committee Member, Medicine Program Line, 1999-present
- Member, Compliance Advisory Committee, University of Pittsburgh Physicians (UPP), 1999-present
- Member, Clinical Operations Committee, University of Pittsburgh Physicians (UPP), 1999-present
- Member, Budget and Financial Planning Committee, American Society for

Gastrointestinal Endoscopy, 1999-present

- Member, Surgical/Interventional/Trauma/Transplant Subcommittee, UPMC Technology Assessment Committee, 2002-present

Editorships

- Editorial Board, *Gastroenterology*, 1996-present
- Section Editor, *Up to Date*, 2006-present
- Editorial Board, *Gastrointestinal Endoscopy*, 2007-present
- Reviewer, *Endoscopy*, 1994-present
- Reviewer, *Gastroenterology*, 1994-present
- Reviewer, *New England Journal of Medicine*, 1994-present
- Reviewer, *American Journal of Gastroenterology*, 1996-present
- Reviewer, *Gastrointestinal Endoscopy*, 1999-present

Honors and Awards

- Honoree, Best Doctors, *Pittsburgh Magazine*, 2009-present

Eva M. Szigethy, MD, PhD

Dr. Szigethy's research involves cognitive behavioral therapy to improve health care delivery for adult and pediatric GI patients, using psychotherapy, hypnosis, digital behavioral tools, and pharmacotherapy. Dr. Szigethy's additional research interests include advanced programming for IBD patients and patients experiencing chronic pain, an interest in narcotic bowel syndrome and the mechanisms underlying this type of central hyperalgesia, as well as treatments to manage pain and opioid detoxification. Dr. Szigethy is the principal investigator of a recently awarded PCORI contract which explores advanced technology systems designed to manage chronic disease and will compare a technology-centric approach with a team-based, high-touch intervention. This study takes place within three IBD specialty medical homes at renowned hospitals, with UPMC as the lead site.

Advisory Committee Memberships and Leadership Positions

- Co-Director, Total-Care IBD Medical Home, Division of Gastroenterology, Hepatology and Nutrition, 2012-present
- Chair, Princeton Prize Committee to Improve Race Relations, Princeton University, 2014-present
- Executive Committee, Princeton Club, Princeton University, 2014-present
- Behavioral Advisor, UPMC Enterprises, 2016-present
- Performance Enhancement Therapist, Pittsburgh Steelers, 2016-present
- Behavioral Director, Chief Medical & Scientific Office, UPMC, 2018-present
- Co-Director, UPMC Program for Gut-Brain Health, Division of Gastroenterology, Hepatology and Nutrition, 2019-present
- Steering Committee, Crohn's & Colitis Foundation, UK, UK, 2019-present
- Member, Strategic Planning of Mental Health Resources, UPMC, 2016-present

Professional Affiliations and Society Memberships

- Member, American Psychiatric Association, 1993-present
- Member, American Academy of Child & Adolescent Psychiatry, 1997-present
- Physician Member, Crohn's & Colitis Foundation, 2002-present
- Member, American Society of Clinical Hypnosis, 2007-present
- Member, American Academy of Psychoanalysis & Dynamic Psychiatry, 2009-present
- Member, American Gastroenterological Association, 2015-present

Editorships

- Editorial Board, *Experience Journal*, Dept. of Psychiatry, Children's Hospital of Boston, 2002-present
- Editor, F1000 Prime, Associate Faculty Member, 2013-present
- Editorial Board, *American Academy of Child & Adolescent Psychiatry News*, 2013-present

- Psychosocial Section Editor, *Inflammatory Bowel Disease Journal*, 2014-present

Honors and Awards

- Fellow, American College of Gastroenterology, 2014-present

David C. Whitcomb, MD, PhD

Dr. Whitcomb's research program involves a pancreatic disease focus for modeling complex, multistep gene-environment interactive disorders requiring a precision medicine approach. Dr. Whitcomb's multicenter comprises research on genotype-phenotyping hereditary pancreatitis as well as North American Pancreatitis Study II (NAPS2) programs. It also includes studies on acute pancreatitis and pancreatic cancer, using reverse engineering and predictive modeling approaches. Dr. Whitcomb leads the Genomic Resource to Enhance Available Therapy (GREAT) study, which seeks to initiate the delivery of precision medicine for complex chronic disorders and their complications. He also studies the pathophysiology of severe acute pancreatitis and pain genetics.

Advisory Committee Memberships and Leadership Positions

- Founder/Member, Collaborative Alliance for Pancreatic Education and Research (CAPER), 2012-present
- Committee Member, National Pancreas Foundation, 2007 -present

Professional Affiliations and Society Memberships

- Member, American Gastroenterological Association, 1992-present
- Member, American College of Gastroenterology, 1996-present
- Member, International Association of Pancreatology, 2000-present
- Member, American Pancreatic Association, 2000-present
- Member, American Society for Clinical Investigators, 2000-present
- Member, European Pancreas Club, 2002-present

Editorships

- Associate Editor, *Pancreas, Pancreatology and Digestive Disease and Science*, 2007-present
- Editorial Board, *Nature Reviews: Gastroenterology and Hepatology*, 2007-present
- Editorial Board, *American Journal Physiology: Gastrointestinal and Liver Physiology*, 2007-present
- Section Editor, *Current Treatment Options in Gastroenterology*, 2007-present
- Editor in Chief, *Clinical and Translational Gastroenterology Journal*, 9/1/2016
- Editorial Board, *Pancreatology*, 2007-present
- Editorial Board, *Pancreas*, 2007-present
- Peer Reviewer, Multiple journals, (*Alimentary Pharmacology and Therapeutics, American Journal of Gastroenterology, American Journal of Pathology, American Journal of Physiology-Gastroenterology, American Journal of Physiology-Regulatory Integrative and Comparative Phys*), 2007-present

Major Lectureships and Seminars

- Course Director, Division of Gastroenterology, Hepatology and Nutrition, PancreasFest 2019, Pittsburgh, PA, July 2019

Dhiraj Yadav, MD, MPH

Dr. Yadav studies the epidemiology of pancreatic diseases, using local, state, and national level data as well as collaborative studies to define its various aspects. His major contributions to the scientific literature include the role of alcohol and tobacco; incidence, prevalence, and hospitalizations; risk and burden of readmissions; and the natural history of pancreatitis. Data generated from his studies are often used by national agencies, such as the National Institutes of Health, to set research priorities. Dr. Yadav is a member of the NIDDK-funded NAPS consortium, which has prospectively ascertained the nation's largest prospective cohort of patients with recurrent acute and chronic pancreatitis. He is the Co-PI for the NIDDK/NCI-funded Pittsburgh Clinical Center, which is part of the

Consortium to study of Chronic Pancreatitis, Diabetes and Pancreatic Cancer (CPDPC). He co-chairs the adult chronic pancreatitis working group for the consortium and is Co-PI of the longitudinal cohort study of chronic pancreatitis (The PROCEED Study). Dr. Yadav is also the Co-PI of an NIDDK planning grant to develop a multicenter randomized clinical trial of minor papilla sphincterotomy in patients with acute recurrent pancreatitis with pancreas divisum (The SHARP Trial). He is frequently invited to national and international conferences and seminars to discuss his research. He has also participated in American Pancreatic Association's and Pancreas Fest's development of consensus and practice guidelines for different aspects of pancreatitis.

Study Sections

- Member, Research Review Panel, American Gastroenterological Association, 2014-present

Advisory Committee Memberships and Leadership Positions

- Scientific Advisory Committee, MUH, Clinical & Translational Research Center, UPMC, 2007-present
- Course Director, Gastroenterology Fellowship Journal Club, 2007-present
- Co-Chair, Adult Chronic Pancreatitis Working Group, NIH CPDPC Consortium, 2015-present
- Steering Committee Member, NIH CPDPC Consortium, 2015-present
- Course Director, Advanced Endoscopy Series and PB LIVE, 2016-present
- Named Member, NIH SHARP Committee (Pshincterotomy for the Treatment of Acute Recurrent Pancreatitis), 2017-present
- Chair, NIH SHARP Trial Executive Committee, January 2018-present
- Co-Director and Founder, Enhancing MEntoring to Improve Research in Gastroenterology (EMERGE), Pittsburgh, PA, 2018-present

Professional Affiliations and Society Memberships

- Member, American College of Gastroenterology, 1998-present
- Member, Mayo Clinic Alumni Association, 2002-present
- Member, American Pancreatic Association, 2003-present
- Member, American Gastroenterological Association, 2005-present
- Member, Collaborative Alliance for Pancreatic Education and Research, 2010-present

Editorships

- Editorial Board, *Pancreas*, 2013-present
- Editorial Board, *Pancreatology*, 2014-present

Honors and Awards

- Fellow, American Gastroenterological Association, 2014-present
- Honorary Professorship, Comfort in Gastroenterology Professor, Mayo Clinic, Rochester, MN, January 2020

GRANTS AND CONTRACTS

AWARDED

July 1, 2019 to June 30, 2020

PUBLIC HEALTH SERVICE

INVESTIGATOR	TITLE	AGENCY	ANNUAL DIRECT COSTS	ANNUAL INDIRECT COSTS
Arteel, Gavin	Biomarkers of Alcoholic Hepatitis	NIAAA	\$302,672	\$135,589
Arteel, Gavin	Role of Wnt/beta-catenin In Liver Regeneration	NIDDK	\$7,327	\$4,140
Arteel, Gavin	Pittsburgh Liver Research Center	NIDDK	\$18,375	\$10,388
Arteel, Gavin	Targeting xanthine oxidase as a therapeutic in NASH	NIDDK	\$4,930	\$2,785
Beier, Julianne	Vinyl chloride-induced changes to the epitranscriptome: interaction with diet	NIEHS	\$149,054	\$80,227
Bataller Alberola, Ramon	Alcoholic Hepatitis Clinical and Translational Network Late Phase Clinical Trials and Observational Studies (Collaborative U01)	NIAAA	\$5,980	\$3,379
Bataller Alberola, Ramon	Alcoholic Hepatitis Clinical and Translational Network Late Phase Clinical Trials and Observational Studies (Collaborative U01)	NIAAA	\$225,653	\$127,494
Bataller Alberola, Ramon	Liver-Enriched Transcription Factors as Prognostic Markers and Therapeutic Targets in Alcoholic Hepatitis	NIAAA	\$146,451	\$66,980
Bataller Alberola, Ramon	Alcoholic Hepatitis Consortia: An Intramural/ Extramural Collaboration to Unravel Genetic Determinants	NIAAA/Cleveland Clinic	\$11,153	\$6,302
Bataller Alberola, Ramon	Applying a Human Liver Microphysiology System to Develop Therapeutic Strategies for Non-Alcoholic Fatty Liver Disease (NAFLD)	NIDDK	\$9,784	\$5,528
Bataller Alberola, Ramon	Pittsburgh Liver Research Center (Admin Core)	NIDDK	\$3,019	\$1,705
Bataller Alberola, Ramon	Xenobiotic Receptors in the Crossroad of Xenobiotic Metabolism and Endobiotic Metabolism	NIEHS	\$12,212	\$6,900
Binion, David	Mitochondrial Communication During the Pathogenesis of Inflammatory Bowel Disease	NIDDK	\$4,910	\$2,773
Brand, Rhonda M.	Delivery of Rectal Enema as Microbicide (DREAM) -Project 1 - Clinical Optimization of a Tenofovir Enema and Adherence Tracking	NIAID/Johns Hopkins University	\$43,361	\$9,915
Brand, Rhonda M.	Development of a urine-based point-of-care test for adherence to antiretroviral drugs	NIAID/Magee Womens Research Institute and Foundation	\$13,106	\$7,077
Brand, Rhonda M.	Leadership and Operations Center (LOC): Microbicide Trials Network	NIAID/Magee Womens Research Institute and Foundation	\$13,517	\$7,621

PUBLIC HEALTH SERVICE

INVESTIGATOR	TITLE	AGENCY	ANNUAL DIRECT COSTS	ANNUAL INDIRECT COSTS
Brand, Rhonda M.	Griffithsin-Based Rectal Microbicides for PREvention of Viral ENTry (PREVENT) Project 3	NIAID/University of Louisville	\$69,372	\$31,380
Das, Rohit	Novel Chemopreventive Interventions	NIH/Mayo Foundation	\$3,497	\$1,951
Das, Rohit	Novel Chemopreventive Interventions - Patient Care	NIH/Mayo Foundation	\$7,793	\$0
Duarte-Rojo, Andres	Predicting post-transplant mortality and global functional health based on pretransplant functional status in liver transplantation	NIA/University of California - San Francisco	\$12,779	\$7,221
Duerr, Richard H.	NIDDK IBD Genetics Consortium Genetic Research Center	NIDDK	\$241,160	\$136,255
Duerr, Richard H.	NIDDK IBD Genetics Consortium Genetic Research Center	NIDDK	\$79,751	\$45,059
Levinthal, David J.	The Neural Basis of the Brain-Body Connection	NCCIH	\$72,433	\$40,925
Liu, Yang	High-Throughput Super-Resolution Imaging of Chromatin Structures at Different Epigenetic States	NCI	\$234,558	\$132,525
Liu, Yang	Three Dimensional Nanoscale Nuclear Architecture Mapping Based Taxonomy of Precursor Lesions for Predicting Colorectal Cancer Risk	NCI	\$176,967	\$99,986
Liu, Yang	Lamin B2 regulates nuclear remodeling in cardiomyocyte terminal differentiation	NHLBI	\$22,541	\$12,736
O'Keefe, Stephen J	Randomized Controlled Trial of Resistant Starch to Reduce Colon Cancer in Alaska Native People	NCI	\$378,898	\$152,775
Rogal, Shari	Improving Pain Management and Opioid Safety for Patients with Cirrhosis	NIDA	\$175,900	\$12,580
Saloman, Jami, L.	Chemical Pancreatectomy for Chronic Pancreatitis and Pancreatic Cancer	NIDDK	\$15,250	\$8,616
Saloman, Jami, L.	Neuropathic vs. inflammatory pain in chronic pancreatitis: can unique biomarkers be identified to guide mechanistic approaches to pain treatment?	NIDDK	\$137,931	\$10,835
Schoen, Robert E.	ctDNA for the Early Detection and Monitoring of Colorectal Cancer	NCI	\$39,645	\$19,352
Schoen, Robert E.	ctDNA for the Early Detection and Monitoring of Colorectal Cancer	NCI	\$399,677	\$112,669
Schoen, Robert E.	ctDNA for the Early Detection and Monitoring of Colorectal Cancer	NCI	\$53,762	\$4,901
Schoen, Robert E.	Molecular Risk Stratification for Colonoscopic Surveillance	NCI/Massachusetts General Hospital	\$18,199	\$9,827
Schoen, Robert E.	NRG Oncology NCORP Research Base	NCI/University of Chicago	\$71,189	\$40,222
Schoen, Robert E.	Randomized, Double-Blind, Placebo-Controlled Trial of MUC1 Vaccine in Patients with Newly Diagnosed Advanced Adenomas - Task Order 11	NIH/Mayo Foundation	\$5,887	\$1,472
Schoen, Robert E.	Prostate, Lung, Colorectal and Ovarian (PLCO) Central Data Collection Center	NIH/Westat, Inc.	\$11,685	\$6,602
Shaikh, A. Obaid	Hepatitis B Clinical Research Network - Data Coordinating Center	NIDDK	\$8,706	\$4,918
Slivka, Adam	Stent vs. Indomethacin	NIDDK/Medical University of South Carolina	\$41,963	\$22,660

PUBLIC HEALTH SERVICE

INVESTIGATOR	TITLE	AGENCY	ANNUAL DIRECT COSTS	ANNUAL INDIRECT COSTS
Slivka, Adam	Results of ERCP in Sphincter of Oddi Dysfunction (RESPOND)	NIDDK/ Medical University of South Carolina	\$893	\$504
Whitcomb, David C.	Validation of Biomarkers for Early Diagnosis and risk Prediction of Pancreatic Neoplasms	NCI	\$13,421	\$7,583
Whitcomb, David C.	Digestive Diseases Training Program	NIDDK	\$325,479	\$23,260
Whitcomb, David C.	Digestive Diseases Training Program (Supplement)	NIDDK	\$28,937	\$2,315
Whitcomb, David C.	PancreasFest 2019: Team Science for complex Pancreatic Diseases and Pancreatic Cancer: Goals, Milestones and Methods	NIDDK	\$14,959	\$0
Yadav, Dhiraj	Mechanisms and Treatment Development for Pancreatitis Resulting from Alcohol Abuse and Smoking	NIAAA/Cedars-Sinai Medical Center	\$106,324	\$22,484
Yadav, Dhiraj	Consortium for the Study of Chronic Pancreatitis, Diabetes and Pancreatic Cancer: Pittsburgh Clinical Center	NIDDK	\$237,101	\$133,962
Yadav, Dhiraj	Consortium for the Study of Chronic Pancreatitis, Diabetes and Pancreatic Cancer: Pittsburgh Clinical Center - Supplement	NIDDK	\$117,093	\$55,034
Yadav, Dhiraj	Consortium for the study of chronic pancreatitis, diabetes and pancreatic cancer – Pittsburgh Clinical Center	NIDDK	\$71,788	\$40,561
Yadav, Dhiraj	Evaluation of Magnetic Resonance Imaging as a Non-invasive Method to Detect and Quantify Pancreatic Fibrosis: a Pilot Study	NIDDK/Indiana University	\$100	\$0
Yadav, Dhiraj	Consortium for the Study of Chronic Pancreatitis, Diabetes and Pancreatic Cancer: Coordinating and Data Management Center (CSDPC-CDMC)	NIDDK/MD Anderson Cancer Center	\$100,000	\$0
Yadav, Dhiraj	Consortium for the Study of Chronic Pancreatitis, Diabetes and Pancreatic Cancer: Coordinating and Data Management Center (CSDPC-CDMC)	NIDDK/MD Anderson Cancer Center	\$7,327	\$0
Yadav, Dhiraj	SpHincterotomy for Acute Recurrent Pancreatitis - SHARP	NIDDK/ Medical University of South Carolina	\$127,096	\$63,050
TOTAL PUBLIC HEALTH SERVICE			\$4,401,565	\$1,743,022

VETERANS ADMINISTRATION

INVESTIGATOR	TITLE	AGENCY	ANNUAL DIRECT COSTS	ANNUAL INDIRECT COSTS
Rogal, Shari	National VISN Hepatic Innovation Team Evaluation Program	VA Office of Specialty Care Services	\$236,935	\$0
TOTAL VETERANS ADMINISTRATION			\$236,935	\$0

OTHER FEDERAL

INVESTIGATOR	TITLE	AGENCY	ANNUAL DIRECT COSTS	ANNUAL INDIRECT COSTS
Binion, David	Utilizing Clinical Metadata to Predict High-cost Complications and Treatment Response in IBD: Development of Clinical Decision Support Tools	DOD	\$270,577	\$139,356
Brand, Rhonda Metter	ARV Agent Identification and Technology Development	USAID/Research Triangle Institute International	\$64,363	\$36,083
Duarte-Rojo, Andres	EL-FIT: exercise and liver fitness	NSF	\$997	\$0
Whitcomb, David C.	Mechanism of Systemic Inflammation-Associated Endothelial and Epithelial Cell Dysfunction Following Acute Pancreatitis, Trauma and Burns	DOD	\$263,768	\$134,904
TOTAL FEDERAL			\$599,705	\$310,343

SOCIETY AND FOUNDATIONS

INVESTIGATOR	TITLE	AGENCY	ANNUAL DIRECT COSTS	ANNUAL INDIRECT COSTS
Al Hashash, Jana Ghazi	Patterns of MUC1 Expression in Primary Sclerosing Cholangitis (PSC), PSC-Related Cholangiocarcinoma, and Sporadic Cholangiocarcinoma	American College of Gastroenterology	\$6,642	\$0
Binion, David	The Genome and Microbiome Repository Project	UPMC Enterprises	\$4,168	\$0
Brand, Randall	The Genome and Microbiome Repository Project	UPMC Enterprises	\$2,397	\$0
Brand, Rhonda M.	Subcutaneous Contraceptive and HIV Implant Engineered for Long-acting Delivery (SCHIELD) Program	Magee Womens Research Institute and Foundation	\$6,679	\$3,774
Duerr, Richard H.	IBD Plexus	Crohns & Colitis Foundation	\$96,848	\$9,685
Duerr, Richard H.	IBD Plexus - Travel	Crohns & Colitis Foundation	\$7,740	\$0
Duerr, Richard H.	Study of a Prospective Adult Research Cohort with Inflammatory Bowel Disease (SPARC IBD)	Crohns & Colitis Foundation	\$285,435	\$28,544
Liu, Yang	A Function for B-Type Lamins in Nuclear Pore Insertion Impacts Heart Repair and Regeneration	Aging Institute of UPMC	\$11,201	\$0
Liu, Yang	Characterization of dynamic nanoscale chromatin reorganization during induced cell reprogramming	Charles E. Kaufman Foundation	\$45,569	\$4,556
Schoen, Robert E.	SPRY Metformin GI Subaccount	University of Pittsburgh Medical Center	\$40,073	\$0
Schoen, Robert E.	The Genome and Microbiome Repository Project	UPMC Enterprises	\$24,090	\$0
Schwartz, Marc	Open Label, Randomized, Multicenter, Comparative Effectiveness Trial of Specific Carbohydrate and Mediterranean Diets to Induce Remission in Patients with Crohns Disease	University of Pennsylvania	\$4,667	\$1,167
Yadav, Dhiraj	The Genome and Microbiome Repository Project	UPMC Enterprises	\$15,666	\$0
TOTAL SOCIETY AND FOUNDATIONS			\$551,176	\$47,726

INDUSTRY

INVESTIGATOR	TITLE	AGENCY	ANNUAL DIRECT COSTS	ANNUAL INDIRECT COSTS
Behari, Jaideep	The IMAGES Study: Imaging-based Assessment of Grade of Steatosis in NAFLD	Endra Life Sciences	\$58,218	\$35,804
Brand, Randall	Utilizing a Multi-Gene Testing Approach to Identify Hereditary Pancreatic Cancer in Consecutive Cases Unselected for Family History	Ambry Genetics Corporation	\$2,662	\$665
Brand, Randall	Cell-Free DNA as a Potential Biomarker for Pancreatic Cancer	Freenome, Inc.	\$78,062	\$36,938
Brand, Randall	Retrospective Study for the Early Detection of Pancreatic Cancer	Immunex Corporation	\$218,611	\$130,430
Brand, Randall	Adaptive Prospective Study for the Early Detection of Pancreatic Cancer (PDAC) in High Risk Groups	Immunovia	\$77,123	\$23,136
Brand, Rhonda Metter	Assess Colonic Inflammation Regulatory Pathways in Healthy Donors and Crohn's Disease Patients: Collaborative Program with University of Pittsburgh and Takeda California	Takeda Pharmaceuticals, Inc.	\$88,812	\$26,863
Jonassaint, Naudia Lauder	Ledipasvir-sofosbuvir for postpartum HCV-infected women: effectiveness, adherence, feasibility/acceptability and infant exposure	Gilead Sciences, Inc	\$2,382	\$595
Phillips, Anna Evan	Incidence of Exocrine Pancreatic Insufficiency, Nutritional Deficiencies, and Impaired Quality of Life Following an Attack of Acute Pancreatitis	Abbvie. Inc.	\$109,808	\$32,942
Phillips, Anna Evan	Incidence of Exocrine Pancreatic Insufficiency, Nutritional Deficiencies, and Impaired Quality of Life Following an Attack of Acute Pancreatitis (TRAVEL)	Abbvie. Inc.	\$998	\$0
Phillips, Anna Evan	Incidence of Exocrine Pancreatic Insufficiency, Nutritional Deficiencies, and Impaired Quality of Life Following an Attack of Acute Pancreatitis	Abbvie. Inc.	\$221,272	\$0
Schoen, Robert E.	Machine Learning from Endoscopic Images	Medtronic	\$25,208	\$6,301
Schoen, Robert E.	Machine Learning from Endoscopic Images - ITERATION 2	Medtronic	\$50,320	\$12,580
TOTAL INDUSTRY			\$933,476	\$306,254

PUBLIC HEALTH SERVICE	\$4,401,565	\$1,743,022
VETERANS ADMINISTRATION	\$236,935	\$0
OTHER FEDERAL	\$599,705	\$310,343
SOCIETY AND FOUNDATIONS	\$551,176	\$47,726
INDUSTRY	\$933,476	\$306,254
TOTAL	\$6,722,857	\$2,407,345

TEACHING ACTIVITIES

The Division's Gastroenterology Fellowship Program enjoyed a full complement of 17 gastroenterology fellows in FY20. One of these fellows completed both her third year of Gastroenterology Fellowship and an Advanced Fellowship in Transplant Hepatology during FY20 as part of a new ACGME training program. The Division also trained one gastroenterologist in an Advanced Endoscopy Fellowship, with this trainee also serving as an instructor of medicine to support training costs. Additionally, the Division trained one Advanced Research Pathway fellow.

Gastroenterology Fellowship

More than 400 candidates applied for Gastroenterology Fellowship admission in FY20, with approximately 40 interviewed and six selected. The Division's accredited FY20 Gastroenterology Fellowship Program was led by program director **Kenneth Fasanella, MD**, and **Rohit Das, MD**, associate program director. The Division's accredited FY20 Transplant Hepatology Advanced Fellowship Program was led by **Shahid Malik, MD**, program director, and **Vikrant Rachakonda, MD**, associate program director. The Division's Advanced Endoscopy Fellowship is mentored by **Jennifer Chennat, MD**. The Division's Fellowship Program continue to produce extraordinary gastroenterologists in FY20. All trainees continue to pass their GI and hepatology boards with a 100% success rate. Four FY20 fellows went on to pursue advanced fellowships.

The Advanced Fellowship in Transplant Hepatology has increased its trainee complement from one to two advanced fellows in FY20. Importantly, the program also offers a three-year standard training track (i.e., two years of gastroenterology with one dedicated year of hepatology), as opposed to three GI years followed by an additional fourth hepatology year.

The VAPHS GI section and its chief, **Asif Khalid, MD**, have provided fellows with unique clinical and endoscopic training opportunities. Current Division and VA junior faculty, **Elyse Johnston, MD**, and **Jeffrey Dueker, MD, MPH**, have availed themselves of these opportunities in the past, and FY20 fellows have multiple ongoing projects at different stages of completion.

A new FY20 fellowship research training initiative started in FY20. **EMERGE (Enhancing MEntoring to improve Research in GastroEnterology)** was developed and is co-directed by faculty members **Gavin Arteel, PhD**, and **Dhiraj Yadav, MD, MPH**. By matching fellows with faculty research mentors early in the fellowship experience and by providing a more organized structure, EMERGE is fostering enhanced academic research and professional growth for fellows and junior faculty in the Division. Faculty have developed a research committee, and faculty members meet with their trainees regularly.

The Division also holds a Ruth L. Kirschstein NRSA Institutional Research Training Grant (T32) with **David Whitcomb, MD, PhD**, as the principal investigator. The following trainees were supported by the Division's T32 grant in FY20:

- Post-doctoral: Brandon Blobner, PhD; Brian Edwards, PhD; Vikrant Raghu, MD; and R. Warren Sands, MD, PhD

- Pre-doctoral: Ellyn Dunbar, MS

Medical Students

The Division's leadership in the School of Medicine's Second Year Medical School GI Course is led by faculty member **Siobhan Proksell, MD**, and **Gavin Arteel, PhD**, in collaboration with Michael Landau, MD from the Department of Pathology. FY20 was Dr. Proksell's second management year with this course, and she and her colleagues continued to revamp, revise, and update the course. Subspecialty lectures are coordinated for residents throughout the year. Also, the gastroenterology consult months are always full, and residents request the GI rotations frequently.

The changing educational expectations of students and the utilization of innovative, technological teaching approaches in the School of Medicine continue to be explored and addressed by **James B. McGee, MD**, and his Laboratory of Educational Technology.

Conferences and Continuing Medical Education

The Division hosted the following education conferences in FY20:

- ✦ The accredited and international **PancreasFest 2019** conference occurred in July 2019 and was held at the William Pitt Student Union on the University of Pittsburgh campus. Course directors included **Randall E. Brand, MD**; Stephen Hughes, MD (Florida); Kenneth K.W. Lee, MD; Walter G. Park, MD (Stanford); Aliye Uc, MD (Iowa); **David C. Whitcomb, MD, PhD**; and Herbert J. Zeh, MD. Attendance was excellent at 250 domestic and international pancreatologists and related medical professionals. PancreasFest is the Division's longest running program and is one of the leading annual pancreatology meetings in the world.
- ✦ **Robert Schoen, MD, MPH**, continues to serve as the course director for the 2019-2020 **Pittsburgh Gut Club** accredited lecture series for regional gastroenterologists. While all three of the lectures in this series were cancelled due to the COVID-19 pandemic, they have all been rescheduled for FY21 using a virtual platform.
- ✦ **Ramon Bataller, MD, PhD**, was the course director for the Division's inaugural **2019 Annual Update in Medical Hepatology** in December 2019. More than 100 physicians and medical professionals attended this full-day Saturday program. The Annual Update in Medical Hepatology will become an annual educational offering for this Division, but the FY21 program will be offered as a webcast.
- ✦ In collaboration with the Cleveland Clinic Foundation, the Division's pancreatology faculty started **PB LIVE** (PB: PancreaticoBiliary) in FY20. Eight academic pancreas sites (i.e., UPMC Presbyterian, UPMC Shadyside, UPMC Children's Hospital of Pittsburgh, Cleveland Clinic, Johns Hopkins, Ohio State University, and Penn State/Hershey) participate in these monthly case-based webcast discussions. Difficult cases are discussed on a live, interactive platform to obtain input and related education for all participating physicians, researchers, trainees, and medical professionals. Interested participants who are external to the involved institutions may join via webcast.
- ✦ The monthly PB LIVE is modeled on the weekly **IBD LIVE** program, which started at the University of Pittsburgh and is now managed at the Cleveland Clinic. UPMC's IBD Center continues to participate as one of IBD LIVE's primary academic sites.
- ✦ **Robert Schoen, MD, MPH**, is the recipient of a generous donation from the Gerson family to support a visiting professor recipient of the annual Sadie Gerson Distinguished Scholar Award. This grant and its related programming support colorectal cancer research. Typically, the awardee lectures at Medical Grand Rounds and also enjoys a visiting professorship with the Division. The FY20 lecture was cancelled due to the COVID-19 pandemic.
- ✦ The Division manages the accredited, semi-annual **IBD Collaborative** program in partnership with the Allegheny Health Network. Course co-directors are **Marc Schwartz, MD** (UPMC) and

Sandra El-Hachem, MD (AHN). FY20 programs occurred at the Rivers Club in Sept. 2019 and Feb. 2020.

- ✦ The Division also developed the **IBD UNITE** (Unify, Network, Inspire, Treat, & Education) patient education program for those afflicted with Inflammatory Bowel Disease (IBD). The IBD UNITE course director is **Jeffrey Dueker, MD, MPH**. The FY20 IBD UNITE program was cancelled due to the COVID-19 pandemic. A series of three webinars was held in summer 2020 in collaboration with the Crohn's & Colitis Foundation, and a fourth UPMC-specific webinar and the live IBD UNITE education program will occur in FY21.

Throughout the year, the Division also holds several weekly conferences, providing trainees and faculty alike with numerous opportunities to expand their clinical and research knowledge. Clinical conferences included: **GI Grand Rounds** (course director: **Kenneth Fasanella, MD**), which featured lectures by external and internal faculty, as well as case presentations from clinical fellows; **Hepatology Rounds** (course director: **Shahid Malik, MD**), with lectures focused on hepatology medicine; and the **Advanced Endoscopy/Pancreaticobiliary Conference** (course director: **Dhiraj Yadav, MD, MPH**), which provides a weekly discussion of ERCP, EUS, and related GI procedure cases. Research conferences, focused more on basic and translational research and fellow training, included **GI Research Rounds** (Course director: **Yang Liu, PhD**); the **Tuesday Educational Series for GI Fellows** (Course coordinator: **Dhiraj Yadav, MD, MPH**); the **Endoscopy Conference** (Course coordinator: **Robert E. Schoen, MD, MPH**); and the **State of the Art (SOTA) Lecture Series** (Course director: **Randall Brand, MD**).

The Division also welcomed the following visiting professors in FY20: **Maria Abreu, MD**, Professor of Medicine, Microbiology, and Immunology and Martin Kalser Chair in Gastroenterology, as well as the Director of the Crohn's & Colitis Center and Vice Chair of Research at the Department of Medicine at the University of Miami Miller School of Medicine (September 23-24, 2019) and **Jordan Feld, MD, MPH**, the R. Phelan Chair in Translational Liver Research at the Toronto Centre for Liver Disease, Toronto General Hospital and University of Toronto in Toronto (December 6-7, 2019). Additionally, two faculty members from the Department of Gastroenterology and Hepatology at the Clinical Institute of Aalborg University Hospital in Aalborg, Denmark visited on March 4-5, 2020: **Asbjørn Mohr Drewes, MD, PhD, DMSc, EDPM, R.**, Professor, Chair, & Chief Physician and Director, Mech-Sense & Centre for Pancreatic Diseases, and **Søren Schou Olesen, MD, PhD**, Associate Professor and Chief Physician and Head of the Pancreas Centre. Additional visiting professors were scheduled, but these visits were cancelled due to the COVID-19 pandemic.

Other

Vikrant Rachakonda, MD, received the FY20 Teaching Award from the 2019-2020 gastroenterology fellows. Dr. Rachakonda also received the coveted "Champion of Nursing Award" from the nurses in the Transplant ICU.

Many division faculty served as keynote course faculty for accredited physician educational and research meetings throughout the world.



Clinical Fellows

* Indicates departing fellow

*Catherine Bartnik, MD

Medical School: Michigan State University

Residency: Emory Healthcare

Current Position: Advanced Transplant Hepatology Fellow, UPMC

*Weston Bettner, MD

Medical School: Temple University

Residency: Johns Hopkins Hospital

Current Position: Gastroenterologist, AHN

*Hui-Wei (Doris) Chen, MD

Medical School: University of Pittsburgh

Residency: University of Pittsburgh Medical Center

Current Position: Gastroenterologist, AHN

Debbie Cheng, MD

Medical School: University of Michigan

Residency: University of Pittsburgh Medical Center

Wai Kan (Karen) Chiu, MD

Medical School: University of Pittsburgh

Residency: Weill Cornell Medicine

Furkan Ertem, MD

Medical School: Istanbul University

Residency: UPMC

Amir-Ali Ghaffari, MD, PhD

Medical School: UCLA

Residency: UPMC

***Adam Gluskin, MD**

Medical School: University of Illinois at Chicago

Residency: Northwestern Memorial Hospital

Current Position: Private Practice

Amir Gougol, MD

Medical School: Tehran University

Residency: UPMC

Rory Grace, MD

Medical School: George Washington University

Residency: University of Pennsylvania Health System

Ru Min Lee, MD

Medical School: University of Melbourne, Australia

Residency: University of Pennsylvania Health System

Jacob Lipkin, MD

Medical School: Pennsylvania State University

Residency: UPMC

***Akshata Moghe, MD, PhD** *Chief Fellow*

Medical School: Seth G.S. Medical College, Mumbai, India

Residency: UPMC

Current Position: Advanced Transplant Hepatology Fellow, UPMC

***Kohtaro (Cody) Ooka, MD**

Medical School: Icahn School of Medicine at Mount Sinai

Residency: Yale New Haven Medical Center

Current Position: Advanced Fellow in Therapeutic Endoscopy, NYU Langone Health

Stephanie Romutis, MD

Medical School: Wake Forest University

Residency: Boston Medical Center

***Ajay Singhvi, MD**

Medical School: Feinberg School of Medicine, Northwestern University

Residency: Northwestern Memorial Hospital

Current Position: Clinical Lecturer, University of Michigan

Sunny Tao, MD

Medical School: University of Pittsburgh

Residency: UPMC

***Kishore Vipperla, MD**

Medical School: Osmania Medical College

Residency: St. Luke's University Hospital

Current Position: Advanced Endoscopy Fellow, UPMC

Advanced Fellowships

***Wasseem Skef, MD** Advanced Endoscopy Fellow

Medical School: Weill Cornell Medicine - Qatar

Residency: St. Elizabeth's Medical Center, Boston, MA

Current Position: Clinical Assistant Professor, Loma Linda University Medical Center

Clinical Fellow Activities

Catherine Bartnik, MD

Publications

- "COVID-19: Gut Feeling, It's Time to Prepare", *Rumblings*, Newsletter of the PA Society of Gastroenterology, Virtual, March 2020.

Honors and Awards

- Winner, Gastroenterology Jeopardy, Annual Scientific Meeting - PA Society of Gastroenterology, Poconos, PA, October 2019.
- Winner, American Liver Foundation (ALF) Academic Debate, American Liver Foundation meeting, Cleveland, OH, December 2019.
- Travel Scholarship to ACG Second Year Fellows Course, American College of Gastroenterology Second Year Fellows Course, Washington, DC, January 2020.

Weston Bettner, MD

Presentations and Abstracts

- Developing Precision Medicine in IBD: Peripheral Blood Eosinophilia Identifies Individuals with Worse Outcomes Following Initiative of Anti-TNF Biologic Agents, American College of Gastroenterology Annual Meeting, San Antonio, TX, October 2019.

Honors and Awards

- Doximity Feature: Fatty Liver and Weight Loss Initiatives Making Waves at ACG, Doximity, Virtual, September 2019.

Hui-Wei (Doris) Chen, MD

Publications

- **Chen HW**, Duarte-Rojo A, "The Definition and Diagnosis of Frailty in the Research and Clinical Settings," in *Frailty and Sarcopenia in Cirrhosis: The Basics, the Challenges, and the Future*, P. Tandon and A. j. Montano-Lazo, eds., Springer Nature, Switzerland, 2020.
- Kuo SZ, Ahmad M, Dunn MA, Montano-Loza AJ, Carey EJ, Lin S, Moghe A, **Chen HW**, Ebadi M, Lai JC. Sarcopenia Predicts Post-transplant Mortality in Acutely Ill Men Undergoing Urgent Evaluation and Liver Transplantation. *Transplantation*. 2019 Nov;103(11):2312-2317.
- **Chen HW**, Ferrando AA, Dunn MA, Kim WR, Duarte-Rojo A. Cadence From Physical Activity Trackers for Monitoring of Home-Based Exercise Intensity in Advanced Liver

Disease. Liver Transpl. 2020 May;26(5):718-721.

- **Chen HW**, Ferrando A, White MG, Dennis RA, Xie J, Pauly M, Park S, Bartter T, Dunn MA, Ruiz-Margain A, Kim WR, Duarte-Rojo A. Home-Based Physical Activity and Diet Intervention to Improve Physical Function in Advanced Liver Disease: A Randomized Pilot Trial. Dig Dis Sci. 2020 Nov;65(11):3350-3359. Epub 2020 Jan 6.

Presentations and Abstracts

- Clinical Cases in Hepatology: Just Another LFT Abnormality Referral, 2019 Annual Update in Medical Hepatology, Pittsburgh, PA, December 2019.

Honors and Awards

- Winner, American Liver Foundation (ALF) Academic Debate, American Liver Foundation meeting, Cleveland, OH, December 2019.

Debbie Cheng, MD

Honors and Awards

- Cornerstones Health Best of DDW in IBD Fellow, Digestive Disease Week, Virtual, May 2020.

Presentations and Abstracts

- Non-biologics in Pregnancy, IBD Collaborative, Pittsburgh, September 2019.
- Poster of Distinction: Differential Antibiotic and Anti-fungal Treatment Requirements and Multiyear Disease Severity in IBD Patients Stratified by Anti-saccharomyces Serologic Status, Digestive Disease Week, Virtual, May 2020.
- Multiyear Comparison of Influence of Anti-saccharomyces Cerevisiae Antibodies on Inflammatory Bowel Disease Severity (oral presentation), Digestive Disease Week, Virtual, May 2020.

Furkan Ertem, MD

Publications

- **Ertem FU**, Hartman D, Brand RE. Unusual Infection of the Small Intestine: Mycobacterium avium Complex. Clin Gastroenterol Hepatol. 2020 Feb 7:S1542-3565(20)30122-1.

Presentations and Abstracts

- Debate: First Line Medical Therapy vs. Surgical Therapy for Complicated Crohn's Disease, IBD Collaborative, Pittsburgh, PA, February 2020.
- Biomarkers Associated with Early Endoscopic Recurrence of Postoperative Crohn's Disease, Digestive Disease Week, Virtual, May 2020.

Amir-Ali Ghaffari, MD, PhD

Publications

- Ding X, Krutzik PO, **Ghaffari AA**, Zhaozhi Y, Miranda D Jr, Cheng G, Ho CM, Nolan GP, Sanchez DJ. Cellular Signaling Analysis shows antiviral, ribavirin-mediated ribosomal signaling modulation. Antiviral Res. 2019 Nov;171:104598.

Adam Gluskin, MD

Publications

- **Gluskin AB**, Dueker JM, El Hag M, Puthenpurayil KJ, Bataller R. Alcoholic hepatitis masquerading as tumor infiltration: Reversibility after abstinence. Clin Case Rep. 2019 Sep 30;7(11):2174-2176.

Amir Gougol, MD

Publications

- Tsen A, Han S, Moreau C, Akshintala VS, Yazici C, Archibugi L, Hopson P, **Gougol A**, Jin D, Paragomi P, Kamal A, Valverde-López F, Papachristou GI, Park WG, Lee PJ; Collaborative Alliance for Pancreatic Education and Research. The State of Mentorship and Pancreatic Research Among Trainees in Pancreatology: A Multinational Survey Study. *Pancreas*. 2020 Mar;49(3):336-340.
- Matta B, **Gougol A**, Gao X, Reddy N, Talukdar R, Kochhar R, Goenka MK, Gulla A, Gonzalez JA, Singh VK, Ferreira M, Stevens T, Barbu ST, Nawaz H, Gutierrez SC, Zarnescu NO, Capurso G, Easler J, Triantafyllou K, Pelaez-Luna M, Thakkar S, Ocampo C, de-Madaria E, Cote GA, Wu BU, Paragomi P, Pothoulakis I, Tang G, Papachristou GI. Worldwide Variations in Demographics, Management, and Outcomes of Acute Pancreatitis. *Clin Gastroenterol Hepatol*. 2020 Jun;18(7):1567-1575.e2.

Ru Min Lee, MD

Presentations and Abstracts

- An Analysis of the Burden of PERT Use in the United States in Non-pancreatic Conditions (NPC), Digestive Disease Week, Virtual, May 2020.

Jacob Lipkin, MD

Publications

- Loloi J, **Lipkin JS**, Gagliardi EM, Levenick JM. Assessing spontaneous passage of prophylactic pancreatic duct stents by X-ray: is a radiology report adequate? *Ther Adv Gastrointest Endosc*. 2019 Jul 16;12:2631774519862895.

Akshata Moghe, MD, PhD

Publications

- Ruiz de Galarreta M, Bresnahan E, Molina-Sánchez P, Lindblad KE, Maier B, Sia D, Puigvehi M, Miguela V, Casanova-Acebes M, Dhainaut M, Villacorta-Martin C, Singhi AD, **Moghe A**, von Felden J, Tal Grinspan L, Wang S, Kamphorst AO, Monga SP, Brown BD, Villanueva A, Llovet JM, Merad M, Lujambio A. β -Catenin Activation Promotes Immune Escape and Resistance to Anti-PD-1 Therapy in Hepatocellular Carcinoma. *Cancer Discov*. 2019 Aug;9(8):1124-1141.
- **Moghe A**, Klinge M, Jonassaint N. PRO: This Patient Should Have a Liver Biopsy. *Clin Liver Dis (Hoboken)*. 2019 Oct 9;14(3):112-115.
- Kuo SZ, Ahmad M, Dunn MA, Montano-Loza AJ, Carey EJ, Lin S, **Moghe A**, Chen HW, Ebadi M, Lai JC. Sarcopenia Predicts Post-transplant Mortality in Acutely Ill Men Undergoing Urgent Evaluation and Liver Transplantation. *Transplantation*. 2019 Nov;103(11):2312-2317.
- Zhang G, Patel K, **Moghe A**, Reid A, Serper M, Calgaro L, Gibson S, Zickmund S, Shaikh O, Rogal S. Provider Perceptions of Hepatitis C Treatment Adherence and Initiation. *Dig Dis Sci*. 2020 May;65(5):1324-1333.
- **Moghe A**, Monga SP. BCL9/BCL9L in hepatocellular carcinoma: will it or Wnt it be the next therapeutic target? *Hepatol Int*. 2020 Jul;14(4):460-462.

Presentations and Abstracts

- The Poop Scoop: Stool-based Diagnoses Made Ridiculously Simple, 2019 Update in Internal Medicine: Advances Changing Practice, Pittsburgh, PA, October 2019.
- Sarcopenia predicts Mortality after Transjugular Intrahepatic Portosystemic Shunt Placement, AASLD The Liver Meeting, San Francisco, CA, November 2019.
- Sarcopenia as a Tool to Predict Post-Liver Transplant (LT) Mortality in the Acutely Ill LT

Candidate, AASLD The Liver Meeting, San Francisco, CA, November 2019.

- Clinical Cases in Hepatology: Seize this Pain: A Curious Case of Acute Intermittent Prophyria, 2019 Annual Update in Medical Hepatology, Pittsburgh, PA, December 2019.

Honors and Awards

- ACG Case Reports - Journal Editor Travel Grant, 2019 ACG Annual Meeting, San Antonio, TX, October 2019.
- AGA-AASLD Academic Skills Workshop: 2020 Selection & Travel Grant, 2020 AGA-AASLD Academic Skills Workshop, Charlotte, NC, February 2020.
- Pittsburgh Liver Research Center Pilot Award (NIH/NIDDK P30DK120531), University of Pittsburgh, Pittsburgh, PA, April 2020.

Stephanie Romutis, MD

Presentations and Abstracts

- Association of Colonoscopy Preparation and Volume of Colonic Water Irrigation with Serum Electrolyte Abnormalities, Digestive Disease Week, Virtual, May 2020.

R. Warren Sands, MD, PhD

Presentations and Abstracts

- Clinical Cases in Hepatology: Anemia and Bleeding?, 2019 Annual Update in Medical Hepatology, Pittsburgh, PA, December 2019.
- Targeted Tolerogenic Therapy in IBD, University of Pittsburgh Department of Medicine Research Day, Virtual, April 2020.
- Targeted Tolerogenic Therapy in IBD, Controlled Release Society Annual Meeting, Virtual, June 2020.

Honors and Awards

- AGA/AASLD Academic Skills Workshop Scholarship Award Winner, AGA/AASLD Biannual Research Meeting, Charlotte, NC, February 2020.

Ajay Singhvi, MD

Presentations and Abstracts

- Coexistence of Alcoholic Liver Disease (ALD) and Alcoholic Pancreatitis (ALP), PancreasFest 2019, Pittsburgh, PA, July 2019.

Honors and Awards

- Collaborative Alliance for Pancreatic Education & Research (CAPER) Scholar, CAPER, national, July 2019.
- Cedars-Sinai Endoscopy Symposium Travel Grant, Cedars-Sinai International Endoscopy Symposium, Los Angeles, CA, January 2020.

Sunny Tao, MD

Presentations and Abstracts

- Frailty Prior to Hospital Discharge Predicts Mortality After Cirrhosis-related Admissions, American Transplant Congress, Virtual, May 2020.

Kishore Vipperla, MD

Publications

- Dasyam AK, **Vipperla K**, Slivka A, Gong T, Papachristou GI, Whitcomb DC, Yadav D. Computed tomography based scoring system in a prospectively ascertained cohort of patients with chronic pancreatitis. *Pancreatology*. 2019 Dec;19(8):1027-1033.

Presentations and Abstracts

- Pain “Burn Out” During the Natural Disease Course is Independence of the Duration of Chronic Pancreatitis, PancreasFest 2019, Pittsburgh, PA, July 2019.

Postdoctoral Fellows and Activities

Brandon Blobner, PhD

Mentor: David Whitcomb, MD, PhD

Dr. Blobner investigates pancreas genetics.

Brian Edwards, PhD

Mentor: Brian Davis, PhD

Dr. Edwards is interested in the connections between sympathetic postganglionic neurons & visceral afferents for abdominal & pelvic organs.

Vikram K. Raghu, PhD

Mentor: Kenneth J. Smith, MD, MS

Dr. Raghu’s research centers on clinical decision analysis to improve care for intestinal failure patients.

Publications

- **Raghu VK**, Beaumont JL, Everly MJ, Venick RS, Lacaille F, Mazariegos GV. Pediatric intestinal transplantation: Analysis of the intestinal transplant registry. *Pediatr Transplant*. 2019 Dec;23(8):e13580. Epub 2019 Sep 18.
- **Raghu VK**, Rudolph JA, Smith KJ. Cost-effectiveness of teduglutide in pediatric patients with short bowel syndrome: Markov modeling using traditional cost-effectiveness criteria. *Am J Clin Nutr*. 2020 Oct 6:nqaa278. Epub ahead of print.
- **Raghu VK**, Rudolph JA, Jalal HJ, Smith KJ. Microsimulation Model to Compare Enteral and Parenteral Iron Supplementation in Children With Intestinal Failure. *JPEN J Parenter Enteral Nutr*. 2020 Jun 8. Epub ahead of print.
- **Raghu VK**, Binion DG, Smith KJ. Cost-effectiveness of teduglutide in adult patients with short bowel syndrome: Markov modeling using traditional cost-effectiveness criteria. *Am J Clin Nutr*. 2020 Jan 1;111(1):141-148.

Presentations and Abstracts

- Poster of Distinction: Cost-effectiveness of Teduglutide in Adult Patients with Intestinal Failure: Markov Modeling Using Traditional Cost-effectiveness Criteria, Congress of the Intestinal Rehabilitation and Transplant Association, Paris, France, July 2019.
- Cost-effectiveness of Parenteral or Enteral Iron Supplementation in Children with Intestinal Failure: A Microsimulation Study, NASPGHAN Annual Meeting, Chicago, IL, October 2019.
- Poster of Distinction: Cost-effectiveness of Tedeglutide in Pediatric Patients with Intestinal Failure Using Markov Modeling, NASPGHAN Annual Meeting, Chicago, IL, October 2019.
- Caregiver Preferences Regarding Decision-making in Children with Intestinal Failure: A Qualitative Study Focusing on Iron Supplementation, Pediatric Intestinal Failure and rehabilitation Symposium, Virtual, June 2020.
- Tedeglutide for the Achievement of Enteral Autonomy in Short Bowel Syndrome with Intestinal Failure: A Systematic Review and Meta-analysis, Pediatric Intestinal Failure and Rehabilitation Symposium, Virtual, June 2020.
- Effect of Adherence on the Cost-effectiveness of Enteral Iron Supplementation

in Children with intestinal Failure, Pediatric Intestinal Failure and Rehabilitation Symposium, Virtual, June 2020.

- Poster of Distinction: Cost-effectiveness of Teduglutide in Pediatric Patients with Short Bowel Syndrome with Intestinal Failure: Markov Modeling Using Traditional Cost-effectiveness Criteria, Pediatric Intestinal Failure and Rehabilitation Symposium, Virtual, June 2020.

Honors and Awards

- IRTA-TTS Scientific Travel Award, Congress of the Intestinal Rehabilitation and Transplant Association, Paris, France, July 2019.

Roger Warren Sands, MD, PhD

Mentor: David Whitcomb, MD, PhD

Dr. Sands's research focuses on identifying aberrant signaling pathways in IBD and drug repurposing in alcoholic hepatitis.

Publications

- **Sands RW**, Verbeke CS, Ouhara K, Silva EA, Hsiong S, Kawai T, Mooney D. Tuning cytokines enriches dendritic cells and regulatory T cells in the periodontium. *J Periodontol.* 2020 Nov;91(11):1475-1485. Epub 2020 Apr 20.

Presentations and Abstracts

- Targeted Tolerogenic Therapy in IBD, University of Pittsburgh Department of Medicine Annual Research Day, April 2020. *Cancelled due to COVID-19 Pandemic*
- Targeted Tolerogenic Therapy in IBD, Oral Presentation, Controlled Release Society Annual Meeting, Virtual, June 2020.

Honors and Awards

- AGA/AASLD Academic Skills Workshop Scholarship Award Winner, AGA/AASD Biannual Research Meeting, Charlotte, NC, February 2020.

Wasseem Skef, MD

Mentor: Jennifer Chennat, MD

Dr. Skef is interested in advanced endoscopy.

Publications

- **Skef W**, McGrath K. Pancreatic cyst through-the-needle biopsy: two's the charm. *Gastrointest Endosc.* 2019 Dec;90(6):944-946.
- **Skef W**, Agarwal M, Mikolajczyk AE. Position 1: Transarterial Chemoembolization Should Be the Primary Locoregional Therapy for Unresectable Hepatocellular Carcinoma. *Clin Liver Dis (Hoboken).* 2020 Mar 26;15(2):71-73.
- Pagani W, Sheikh U, **Skef W**. Resectable Anal Melanoma Detected by Rectal Retroflexion. *Clin Gastroenterol Hepatol.* 2020 Apr 6:S1542-3565(20)30438-9.

Presentations and Abstracts

- Proactive EUS-guided Fine-needle Aspiration and/or Biopsy (EUS-FNA/B) Tissue Collection in Pancreatic Bile Duct Adenocarcinoma (PDAC) Allows for Comprehensive Genomic Profiling (CGP), Oral Presentation, Digestive Disease Week, Virtual, May 2020.

ONE-YEAR BIBLIOGRAPHY

July 1, 2019 to June 30, 2020

Non-original research publications are in italics. Gastroenterology faculty are in **bold**.

- Abu-El-Hajja M, Anazawa T, Beilman GJ, Beselink MG, Del Chiaro M, Demir IE, Dennison AR, Dudeja V, Freeman ML, Friess H, Hackert T, Kleeff J, Laukkarinen J, Levy MF, Nathan JD, Werner J, Windsor JA, Neoptolemos JP, Sheel ARG, Shimosegawa T, **Whitcomb DC**, Bellin MD. The role of total pancreatectomy with islet autotransplantation in the treatment of chronic pancreatitis: A report from the International Consensus Guidelines in chronic pancreatitis. *Pancreatology*. 2020 Jun;20(4):762-771. Epub 2020 Apr 14.
- Akshintala VS, Kamal A, Faghih M, Cutting GR, Cebotaru L, West NE, Jennings MT, Dezube R, **Whitcomb DC**, Lechtzin N, Merlo CA, Singh VK. Cystic fibrosis transmembrane conductance regulator modulators reduce the risk of recurrent acute pancreatitis among adult patients with pancreas sufficient cystic fibrosis. *Pancreatology*. 2019 Dec;19(8):1023-1026. Epub 2019 Sep 28.
- Altamirano J, Qi Q, Choudhry S, Abdallah M, Singal AK, Humar A, **Battaller R**, Borhani AA, **Duarte-Rojo A**. Non-invasive diagnosis: non-alcoholic fatty liver disease and alcoholic liver disease. *Transl Gastroenterol Hepatol*. 2020 Apr 5;5:31. eCollection 2020.
- Archambault AN, Su YR, Jeon J, Thomas M, Lin Y, Conti DV, Win AK, Sakoda LC, Lansdorp-Vogelaar I, Peterse EFP, Zauber AG, Duggan D, Holowatyj AN, Huyghe JR, Brenner H, Cotterchio M, Bézieau S, Schmit SL, Edlund CK, Southey MC, MacInnis RJ, Campbell PT, Chang-Claude J, Slattery ML, Chan AT, Joshi AD, Song M, Cao Y, Woods MO, White E, Weinstein SJ, Ulrich CM, Hoffmeister M, Bien SA, Harrison TA, Hampe J, Li CI, Schafmayer C, Offit K, Pharoah PD, Moreno V, Lindblom A, Wolk A, Wu AH, Li L, Gunter MJ, Gsur A, Keku TO, Pearlman R, Bishop DT, Castellví-Bel S, Moreira L, Vodicka P, Kampman E, Giles GG, Albanes D, Baron JA, Berndt SI, Brezina S, Buch S, Buchanan DD, Trichopoulos A, Severi G, Chirlaque MD, Sánchez MJ, Palli D, Kühn T, Murphy N, Cross AJ, Burnett-Hartman AN, Chanock SJ, de la Chapelle A, Easton DF, Elliott F, English DR, Feskens EJM, FitzGerald LM, Goodman PJ, Hopper JL, Hudson TJ, Hunter DJ, Jacobs EJ, Joshi CE, Küry S, Markowitz SD, Milne RL, Platz EA, Rennert G, Rennert HS, Schumacher FR, Sandler RS, Seminara D, Tangen CM, Thibodeau SN, Toland AE, van Duynhoven FJB, Visvanathan K, Vodickova L, Potter JD, Männistö S, Weigl K, Figueroa J, Martín V, Larsson SC, Parfrey PS, Huang WY, Lenz HJ, Castelao JE, Gago-Dominguez M, Muñoz-Garzón V, Mancao C, Haiman CA, Wilkens LR, Siegel E, Barry E, Youngusband B, Van Guelpen B, Harlid S, Zeleniuch-Jacquotte A, Liang PS, Du M, Casey G, Lindor NM, Le Marchand L, Gallinger SJ, Jenkins MA, Newcomb PA, Gruber SB, **Schoen RE**, Hampel H, Corley DA, Hsu L, Peters U, Hayes RB. Cumulative Burden of Colorectal Cancer-Associated Genetic Variants Is More Strongly Associated With Early-Onset vs Late-Onset Cancer. *Gastroenterology*. 2020 Apr;158(5):1274-1286.e12. Epub 2019 Dec 19.
- Argemi J, **Battaller R**. Hepatocyte-stellate cell synapse in alcohol-induced steatosis: another role for endocannabinoids. *Nat Rev Gastroenterol Hepatol*. 2020 Jan;17(1):5-6.
- Argemi J, Latasa MU, Atkinson SR, Blokhin IO, Massey V, Gue JP, Cabezas J, Lozano JJ, Van Booven D, Bell A, Cao S, Verneti LA, Arab JP, Ventura-Cots M, Edmunds LR, Fondevilla C, Stärkel P, Dubuquoy L, Louvet A, Odena G, Gomez JL, Aragon T, Altamirano J, Caballeria J, Jurczak MJ, Taylor DL, Berasain C, Wahlestedt C, Monga SP, Morgan MY, Sancho-Bru P, Mathurin P, Furuya S, Lackner C, Rusyn I, Shah VH, Thursz MR, Mann J, Avila MA, **Battaller R**. Defective HNF4alpha-dependent gene expression as a driver of hepatocellular failure in alcoholic hepatitis. *Nat Commun*. 2019 Jul 16;10(1):3126.
- Aroniadis OC, DiMaio CJ, Dixon RE, Elmunzer BJ, Kolb JM, Mendelsohn R, Ordiah CO, Rockey DC, Singal AG, Spitzer RL, Tierney WM, Wani S, **Yadav D**; North American Alliance for the Study of Digestive Manifestations of Covid-19. Current Knowledge and Research Priorities in the Digestive Manifestations of COVID-19. *Clin Gastroenterol Hepatol*. 2020 Jul;18(8):1682-1684. Epub 2020 Apr 22.
- Arteel GE**, Naba A. The liver matrisome - looking beyond collagens. *JHEP Rep*. 2020 Apr 18;2(4):100115. eCollection 2020 Aug.
- Artru F, Bou Saleh M, Maggioletto F, Lassailly G, Ningarhari M, Demaret J, Ntandja-Wandji LC, Pais de Barros JP, Labreuche J, Drumez E, Helou DG, Dharancy S, Gantier E, Périanin A, Chollet-Martin S, **Battaller R**, Mathurin P, Dubuquoy L, Louvet A. IL-33/ST2 pathway regulates neutrophil migration and predicts outcome in patients with severe alcoholic hepatitis. *J Hepatol*. 2020 Jun;72(6):1052-1061. Epub 2020 Jan 15.
- Atkinson SR, Hamesch K, Spivak I, Guldiken N, Cabezas J, Argemi J, Theurl I, Zoller H, Cao S, Mathurin P, Shah VH, Trautwein C, **Battaller R**, Thursz MR, Strnad P. Serum Transferrin Is an Independent Predictor of Mortality in Severe Alcoholic Hepatitis. *Am J Gastroenterol*. 2020 Mar;115(3):398-405.
- Avila MA, Dufour JF, Gerbes AL, Zoulim F, **Battaller R**, Burra P, Cortez-Pinto H, Gao B, Gilmore I, Mathurin P, Moreno C, Poznyak V, Schnabl B, Szabo G, Thiele M, Thursz MR. Recent advances in alcohol-related liver disease (ALD): summary of a Gut round table meeting. *Gut*. 2020 Apr;69(4):764-780. Epub 2019 Dec 26.
- Bajaj JS, Lauridsen M, Tapper EB, **Duarte-Rojo A**, Rahimi RS, Tandon P, Shawcross DL, Thabut D, Dhiman RK, Romero-Gomez M, Sharma BC, Montagnese S. Important Unresolved Ques-

tions in the Management of Hepatic Encephalopathy: An ISHEN Consensus. *Am J Gastroenterol*. 2020 Mar 30. Online ahead of print.

Bataller R, Cabezas J, Aller R, Ventura-Cots M, Abad J, Albillos A, Altamirano J, Arias-Loste MT, Bañares R, Caballería J, Caballería L, Carrión JA, Diago M, Fernández Rodríguez C, Gallego R, García-Cortes M, García-Monzón C, Genescà J, Ginés P, Hernandez-Guerra M, Jorquera F, Lligoña A, Molina E, Pareja MJ, Planas R, Tomé S, Salmerón J, Romero-Gómez M. Alcohol-related liver disease. *Clinical practice guidelines. Consensus document sponsored by AEEH. Gastroenterol Hepatol*. 2019 Dec;42(10):657-676. Epub 2019 Nov 23.

Brand RE, Dudley B, Karloski E, **Das R**, Fuhrer K, Pai RK, Pai RK. Detection of DNA mismatch repair deficient crypts in random colonoscopic biopsies identifies Lynch syndrome patients. *Fam Cancer*. 2020 Apr;19(2):169-175.

Burbridge C, Randall JA, Sanchez RJ, Dansky H, Symonds T, Girman CJ, Strayer JA, Selk KL, **Whitcomb DC**, Kershaw EE. Symptoms and Dietary Impact in Hypertriglyceridemia-Associated Pancreatitis: Development and Content Validity of Two New Measures. *Pharmacoecon Open*. 2020 Mar;4(1):191-201.

Butt AA, Yan P, Aslam S, **Shaikh OS**, Abou-Samra AB. Hepatitis C Virus (HCV) Treatment With Directly Acting Agents Reduces the Risk of Incident Diabetes: Results From Electronically Retrieved Cohort of HCV Infected Veterans (ERCHIVES). *Clin Infect Dis*. 2020 Mar 3;70(6):1153-1160.

Campbell PT, Ambrosone CB, Nishihara R, Aerts HJWL, Bondy M, Chatterjee N, Garcia-Closas M, Giannakis M, Golden JA, Heng YJ, Kip NS, Koshiol J, Liu XS, Lopes-Ramos CM, Mucci LA, Nowak JA, Phipps AJ, Quackenbush J, **Schoen RE**, Sholl LM, Tamimi RM, Wang M, Weijenberg MP, Wu CJ, Wu K, Yao S, Yu KH, Zhang X, Rebbeck TR, Ogino S. *Proceedings of the fourth international molecular pathological epidemiology (MPE) meeting. Cancer Causes Control*. 2019 Aug;30(8):799-811. Epub 2019 May 8.

Cannella R, Minervini MI, **Rachakonda V**, Bollino G, Furlan A. Liver stiffness measurement in patients with nodular regenerative hyperplasia undergoing magnetic resonance elastography. *Abdom Radiol (NY)*. 2020 Feb;45(2):373-383.

Carey EJ, Lai JC, Sonnenday C, Tapper EB, Tandon P, **Duarte-Rojo A**, **Dunn MA**, Tsien C, Kallwitz ER, Ng V, Dasarathy S, Kappus M, Bashir MR, Montano-Loza AJ. A North American Expert Opinion Statement on Sarcopenia in Liver Transplantation. *Hepatology*. 2019

Nov;70(5):1816-1829. Epub 2019 Aug 19.

Chen HW, Ferrando A, White MG, Dennis RA, Xie J, Pauly M, Park S, Bartter T, **Dunn MA**, Ruiz-Margain A, Kim WR, **Duarte-Rojo A**. Home-Based Physical Activity and Diet Intervention to Improve Physical Function in Advanced Liver Disease: A Randomized Pilot Trial. *Dig Dis Sci*. 2020 Jan 6. Online ahead of print.

Chen HW, Ferrando AA, **Dunn MA**, Kim WR, **Duarte-Rojo A**. Cadence From Physical Activity Trackers for Monitoring of Home-Based Exercise Intensity in Advanced Liver Disease. *Liver Transpl*. 2020 May;26(5):718-721. Epub 2020 Apr 3.

Choudhury A, Bullock D, Lim A, Argemi J, Orning P, Lien E, **Bataller R**, Mandrekar P. Inhibition of HSP90 and Activation of HSF1 Diminish Macrophage NLRP3 Inflammasome Activity in Alcohol-Associated Liver Injury. *Alcohol Clin Exp Res*. 2020 Jun;44(6):1300-1311. Epub 2020 May 18.

Coates MD, Seth N, Clarke K, Abdul-Baki H, Mahoney N, Walter V, Regueiro MD, Ramos-Rivers C, Koutroubakis IE, Bielefeldt K, **Binion DG**. Opioid Analgesics Do Not Improve Abdominal Pain or Quality of Life in Crohn's Disease. *Dig Dis Sci*. 2020 Aug;65(8):2379-2387. Epub 2019 Nov 22.

Correnti J, Lin C, Bretschneider J, Kuriakose A, Jeon S, Scorletti E, Oranu A, McIver-Jenkins D, Kaneza I, Buyco D, Saiman Y, Furth EE, Argemi J, **Bataller R**, Holland WL, Carr RM. Liver-specific ceramide reduction alleviates steatosis and insulin resistance in alcohol-fed mice. *J Lipid Res*. 2020 Jul;61(7):983-994. Epub 2020 May 12.

Coté GA, Durkalski-Mauldin VL, Serrano J, Klintworth E, Williams AW, Cruz-Monserrate Z, Arain M, Buxbaum JL, Conwell DL, Fogel EL, Freeman ML, Gardner TB, van Geenen E, Groce JR, Jonnalagadda SS, Keswani RN, Menon S, Moffatt DC, Papachristou GI, Ross A, Tarnasky PR, Wang AY, Wilcox CM, Hamilton F, **Yadav D**; SHARP Consortium. *SpHincterotomy for Acute Recurrent Pancreatitis Randomized Trial: Rationale, Methodology, and Potential Implications. Pancreas*. 2019 Sep;48(8):1061-1067.

Cranston RD, Dezzutti CS, Siegel A, Engstrom J, Shetler C, Richardson-Harman N, Abebe KZ, Back D, Else L, Egan D, Khoo S, Egan JE, Stall R, Williams P, **Brand RM**, Parikh UM, McGowan I. A Multiple Dose Phase 1 Assessment of Rilpivirine Long Acting in a Model

of Preexposure Prophylaxis Against HIV. *AIDS Res Hum Retroviruses*. 2019 Sep;35(9):794-804. Epub 2019 Jul 16.

Crow LD, Jambusaria-Pahlajani A, Chung CL, Baran DA, Lowenstein SE, Abdelmalek M, Ahmed RL, Anadkat MJ, Arcasoy SM, Berg D, Bibee KP, Billingsley E, Black WH, Blalock TW, Bleicher M, Brennan DC, Brodland DG, Brown MR, Carroll BT, Carucci JA, Chang TW, Chaux G, Cusack CA, Dilling DF, Doyle A, Emtiazjoo AM, Ferguson NH, Fosko SW, Fox MC, Goral S, Gray AL, Griffin JR, Hachem RR, Hall SA, Hanlon AM, Hayes D Jr, Hickey GW, Holtz J, Hopkins RS, Hu J, Huang CC, Brian Jiang SI, Kapnadak SG, Kraus ES, Lease ED, Leca N, Lee JC, Leitenberger JJ, Lim MA, Longo MI, **Malik SM**, Mallea JM, Menter A, Myers SA, Neuburg M, Nijhawan RI, Norman DJ, Otley CC, Paek SY, Parulekar AD, Patel MJ, Patel VA, Patton TJ, Pugliano-Mauro M, Ranganna K, Ravichandran AK, Redenius R, Roll GR, Samie FH, Shin T, Singer JP, Singh P, Soon SL, Soriano T, Squires R, Stasko T, Stein JA, Taler SJ, Terrault NA, Thomas CP, Tokman S, Tomic R, Twigg AR, Wigger MA, Zeitouni NC, Arron ST. *Initial skin cancer screening for solid organ transplant recipients in the United States: Delphi method development of expert consensus guidelines. Transpl Int*. 2019 Dec;32(12):1268-1276. Epub 2019 Oct 8.

Dasyam AK, Vippera K, **Slivka A**, Gong T, Papachristou GI, **Whitcomb DC**, **Yadav D**. Computed tomography based scoring system in a prospectively ascertained cohort of patients with chronic pancreatitis. *Pancreatol*. 2019 Dec;19(8):1027-1033. Epub 2019 Oct 11.

Davison JM, Goldblum J, Grewal US, **McGrath K**, **Fasanella K**, Deitrick C, DeWard AD, Bossart EA, Hayward SL, Zhang Y, Critchley-Thorne RJ, Thota PN. Independent Blinded Validation of a Tissue Systems Pathology Test to Predict Progression in Patients With Barrett's Esophagus. *Am J Gastroenterol*. 2020 Jun;115(6):843-852.

de Oliveira C, Khatua B, Noel P, Kostenko S, Bag A, Balakrishnan B, Patel KS, Guerra AA, Martinez MN, Trivedi S, McCullough A, Lam-Himlin DM, Navina S, Faigel DO, Fukami N, Pannala R, **Phillips AE**, Papachristou GI, Kershaw EE, Lowe ME, Singh VP. Pancreatic triglyceride lipase mediates lipotoxic systemic inflammation. *J Clin Invest*. 2020 Apr 1;130(4):1931-1947.

Demir IE, Reyes CM, Alrawashdeh W, Ceyhan GO, Deborde S, Friess H, Görgülü K, Istvanffy R, Jungwirth D, Kuner R, Maryanovich M, Na'ara S, Renders S, **Saloman JL**, Scheff NN, Steinfadt H, Stupakov P, Thiel V, Verma D, Yilmaz BS, White RA, Wang TC, Wong RJ, Frenette PS, Gil Z, Davis BM. *Clinically Actionable Strategies for Studying Neural Influences in Cancer. Cancer Cell*. 2020 Jul 13;38(1):11-14.

Epub 2020 Jun 11.

Din H, Anderson AJ, Ramos Rivers C, **Proksell S**, Koutroumpakis F, Salim T, Babichenko D, Tang G, Koutroubakis IE, **Schwartz M**, **Johnston E**, Barrie A, **Harrison J**, **Hashash J**, **Dunn MA**, Hartman DJ, **Binion DG**. Disease Characteristics and Severity in Patients With Inflammatory Bowel Disease With Coexistent Diabetes Mellitus. *Inflamm Bowel Dis*. 2020 Jan 16;izz305. Online ahead of print.

Dolin CE, **Arteel GE**. *The Matrisome, Inflammation, and Liver Disease*. *Semin Liver Dis*. 2020 May;40(2):180-188. Epub 2020 Jan 7.

Douville C, Cohen JD, Ptak J, Popoli M, Schaefer J, Silliman N, Dobbyn L, **Schoen RE**, Tie J, Gibbs P, Goggins M, Wolfgang CL, Wang TL, Shih IM, Karchin R, Lennon AM, Hruban RH, Tomasetti C, Bettgowda C, Kinzler KW, Papadopoulos N, Vogelstein B. Assessing aneuploidy with repetitive element sequencing. *Proc Natl Acad Sci U S A*. 2020 Mar 3;117(9):4858-4863. Epub 2020 Feb 19.

Drewes AM, Olesen AE, Farmer AD, **Szigethy E**, Rebours V, Olesen SS. *Gastrointestinal pain*. *Nat Rev Dis Primers*. 2020 Jan 6;6(1):1.

Duan Y, Llorente C, Lang S, Brandl K, Chu H, Jiang L, White RC, Clarke TH, Nguyen K, Torralba M, Shao Y, Liu J, Hernandez-Morales A, Lessor L, Rahman IR, Miyamoto Y, Ly M, Gao B, Sun W, Kiesel R, Hutmacher F, Lee S, Ventura-Cots M, Bosques-Padilla F, Verna EC, Abrales JG, Brown RS Jr, Vargas V, Altamirano J, Caballería J, Shawcross DL, Ho SB, Louvet A, Lucey MR, Mathurin P, Garcia-Tsao G, **Bataller R**, Tu XM, Eckmann L, van der Donk WA, Young R, Lawley TD, Stärkel P, Pride D, Fouts DE, Schnabl B. Bacteriophage targeting of gut bacterium attenuates alcoholic liver disease. *Nature*. 2019 Nov;575(7783):505-511. Epub 2019 Nov 13.

Dudley B, **Brand RE**. *Pancreatic Cancer Surveillance: Who, When, and How*. *Curr Treat Options Gastroenterol*. 2019 Dec;17(4):681-691.

Dueker JM, **Khalid A**. Performance of the Veterans Choice Program for Improving Access to Colonoscopy at a Tertiary VA Facility. *Fed Pract*. 2020 May;37(5):224-228.

Dum RP, **Levinthal DJ**, Strick PL. The mind-body problem: Circuits that link the cerebral cortex to the adrenal medulla. *Proc Natl Acad Sci U S A*. 2019

Dec 23;116(52):26321-8. Online ahead of print.

Dunn MA, **Rogal SS**, **Duarte-Rojo A**, Lai JC. *Physical Function, Physical Activity, and Quality of Life After Liver Transplantation*. *Liver Transpl*. 2020 May;26(5):702-708.

Dunn MA. *The Gain Is Worth the Pain: Home-Based Exercise in Liver Transplantation*. *Liver Transpl*. 2019 Jul;25(7):989-990. Epub 2019 May 21.

Eom KY, Jarlenski M, **Schoen RE**, Robertson L, Sabik LM. Sex differences in the impact of Affordable Care Act Medicaid expansion on colorectal cancer screening. *Prev Med*. 2020 Sep;138:106171. Epub 2020 Jun 24.

Ertem FU, Hartman D, **Brand RE**. *Unusual Infection of the Small Intestine: Mycobacterium avium Complex*. *Clin Gastroenterol Hepatol*. 2020 Feb 7;S1542-3565(20)30122-1. Online ahead of print.

Esposito I, Hruban RH, Verbeke C, Terris B, Zamboni G, Scarpa A, Morohoshi T, Suda K, Luchini C, Klimstra DS, Adsay V, Haeblerle L, Saluja A, Fernandez-Del Castillo C, Sheel A, Neoptolemos JP, Isaji S, Shimosegawa T, **Whitcomb DC**, Campbell F; Working group for the International (IAP), APA, JPS, EPC Consensus Guidelines for Chronic Pancreatitis. *Guidelines on the histopathology of chronic pancreatitis. Recommendations from the working group for the international consensus guidelines for chronic pancreatitis in collaboration with the International Association of Pancreatology, the American Pancreatic Association, the Japan Pancreas Society, and the European Pancreatic Club*. *Pancreatol*. 2020 Jun;20(4):586-593. Epub 2020 Apr 29.

Ezaz G, Leffler DA, Beach S, **Schoen RE**, Crockett SD, Gourevitch RA, Rose S, Morris M, Carrell DS, **Greer JB**, Mehrotra A. Association Between Endoscopist Personality and Rate of Adenoma Detection. *Clin Gastroenterol Hepatol*. 2019 Jul;17(8):1571-1579.e7. Epub 2018 Oct 13.

Fasanella K, **McGrath K**. *The Ice Age reborn?* *Gastrointest Endosc*. 2019 Aug;90(2):213-214.

Favazza LA, Parseghian CM, Kaya C, Nikiforova MN, Roy S, Wald AI, Landau MS, **Proksell SS**, **Dueker JM**, **Johnston ER**, **Brand RE**, Bahary N, Gorantla VC, Rhee JC, Pingpank JF, Choudry HA, Lee K, Paniccia A, Ongchin MC, Zureikat AH, Bartlett DL, Singhi AD. KRAS amplification in metastatic colon cancer is associated with a history of inflammatory bowel disease and may confer resistance to anti-EGFR therapy. *Mod Pathol*. 2020 May 6. Online ahead of print.

Forsmark CE, Tang G, Xu H, Tuft M,

Hughes SJ, **Yadav D**. The use of pancreatic enzyme replacement therapy in patients with a diagnosis of chronic pancreatitis and pancreatic cancer in the US is infrequent and inconsistent. *Aliment Pharmacol Ther*. 2020 May;51(10):958-967. Epub 2020 Apr 6.

Francis FF, Kulich S, **Hashash JG**. *Duodenal Scalloping Indicate Waldenström Macroglobulinemia*. *Clin Gastroenterol Hepatol*. 2019 Aug;17(9):A17-A18. Epub 2018 Apr 13.

Fu CP, Ali H, **Rachakonda VP**, Oczypok EA, DeLany JP, Kershaw EE. The ZJU index is a powerful surrogate marker for NAFLD in severely obese North American women. *PLoS One*. 2019 Nov 26;14(11):e0224942. eCollection 2019.

Furlan A, Tublin ME, Yu L, **Chopra KB**, Lippello A, **Behari J**. Comparison of 2D Shear Wave Elastography, Transient Elastography, and MR Elastography for the Diagnosis of Fibrosis in Patients With Nonalcoholic Fatty Liver Disease. *AJR Am J Roentgenol*. 2020 Jan;214(1):W20-W26. Epub 2019 Nov 12.

Furuya S, Argemi J, Uehara T, Katou Y, Fouts DE, Schnabl B, Dubuquoy L, Belorkar A, Vadigepalli R, Kono H, **Bataller R**, Rusyn I. A Novel Mouse Model of Acute-on-Chronic Cholestatic Alcoholic Liver Disease: A Systems Biology Comparison With Human Alcoholic Hepatitis. *Alcohol Clin Exp Res*. 2020 Jan;44(1):87-101. Epub 2019 Nov 28.

Furuya S, Cichocki JA, Konganti K, Dreval K, Uehara T, Katou Y, Fukushima H, Kono H, Pogribny IP, Argemi J, **Bataller R**, Rusyn I. Histopathological and Molecular Signatures of a Mouse Model of Acute-on-Chronic Alcoholic Liver Injury Demonstrate Concordance With Human Alcoholic Hepatitis. *Toxicol Sci*. 2019 Aug 1;170(2):427-437.

Gajendran M, Loganathan P, Jimenez G, Catinella AP, Ng N, Umapathy C, Ziade N, **Hashash JG**. *A comprehensive review and update on ulcerative colitis()*. *Dis Mon*. 2019 Dec;65(12):100851. Epub 2019 Mar 2.

Gao B, Duan Y, Lang S, Barupal D, Wu TC, Valdiviez L, Roberts B, Choy YY, Shen T, Byram G, Zhang Y, Fan S, Wancewicz B, Shao Y, Vervier K, Wang Y, Zhou R, Jiang L, Nath S, Loomba R, Abrales JG, **Bataller R**, Tu XM, Stärkel P, Lawley TD, Fiehn O, Schnabl B. Functional Microbiomics Reveals Alterations of the Gut Microbiome and Host Co-Metabolism in Patients With Alcoholic Hepatitis. *Hepatol Commun*.

- 2020 Jun 19;4(8):1168-1182. eCollection 2020 Aug.
- Gao C, Chen G, Zhang DH, Zhang J, Kuan SF, Hu W, Esni F, Gao X, Guan JL, Chu E, **Hu J**. PYK2 Is Involved in Premalignant Acinar Cell Reprogramming and Pancreatic Ductal Adenocarcinoma Maintenance by Phosphorylating β -Catenin(Y654). *Cell Mol Gastroenterol Hepatol*. 2019;8(4):561-578. Epub 2019 Jul 19.
- Gardner TB, Adler DG, Forsmark CE, Sauer BG, Taylor JR, **Whitcomb DC**. ACG Clinical Guideline: Chronic Pancreatitis. *Am J Gastroenterol*. 2020 Mar;115(3):322-339.
- Gluskin AB, **Dueker JM**, El Hag M, Puthenpurayil KJ, **Battaler R**. Alcoholic hepatitis masquerading as tumor infiltration: Reversibility after abstinence. *Clin Case Rep*. 2019 Sep 30;7(11):2174-2176. eCollection 2019 Nov.
- Goggins M, Overbeek KA, **Brand R**, Syngal S, Del Chiaro M, Bartsch DK, Bassi C, Carrato A, Farrell J, Fishman EK, Fockens P, Gress TM, van Hooft JE, Hruban RH, Kastrinos F, Klein A, Lennon AM, Lucas A, Park W, Rustgi A, Simeone D, Stoffel E, Vasen HFA, Cahen DL, Canto MI, Bruno M; International Cancer of the Pancreas Screening (CAPS) consortium. Management of patients with increased risk for familial pancreatic cancer: updated recommendations from the International Cancer of the Pancreas Screening (CAPS) Consortium. *Gut*. 2020 Jan;69(1):7-17. Epub 2019 Oct 31.
- Goodarzi MO, Nagpal T, Greer P, Cui J, Chen YI, Guo X, Pankow JS, Rotter JI, Alkaade S, Amann ST, Baillie J, Banks PA, **Brand RE**, Conwell DL, Cote GA, Forsmark CE, Gardner TB, Gelrud A, Guda N, LaRusch J, Lewis MD, Money ME, Muniraj T, Papachristou GI, Romagnuolo J, Sandhu BS, Sherman S, Singh VK, Wilcox CM, Pandol SJ, Park WG, Andersen DK, Bellin MD, Hart PA, **Yadav D**, **Whitcomb DC**; Consortium for the Study of Chronic Pancreatitis, Diabetes, and Pancreatic Cancer (CP-DPC). Genetic Risk Score in Diabetes Associated With Chronic Pancreatitis Versus Type 2 Diabetes Mellitus. *Clin Transl Gastroenterol*. 2019 Jul;10(7):e00057.
- Goodarzi MO, **Whitcomb DC**. Response to Liu et al. *Clin Transl Gastroenterol*. 2019 Nov;10(11):e00096.
- Gougol A, Machicado JD, Matta B, Paragomi P, Pothoulakis I, **Slivka A**, **Whitcomb DC**, **Yadav D**, Papachristou GI. Prevalence and Associated Factors of Abdominal Pain and Disability at 1-Year Follow-up After an Attack of Acute Pancreatitis. *Pancreas*. 2019 Nov/Dec;48(10):1348-1353.
- Greenhalf W, Lévy P, Gress T, Rebours V, **Brand RE**, Pandol S, Chari S, Jørgensen MT, Mayerle J, Lerch MM, Hegyi P, Kleeff J, Castillo CF, Isaji S, Shimosegawa T, Sheel A, Halloran CM, Garg P, Takaori K, Besselink MG, Forsmark CE, Wilcox CM, Maisonneuve P, **Yadav D**, **Whitcomb D**, Neoptolemos J; Working group for the International (IAP - APA - JPS - EPC) Consensus Guidelines for Chronic Pancreatitis. International consensus guidelines on surveillance for pancreatic cancer in chronic pancreatitis. Recommendations from the working group for the international consensus guidelines for chronic pancreatitis in collaboration with the International Association of Pancreatology, the American Pancreatic Association, the Japan Pancreas Society, and European Pancreatic Club. *Pancreatology*. 2020 Jul;20(5):910-918. Epub 2020 May 31.
- Hashash JG**, Beatty PL, Critelli K, Hartman DJ, Regueiro M, Tamim H, Regueiro MD, **Binion DG**, Finn OJ. Altered Expression of the Epithelial Mucin MUC1 Accompanies Endoscopic Recurrence of Postoperative Crohn's Disease. *J Clin Gastroenterol*. 2020 Mar 17. Online ahead of print.
- Hashash JG**, Hartman DJ. Inflammatory cells implicated in neoplasia development in idiopathic inflammatory bowel disease. *Cell Immunol*. 2019 Sep;343:103720. Epub 2017 Nov 10.
- Haugen CE, McAdams-DeMarco M, Verna EC, Rahimi RS, Kappus MR, **Dunn MA**, Volk ML, Gurakar A, **Duarte-Rojo A**, Ganger DR, O'Leary JG, Ladner D, Garonzik-Wang J, Segev DL, Lai JC. Association Between Liver Transplant Wait-list Mortality and Frailty Based on Body Mass Index. *JAMA Surg*. 2019 Dec 1;154(12):1103-1109.
- Hegyi P, Párniczky A, Lerch MM, Sheel ARG, Rebours V, Forsmark CE, Del Chiaro M, Rosendahl J, de-Madaria E, Szücs Á, Takaori K, **Yadav D**, Gheorghe C, Rakonczay Z Jr, Molero X, Inui K, Masamune A, Fernandez-Del Castillo C, Shimosegawa T, Neoptolemos JP, **Whitcomb DC**, Sahin-Tóth M; Working Group for the International (IAP - APA - JPS - EPC) Consensus Guidelines for Chronic Pancreatitis. International Consensus Guidelines for Risk Factors in Chronic Pancreatitis. Recommendations from the working group for the international consensus guidelines for chronic pancreatitis in collaboration with the International Association of Pancreatology, the American Pancreatic Association, the Japan Pancreas Society, and European Pancreatic Club. *Pancreatology*. 2020 Jun;20(4):579-585. Epub 2020 Apr 8.
- Huang W, Navarro-Serer B, Jeong YJ, Chianchiano P, Xia L, Luchini C, Veronese N, Dowiak C, Ng T, Trujillo MA, Huang B, Pflüger MJ, Macgregor-Das AM, Lionheart G, Jones D, Fujikura K, Nguyen-Ngoc KV, Neumann NM, Groot VP, Hasanain A, van Oosten AF, Fischer SE, Gallinger S, Singhi AD, Zureikat AH, **Brand RE**, Gaida MM, Heinrich S, Burkhart RA, He J, Wolfgang CL, Goggins MG, Thompson ED, Roberts NJ, Ewald AJ, Wood LD. Pattern of Invasion in Human Pancreatic Cancer Organoids Is Associated with Loss of SMAD4 and Clinical Outcome. *Cancer Res*. 2020 Jul 1;80(13):2804-2817. Epub 2020 May 6.
- Hudson SV, Miller HA, Mahlbacher GE, Saforo D, Beverly LJ, **Arteel GE**, Frieboes HB. Computational/experimental evaluation of liver metastasis post hepatic injury: interactions with macrophages and transitional ECM. *Sci Rep*. 2019 Oct 21;9(1):15077.
- Humar A, **Ganesh S**, Jorgensen D, Tevar A, Ganoza A, Molinari M, Hughes C. Adult Living Donor Versus Deceased Donor Liver Transplant (DLT Versus DDLT) at a Single Center: Time to Change Our Paradigm for Liver Transplant. *Ann Surg*. 2019 Sep;270(3):444-451.
- Humphrey VS, Lee JJ, Supakorndej T, **Malik SM**, Huen AC, Jaroslaw J. Linear IgA Bullous Dermatitis Preceding the Diagnosis of Primary Sclerosing Cholangitis and Ulcerative Colitis: A Case Report. *Am J Dermatopathol*. 2019 Jul;41(7):498-501.
- Hutchings D, Jiang Z, Skaro M, Weiss MJ, Wolfgang CL, Makary MA, He J, Cameron JL, Zheng L, Klimstra DS, **Brand RE**, Singhi AD, Goggins M, Klein AP, Roberts NJ, Hruban RH. Histomorphology of pancreatic cancer in patients with inherited ATM serine/threonine kinase pathogenic variants. *Mod Pathol*. 2019 Dec;32(12):1806-1813. Epub 2019 Jul 8.
- Isaacson RH, **Beier JI**, Khoo NK, Freeman BA, Freyberg Z, **Arteel GE**. Olanzapine-induced liver injury in mice: aggravation by high-fat diet and protection with sulforaphane. *J Nutr Biochem*. 2020 Jul;81:108399. Epub 2020 Apr 8.
- Jabak S, **Hashash JG**. Large Cameron Ulcer Bleed. *ACG Case Rep J*. 2020 Jan 17;7(1):e00308. eCollection 2020 Jan.
- Jain S, Bettner W, Olevian DC, **Yadav D**. Cecal Perforation in the Setting of Campylobacter jejuni Infection. *ACG Case Rep J*. 2019 Dec 5;6(12):e00268. eCollection 2019 Dec.
- Jalan R, **Battaler R**, Berg T, Lotersztajn S, Moreau R, Zucman-Rossi J, Walicki J. *Journal of Hepatology: The Home of Liver Research, 2015-2019*. *J Hepatol*. 2019 Dec;71(6):1065-1069.
- Jeon CY, Chen Q, Yu W, Dong EY, Chung J, Pandol SJ, **Yadav D**, Conwell DL, Wu

BU. Identification of Individuals at Increased Risk for Pancreatic Cancer in a Community-Based Cohort of Patients With Suspected Chronic Pancreatitis. *Clin Transl Gastroenterol*. 2020 Apr;11(4):e00147.

Jeon CY, **Whitcomb DC**, **Slivka A**, **Brand RE**, Gelrud A, Tang G, Abberbock J, AlKaade S, Guda N, Mel Wilcox C, Sandhu BS, **Yadav D**. Lifetime Drinking History of Persons With Chronic Pancreatitis. *Alcohol Alcohol*. 2019 Dec 1;54(6):615-624.

Johnston ER, **Khalid A**. Response. *Gastrointest Endosc*. 2019 Nov;90(5):859-860.

Kaelin BR, McKenzie CM, Hempel KW, Lang AL, **Arteel GE**, **Beier JI**. Adipose tissue-liver crosstalk during pathologic changes caused by vinyl chloride metabolites in mice. *Toxicol Appl Pharmacol*. 2020 Jul 15;399:115068. Epub 2020 May 20.

Kardashian A, Ge J, McCulloch CE, Kappus MR, **Dunn MA**, **Duarte-Rojo A**, Volk ML, Rahimi RS, Verna EC, Ganger DR, Ladner D, Dodge JL, Boyarsky B, McAdams-DeMarco M, Segev DL, Lai JC. Identifying an Optimal Liver Frailty Index Cutoff to Predict Waitlist Mortality in Liver Transplant Candidates. *Hepatology*. 2020 Jun 3. Online ahead of print.

*Kempeneers MA, Issa Y, Ali UA, Baron RD, Beselink MG, Büchler M, Erkan M, Fernandez-Del Castillo C, Isaji S, Izbicki J, Kleeff J, Laukkarinen J, Sheel ARG, Shimosegawa T, Whitcomb DC, Windsor J, Miao Y, Neoptolemos J, Boermeester MA; Working group for the International (IAP, Æi APA, Æi JPS, Æi EPC) Consensus Guidelines for Chronic Pancreatitis. International consensus guidelines for surgery and the timing of intervention in chronic pancreatitis. *Pancreatol*. 2020 Mar;20(2):149-157. Epub 2019 Dec 17.*

Ketwaroo G, Sealock RJ, Freedman S, Hart PA, Othman M, Wassef W, Banks P, Vege SS, Gardner T, **Yadav D**, Sheth S, Kanwal F. Quality of Care Indicators in Patients with Acute Pancreatitis. *Dig Dis Sci*. 2019 Sep;64(9):2514-2526. Epub 2019 May 31.

Kikuchi A, Singh S, Poddar M, Nakao T, Schmidt HM, Gayden JD, Sato T, **Arteel GE**, Monga SP. Hepatic Stellate Cell-Specific Platelet-Derived Growth Factor Receptor- α Loss Reduces Fibrosis and Promotes Repair after Hepatocellular Injury. *Am J Pathol*. 2020 Jun 29;S0002-9440(20)30297-2. Online ahead of print.

Kim Y, Jun I, Shin DH, Yoon JG, Piao

H, Jung J, Park HW, Cheng MH, Bahar I, **Whitcomb DC**, Lee MG. Regulation of CFTR Bicarbonate Channel Activity by WNK1: Implications for Pancreatitis and CFTR-Related Disorders. *Cell Mol Gastroenterol Hepatol*. 2020;9(1):79-103. Epub 2019 Sep 24.

*Kinnucan J, Binion D, Cross R, Evans E, Harlen K, Matarese L, Mullins A, O'Neal B, Reiss M, Scott FI, Weaver A, Rosenberg J. Inflammatory Bowel Disease Care Referral Pathway. *Gastroenterology*. 2019 Jul;157(1):242-254.e6. Epub 2019 Apr 10.*

Knisely MR, Conley YP, **Szigethy E**. Cytokine Genetic Variants and Health-Related Quality of Life in Crohn's Disease: An Exploratory Study. *Biol Res Nurs*. 2019 Oct;21(5):544-551. Epub 2019 Jul 4.

*Kok B, Duarte-Rojo A, Tandon P. Predicting Functional Status After Transplantation in Patients With Acute-on-Chronic Liver Failure. *Clin Gastroenterol Hepatol*. 2020 Jan;18(1):54-56. Epub 2019 Jun 7.*

Konings ICAW, Canto MI, Almario JA, Harinck F, Saxena P, Lucas AL, Kasttrinos F, **Whitcomb DC**, Brand RE, Lachter J, Malleo G, Paiella S, Syngal S, Saltzman JR, Stoffel EM, van Hooft JE, Hruban RH, Poley JW, Fockens P, Goggins MG, Bruno MJ; International Cancer of the Pancreas Screening (CAPS) Consortium. Surveillance for pancreatic cancer in high-risk individuals. *BJS Open*. 2019 Jul 2;3(5):656-665. eCollection 2019 Oct.

Koutroumpakis F, Lodhi M, Ahsan M, Ramos Rivers C, **Schwartz M**, **Hashash JG**, Babichenko D, Tang G, Nagpal T, **Dunn M**, Keshavarzian A, **Binion DG**. The Impact of Cholecystectomy on Long-Term Disease Outcomes and Quality of Life in Patients with Crohn's Disease. *Inflamm Bowel Dis*. 2020 Apr 20;izaa076. Online ahead of print.

Kumar S, Verma AK, Rani R, Sharma A, Wang J, Shah SA, **Behari J**, Salazar Gonzalez R, Kohli R, Gandhi CR. Hepatic deficiency of augmenter of liver regeneration predisposes to nonalcoholic steatohepatitis and fibrosis. *Hepatology*. 2020 Feb 7. Online ahead of print.

Kuo SZ, Ahmad M, **Dunn MA**, Montano-Loza AJ, Carey EJ, Lin S, Moghe A, Chen HW, Ebadi M, Lai JC. Sarcopenia Predicts Post-transplant Mortality in Acutely Ill Men Undergoing Urgent Evaluation and Liver Transplantation. *Transplantation*. 2019 Nov;103(11):2312-2317.

Kvorjak M, Ahmed Y, Miller ML, Sriram R, Coronello C, **Hashash JG**, Hartman DJ, Telmer CA, Miskov-Zivanov N, Finn OJ, Cascio S. Cross-talk between Colon Cells and Macrophages Increases ST-6GALNAC1 and MUC1-sTn Expression in Ulcerative Colitis and Colitis-Associated Colon Cancer. *Cancer Immunol Res*. 2020 Feb;8(2):167-178. Epub 2019 Dec 12.

Ladabaum U, Mannalithara A, Meester RGS, Gupta S, **Schoen RE**. Cost-Effectiveness and National Effects of Initiating Colorectal Cancer Screening for Average-Risk Persons at Age 45 Years Instead of 50 Years. *Gastroenterology*. 2019 Jul;157(1):137-148. Epub 2019 Mar 28.

*Ladabaum U, Dominitz JA, Kahi C, Schoen RE. Strategies for Colorectal Cancer Screening. *Gastroenterology*. 2020 Jan;158(2):418-432. Epub 2019 Aug 5.*

*Ladabaum U, Mannalithara A, Meester RGS, Gupta S, Schoen RE. Reply to GASTRO-D-19-00808. *Gastroenterology*. 2019 Oct 4;S0016-5085(19)41410-8. Online ahead of print.*

Lai JC, Dodge JL, Kappus MR, **Dunn MA**, Volk ML, **Duarte-Rojo A**, Ganger DR, Rahimi RS, McCulloch CE, Haugen CE, McAdams-DeMarco M, Ladner DP, Segev DL, Verna EC; Multi-Center Functional Assessment in Liver Transplantation (FrAILT) Study. Changes in frailty are associated with waitlist mortality in patients with cirrhosis. *J Hepatol*. 2020 Mar 30;S0168-8278(20)30191-4. Online ahead of print.

*Lai JC, Sonnenday CJ, Tapper EB, Duarte-Rojo A, Dunn MA, Bernal W, Carey EJ, Dasarathy S, Kamath BM, Kappus MR, Montano-Loza AJ, Nagai S, Tandon P. Frailty in liver transplantation: An expert opinion statement from the American Society of Transplantation Liver and Intestinal Community of Practice. *Am J Transplant*. 2019 Jul;19(7):1896-1906. Epub 2019 May 8.*

Lam AN, Aksit MA, Vecchio-Pagan B, Shelton CA, Osorio DL, Anzmann AF, Goff LA, **Whitcomb DC**, Blackman SM, Cutting GR. Increased expression of anion transporter SLC26A9 delays diabetes onset in cystic fibrosis. *J Clin Invest*. 2020 Jan 2;130(1):272-286.

Lang AL, Goldsmith WT, Schneggelberger RD, **Arteel GE**, **Beier JI**. Vinyl Chloride and High-Fat Diet as a Model of Environment and Obesity Interaction. *J Vis Exp*. 2020 Jan 12;(155).

Lang AL, Krueger AM, Schneggelberger RD, Kaelin BR, Rakutt MJ, Chen L, **Arteel**

- GE, Beier JI.** Rapamycin attenuates liver injury caused by vinyl chloride metabolite chloroethanol and lipopolysaccharide in mice. *Toxicol Appl Pharmacol.* 2019 Nov 1;382:114745. Epub 2019 Sep 6.
- Lang S, Duan Y, Liu J, Torralba MG, Kuelbs C, Ventura-Cots M, Abrales JG, Bosques-Padilla F, Verna EC, Brown RS Jr, Vargas V, Altamirano J, Caballería J, Shawcross D, Lucey MR, Louvet A, Mathurin P, Garcia-Tsao G, Ho SB, Tu XM, **Bataller R**, Stärkel P, Fouts DE, Schnabl B. Intestinal Fungal Dysbiosis and Systemic Immune Response to Fungi in Patients With Alcoholic Hepatitis. *Hepatology.* 2020 Feb;71(2):522-538. Epub 2019 Aug 20.
- Lawitz E, Gane E, Feld JJ, Buti M, Foster GR, **Rabinovitz M**, Burnevich E, Katchman H, Tomasiewicz K, Lahser F, Jackson B, Shaughnessy M, Klopfer S, Yeh WW, Robertson MN, Hanna GJ, Barr E, Platt HL; C-BREEZE-2 Study Investigators. Efficacy and safety of a two-drug direct-acting antiviral agent regimen ruzasvir 180 mg and uprifosbuvir 450 mg for 12 weeks in adults with chronic hepatitis C virus genotype 1, 2, 3, 4, 5 or 6. *J Viral Hepat.* 2019 Sep;26(9):1127-1138. Epub 2019 Jul 11.
- Levinthal DJ**, Strick PL. Multiple areas of the cerebral cortex influence the stomach. *Proc Natl Acad Sci U S A.* 2020 Jun 9;117(23):13078-13083. Epub 2020 May 20.
- Levinthal DJ.** *Now Trending: Using Google Trends to Complement Traditional Epidemiological Methods Used for IBS Research. Dig Dis Sci.* 2020 Jun 18. Online ahead of print.
- Lewis MD, Talluri J, Wilcox CM, Abberbock JN, Tang G, Conwell DL, Banks PA, Cote GA, Sherman S, Alkaade S, Gardner TB, Anderson MA, Sandhu BS, Muniraj T, Forsmark CE, Guda N, Gelrud A, Romagnuolo J, **Brand R**, LaRusch J, Amann ST, **Slivka A**, **Whitcomb DC**, **Yadav D**. Differences in Age at Onset of Symptoms, and Effects of Genetic Variants, in Patients With Early Vs Late-Onset Idiopathic Chronic Pancreatitis in a North American Cohort. *Clin Gastroenterol Hepatol.* 2020 Mar 30:S1542-3565(20)30424-9. Online ahead of print.
- Lin FP, Ferrando AA, Dennis RA, **Dunn MA**, Kim WR, **Duarte-Rojo A**. Exercise-Induced Hyperammonemia Does Not Precipitate Overt Hepatic Encephalopathy. *Hepatology.* 2020 Jan 30. Online ahead of print.
- Liu Y, Kaur S, Huang Y, Fahrman JF, Rinaudo JA, Hanash SM, Batra SK, Singhi AD, **Brand RE**, Maitra A, Haab BB. Biomarkers and Strategy to Detect Pre-Invasive and Early Pancreatic Cancer: State of the Field and the Impact of the EDRN. *Cancer Epidemiol Biomarkers Prev.* 2020 Jun 12:cebp.0161.2020. Online ahead of print.
- Lowe ME, Andersen DK, Caprioli RM, Choudhary J, Cruz-Monserrate Z, Dasyam AK, Forsmark CE, Gorelick FS, Gray JW, Haupt M, Kelly KA, Olive KP, Plevritis SK, Rappaport N, Roth HR, Steen H, Swamidass SJ, Tirkes T, Uc A, Veselkov K, Whitcomb DC, Habtezion A. Precision Medicine in Pancreatic Disease-Knowledge Gaps and Research Opportunities: Summary of a National Institute of Diabetes and Digestive and Kidney Diseases Workshop. Pancreas.* 2019 Nov/Dec;48(10):1250-1258.
- Luther J, Khan S, Gala MK, Kedrin D, Sridharan G, Goodman RP, Garber JJ, Masia R, Diagacomo E, Adams D, King KR, Piaker S, Reinecker HC, Yarmush ML, Argemi J, **Bataller R**, Dienstag JL, Chung RT, Patel SJ. Hepatic gap junctions amplify alcohol liver injury by propagating cGAS-mediated IRF3 activation. *Proc Natl Acad Sci U S A.* 2020 May 26;117(21):11667-11673. Epub 2020 May 11.
- Ma H, Wang P, Shang D, **Liu Y**. Spatial-domain low-coherence quantitative phase microscopy to improve the cytological diagnosis of pancreatic cancer. *J Investig Med.* 2020 Jan;68(1):60-67. Epub 2019 Jul 19.
- Ma P, Beatty PL, McKolanis J, **Brand R**, **Schoen RE**, Finn OJ. Circulating Myeloid Derived Suppressor Cells (MDSC) That Accumulate in Premalignancy Share Phenotypic and Functional Characteristics With MDSC in Cancer. *Front Immunol.* 2019 Jun 19;10:1401. eCollection 2019.
- Machicado JD, Dudekula A, Tang G, Xu H, Wu BU, Forsmark CE, **Yadav D**. Period prevalence of chronic pancreatitis diagnosis from 2001-2013 in the commercially insured population of the United States. *Pancreatology.* 2019 Sep;19(6):813-818. Epub 2019 Jul 17.
- Matta B, Cabello R, **Rabinovitz M**, Minervini M, **Malik S**. Post-infantile giant cell hepatitis: A single center's experience over 25 years. *World J Hepatol.* 2019 Dec 27;11(12):752-760.
- McNabb S, Harrison TA, Albanes D, Berndt SI, Brenner H, Caan BJ, Campbell PT, Cao Y, Chang-Claude J, Chan A, Chen Z, English DR, Giles GG, Giovannucci EL, Goodman PJ, Hayes RB, Hoffmeister M, Jacobs EJ, Joshi AD, Larsson SC, Le Marchand L, Li L, Lin Y, Männistö S, Milne RL, Nan H, Newton CC, Ogino S, Parfrey PS, Petersen PS, Potter JD, **Schoen RE**, Slattery ML, Su YR, Tangen CM, Tucker TC, Weinstein SJ, White E, Wolk A, Woods MO, Phipps AI, Peters U. Meta-analysis of 16 studies of the association of alcohol with colorectal cancer. *Int J Cancer.* 2020 Feb 1;146(3):861-873. Epub 2019 Jun 7.
- Mel Wilcox C, Gress T, Boermeester M, Masamune A, Lévy P, Itoi T, Varadarajulu S, Irisawa A, Levy M, Kitano M, Garg P, Isaji S, Shimosegawa T, Sheel ARG, Whitcomb DC, Neoptolemos JP; International (IAP-APA-JPS-EPC) Consensus Guidelines for Chronic Pancreatitis. International consensus guidelines on the role of diagnostic endoscopic ultrasound in the management of chronic pancreatitis. Recommendations from the working group for the international consensus guidelines for chronic pancreatitis in collaboration with the International Association of Pancreatology, the American Pancreatic Association, the Japan Pancreas Society, and European Pancreatic Club. Pancreatology.* 2020 Jul;20(5):822-827. Epub 2020 Jun 18.
- Moghe A, Klinge M, Jonassaint N. PRO: This Patient Should Have a Liver Biopsy. Clin Liver Dis (Hoboken).* 2019 Oct 9;14(3):112-115. eCollection 2019 Sep.
- Molinari M, Ayloo S, Tsung A, Jorgensen D, Tevar A, Rahman SH, **Jonassaint N**. Prediction of Perioperative Mortality of Cadaveric Liver Transplant Recipients During Their Evaluations. *Transplantation.* 2019 Oct;103(10):e297-e307.
- Monje M, Borniger JC, D'Silva NJ, Deneen B, Dirks PB, Fattahi F, Frenette PS, Garzia L, Gutmann DH, Hanahan D, Hervey-Jumper SL, Hondermarck H, Hurov JB, Kepecs A, Knox SM, Lloyd AC, Magnon C, Saloman JL, Segal RA, Sloan EK, Sun X, Taylor MD, Tracey KJ, Trotman LC, Tuveson DA, Wang TC, White RA, Winkler F. Roadmap for the Emerging Field of Cancer Neuroscience. Cell.* 2020 Apr 16;181(2):219-222.
- Moon AM, Jiang Y, **Rogal SS**, Becker J, Barritt AS 4th. In inpatients with cirrhosis opioid use is common and associated with length of stay and persistent use post-discharge. *PLoS One.* 2020 Feb 26;15(2):e0229497. eCollection 2020.
- Moon AM, Jiang Y, Rogal SS, Tapper EB, Lieber SR, Barritt AS 4th. Letter: are opioid prescriptions associated with hepatic encephalopathy in patients with compensated cirrhosis? Authors' reply. Aliment Pharmacol Ther.* 2020 Apr;51(7):743-744.
- Moon AM, Jiang Y, **Rogal SS**, Tapper EB, Lieber SR, Barritt AS 4th. Opioid

prescriptions are associated with hepatic encephalopathy in a national cohort of patients with compensated cirrhosis. *Aliment Pharmacol Ther*. 2020 Mar;51(6):652-660. Epub 2020 Jan 21.

Moon AM, Yang JY, Barritt AS 4th, **Bataller R**, Peery AF. Rising Mortality From Alcohol-Associated Liver Disease in the United States in the 21st Century. *Am J Gastroenterol*. 2020 Jan;115(1):79-87.

Murphy N, Carreras-Torres R, Song M, Chan AT, Martin RM, Papadimitriou N, Dimou N, Tsilidis KK, Banbury B, Bradbury KE, Besevic J, Rinaldi S, Riboli E, Cross AJ, Travis RC, Agnoli C, Albanes D, Berndt SI, Bézieau S, Bishop DT, Brenner H, Buchanan DD, Onland-Moret NC, Burnett-Hartman A, Campbell PT, Casey G, Castellví-Bel S, Chang-Claude J, Chirlaque MD, de la Chapelle A, English D, Figueiredo JC, Gallinger SJ, Giles GG, Gruber SB, Gsur A, Hampe J, Hampel H, Harrison TA, Hoffmeister M, Hsu L, Huang WY, Huyghe JR, Jenkins MA, Keku TO, Kühn T, Kweon SS, Le Marchand L, Li CI, Li L, Lindblom A, Martín V, Milne RL, Moreno V, Newcomb PA, Offit K, Ogino S, Ose J, Perduca V, Phipps AI, Platz EA, Potter JD, Qu C, Rennert G, Sakoda LC, Schafmayer C, **Schoen RE**, Slattery ML, Tangen CM, Ulrich CM, van Duijnhoven FJB, Van Guelpen B, Visvanathan K, Vodicka P, Vodickova L, Vymetalkova V, Wang H, White E, Wolk A, Woods MO, Wu AH, Zheng W, Peters U, Gunter MJ. Circulating Levels of Insulin-like Growth Factor 1 and Insulin-like Growth Factor Binding Protein 3 Associate With Risk of Colorectal Cancer Based on Serologic and Mendelian Randomization Analyses. *Gastroenterology*. 2020 Apr;158(5):1300-1312.e20. Epub 2019 Dec 27.

Muthusamy VR, Bruno MJ, Kozarek RA, Petersen BT, Pleskow DK, Sejal DV, **Slivka A**, Peetermans JA, Rousseau MJ, Tirrell GP, Ross AS. Clinical Evaluation of a Single-Use Duodenoscope for Endoscopic Retrograde Cholangiopancreatography. *Clin Gastroenterol Hepatol*. 2020 Aug;18(9):2108-2117.e3. Epub 2019 Nov 6.

Neumeyer S, Butterbach K, Banbury BL, Berndt SI, Campbell PT, Chlebowski RT, Chan AT, Giovannucci EL, Joshi AD, Ogino S, Song M, McCullough ML, Maalmi H, Mansong JE, Sakoda LC, **Schoen RE**, Slattery ML, White E, Win AK, Figueiredo JC, Hopper JL, Macrae

FA, Peters U, Brenner H, Hoffmeister M, Newcomb PA, Chang-Claude J. Genetic Predictors of Circulating 25-Hydroxyvitamin D and Prognosis after Colorectal Cancer. *Cancer Epidemiol Biomarkers Prev*. 2020 Jun;29(6):1128-1134. Epub 2020 Mar 18.

Nielsen M, Infante E, **Brand R**. *MUTYH* Polypsis. 2012 Oct 4 [updated 2019 Oct 10]. In: Adam MP, Ardinger HH, Pagon RA, Wallace SE, Bean LH, Stephens K, Amemiya A, editors. *GeneReviews*(~E) [Internet]. Seattle (WA): University of Washington, Seattle; 1993,~i2020.

Nugent SM, Meghani SH, **Rogal SS**, Merlin JS. Medical cannabis use among individuals with cancer: An unresolved and timely issue. *Cancer*. 2020 Jan 1;126(9):1832-1836. Epub 2020 Feb 3.

O'Keefe SJ. The association between dietary fibre deficiency and high-income lifestyle-associated diseases: Burkitt's hypothesis revisited. *Lancet Gastroenterol Hepatol*. 2019 Dec;4(12):984-996.

O'Keefe SJD. Plant-based foods and the microbiome in the preservation of health and prevention of disease. *Am J Clin Nutr*. 2019 Aug 1;110(2):265-266.

Ocvirk S, Wilson AS, Appolonia CN, Thomas TK, **O'Keefe SJD**. Fiber, Fat, and Colorectal Cancer: New Insight into Modifiable Dietary Risk Factors. *Curr Gastroenterol Rep*. 2019 Dec 2;21(11):62.

Ocvirk S, Wilson AS, Poma JM, Li JV, Koller KR, Day GM, Flanagan CA, Otto JE, Sacco PE, Sacco FD, Sapp FR, Wilson AS, Newton K, Brouard F, DeLany JP, Behnning M, Appolonia CN, Soni D, Bhatti F, Methé B, Fitch A, Morris A, Gaskins HR, Kinross J, Nicholson JK, Thomas TK, **O'Keefe SJD**. A prospective cohort analysis of gut microbial co-metabolism in Alaska Native and rural African people at high and low risk of colorectal cancer. *Am J Clin Nutr*. 2020 Feb 1;111(2):406-419.

Pai RK, Hartman DJ, Rivers CR, Regueiro M, **Schwartz M**, **Binion DG**, Pai RK. Complete Resolution of Mucosal Neutrophils Associates With Improved Long-Term Clinical Outcomes of Patients With Ulcerative Colitis. *Clin Gastroenterol Hepatol*. 2019 Dec 14:S1542-3565(19)31438-7. Online ahead of print.

Papadimitriou N, Dimou N, Tsilidis KK, Banbury B, Martin RM, Lewis SJ, Kazmi N, Robinson TM, Albanes D, Aleksandrova K, Berndt SI, Timothy Bishop D, Brenner H, Buchanan DD, Bueno-de-Mesquita B, Campbell PT, Castellví-Bel S, Chan AT, Chang-Claude J, Ellingjord-Dale M, Figueiredo JC,

Gallinger SJ, Giles GG, Giovannucci E, Gruber SB, Gsur A, Hampe J, Hampel H, Harlid S, Harrison TA, Hoffmeister M, Hopper JL, Hsu L, María Huerta J, Huyghe JR, Jenkins MA, Keku TO, Kühn T, La Vecchia C, Le Marchand L, Li CI, Li L, Lindblom A, Lindor NM, Lynch B, Markowitz SD, Masala G, May AM, Milne R, Monninkhof E, Moreno L, Moreno V, Newcomb PA, Offit K, Perduca V, Pharoah PDP, Platz EA, Potter JD, Rennert G, Riboli E, Sánchez MJ, Schmit SL, **Schoen RE**, Severi G, Sieri S, Slattery ML, Song M, Tangen CM, Thibodeau SN, Travis RC, Trichopoulou A, Ulrich CM, van Duijnhoven FJB, Van Guelpen B, Vodicka P, White E, Wolk A, Woods MO, Wu AH, Peters U, Gunter MJ, Murphy N. Physical activity and risks of breast and colorectal cancer: a Mendelian randomisation analysis. *Nat Commun*. 2020 Jan 30;11(1):597.

Pardini B, Corrado A, Paolicchi E, Cugliari G, Berndt SI, Bézieau S, Bien SA, Brenner H, Caan BJ, Campbell PT, Casey G, Chan AT, Chang-Claude J, Cotterchio M, Gala M, Gallinger SJ, Haile RW, Harrison TA, Hayes RB, Hoffmeister M, Hopper JL, Hsu L, Huyghe J, Jenkins MA, Le Marchand L, Lin Y, Lindor NM, Nan H, Newcomb PA, Ogino S, Potter JD, **Schoen RE**, Slattery ML, White E, Vodickova L, Vymetalkova V, Vodicka P, Gemignani F, Peters U, Naccarati A, Landi S. DNA repair and cancer in colon and rectum: Novel players in genetic susceptibility. *Int J Cancer*. 2020 Jan 15;146(2):363-372. Epub 2019 Jul 4.

Park KT, Ehrlich OG, Allen JI, Meadows P, **Szigethy EM**, Henrichsen K, Kim SC, Lawton RC, Murphy SM, Regueiro M, Rubin DT, Engel-Nitz NM, Heller CA. The Cost of Inflammatory Bowel Disease: An Initiative From the Crohn's & Colitis Foundation. *Inflamm Bowel Dis*. 2020 Jan 1;26(1):1-10.

Park WG, Li L, Appana S, Wei W, Stello K, Andersen DK, Hughes SJ, **Whitcomb DC**, **Brand RE**, **Yadav D**, Habtezion A; Consortium for the Study of Chronic Pancreatitis, Diabetes, and Pancreatic Cancer. Unique circulating immune signatures for recurrent acute pancreatitis, chronic pancreatitis and pancreatic cancer: A pilot study of these conditions with and without diabetes. *Pancreatol*. 2020 Jan;20(1):51-59. Epub 2019 Nov 25.

Patel K, Zickmund SL, Jones H, Reid A, Calgaro L, Otero A, Coppler T, **Rogal SS**. Determinants of Hepatitis C Treat-

- ment Adherence and Treatment Completion Among Veterans in the Direct Acting Antiviral Era. *Dig Dis Sci*. 2019 Oct;64(10):3001-3012. Epub 2019 Mar 22.
- Peng H, Pan S, Yan Y, **Brand RE**, Petersen GM, Chari ST, Lai LA, Eng JK, Brentnall TA, Chen R. Systemic Proteome Alterations Linked to Early Stage Pancreatic Cancer in Diabetic Patients. *Cancers (Basel)*. 2020 Jun 11;12(6):1534.
- Peters MLB, Stobie L, Dudley B, Karloski E, Allen K, Speare V, Dolinsky JS, Tian Y, DeLeonardis K, Krejdovsky J, Button A, Lim C, Borazanci E, **Brand R**, Tung N. Family communication and patient distress after germline genetic testing in individuals with pancreatic ductal adenocarcinoma. *Cancer*. 2019 Jul 15;125(14):2488-2496. Epub 2019 Apr 12.
- Phillips AE**, Papachristou GI, **Slivka A**. Consideration of Clinical Context and Alternative Therapies in Aggressive Resuscitation for Prevention of Post-ERCP Pancreatitis. *J Clin Gastroenterol*. 2019 Jul;53(6):472-473.
- Phillips AE**, Faghih M, Kuhlmann L, Larsen IM, Drewes AM, Singh VK, **Yadav D**, Olesen SS; Pancreatic Quantitative Sensory Testing (P-QST) Consortium. A clinically feasible method for the assessment and characterization of pain in patients with chronic pancreatitis. *Pancreatol*. 2020 Jan;20(1):25-34. Epub 2019 Nov 20.
- Phillips AE**, Paniccia A, Dasyam A. A Rare Complication of Chronic Pancreatitis. *Gastroenterology*. 2020 Apr 17:S0016-5085(20)30506-0. Online ahead of print.
- Phillips AE**, **Yadav D**, **Brand RE**; all authors. Reply to: The Relationship of Acute Pancreatitis and Pancreatic Cancer. *Pancreas*. 2019 Aug;48(7):e57-e58.
- Pinsky PF, **Schoen RE**. Contribution of Surveillance Colonoscopy to Colorectal Cancer Prevention. *Clin Gastroenterol Hepatol*. 2020 Feb 1:S1542-3565(20)30116-6. Online ahead of print.
- Poordad F, Terrault NA, Alkhouri N, Tian W, Allen LF, **Rabinovitz M**. Avatrombopag, an Alternate Treatment Option to Reduce Platelet Transfusions in Patients with Thrombocytopenia and Chronic Liver Disease-Integrated Analyses of 2 Phase 3 Studies. *Int J Hepatol*. 2020 Jan 25;2020:5421632. eCollection 2020.
- Prathapan KM, Ramos Rivers C, Anderson A, Koutroumpakis F, Koutroumbakis IE, Babichenko D, Tan X, Tang G, **Schwartz M**, **Proksell S**, **Johnston E**, **Hashash JG**, **Dunn M**, Wilson A, Barrie A, **Harrison J**, Hartman D, Kim SC, **Binion DG**. Peripheral Blood Eosinophilia and Long-term Severity in Pediatric-Onset Inflammatory Bowel Disease. *Inflamm Bowel Dis*. 2020 Jan 21:izz323. Online ahead of print.
- Qian L, Li Q, Baryeh K, Qiu W, Li K, Zhang J, Yu Q, Xu D, Liu W, **Brand RE**, Zhang X, Chen W, Liu G. Biosensors for early diagnosis of pancreatic cancer: a review. *Transl Res*. 2019 Nov;213:67-89. Epub 2019 Aug 15.
- Rachakonda V**, **Bataller R**, **Duarte-Rojo A**. Recent advances in alcoholic hepatitis. *F1000Res*. 2020 Feb 10;9:F1000 Faculty Rev-97. eCollection 2020.
- Rachakonda VP**, DeLany JP, Kershaw EE, **Behari J**. Impact of Hepatic Steatosis on Resting Metabolic Rate and Metabolic Adaptation in Response to Intentional Weight Loss. *Hepatol Commun*. 2019 Aug 21;3(10):1347-1355. eCollection 2019 Oct.
- Raghu VK, **Binion DG**, Smith KJ. Cost-effectiveness of teduglutide in adult patients with short bowel syndrome: Markov modeling using traditional cost-effectiveness criteria. *Am J Clin Nutr*. 2020 Jan 1;111(1):141-148.
- Rich NE, Yang JD, Perumalswami PV, Alkhouri N, Jackson W, Parikh ND, Mehta N, Salgia R, **Duarte-Rojo A**, Kulik L, Rakoski M, Said A, Oloruntoba O, Ioannou GN, Hoteit MA, Moon AM, Rangnekar AS, Eswaran SL, Zheng E, Jou JH, Hanje J, Pillai A, Hernaez R, Wong R, Scaglione S, Samant H, Kapuria D, Chandna S, Rosenblatt R, Ajmera V, Frenette CT, Satapathy SK, Mantry P, Jalal P, John BV, Fix OK, Leise M, Lindenmeyer CC, Flores A, Patel N, Jiang ZG, Latt N, Dhanasekaran R, Odewole M, Kagan S, Marrero JA, Singal AG. Provider Attitudes and Practice Patterns for Direct-Acting Antiviral Therapy for Patients With Hepatocellular Carcinoma. *Clin Gastroenterol Hepatol*. 2020 Apr;18(4):974-983. Epub 2019 Jul 26.
- Rogal S**, Youk A, Zhang H, Gellad WF, Fine MJ, Good CB, Chartier M, DiMartini A, Morgan T, **Bataller R**, Kraemer KL. Impact of Alcohol Use Disorder Treatment on Clinical Outcomes Among Patients With Cirrhosis. *Hepatology*. 2020 Jun;71(6):2080-2092. Epub 2020 May 22.
- Rogal SS**, Chinman M, Gellad WF, Mor MK, Zhang H, McCarthy SA, Mauro GT, Hale JA, Lewis ET, Oliva EM, Trafton JA, Yakovchenko V, Gordon AJ, Hausmann LRM. Tracking implementation strategies in the randomized rollout of a Veterans Affairs national opioid risk management initiative. *Implement Sci*. 2020 Jun 23;15(1):48.
- Ross AS, Bruno MJ, Kozarek RA, Petersen BT, Pleskow DK, Sejal DV, **Slivka A**, Moore D, Panduro K, Peetermans JA, Insull J, Rousseau MJ, Tirrell GP, Muthusamy VR. Novel single-use duodenoscope compared with 3 models of reusable duodenoscopes for ERCP: a randomized bench-model comparison. *Gastrointest Endosc*. 2020 Feb;91(2):396-403. Epub 2019 Nov 1.
- Salim TI, Nestlerode LC, Lucatoro EL, Wasserman TL, Din HA, Landsittel DP, Tevar AD, Johnson JT, **Duarte-Rojo A**, **Dunn MA**. Frailty as Tested by Gait Speed Is a Risk Factor for Liver Transplant Respiratory Complications. *Am J Gastroenterol*. 2020 Jun;115(6):859-866.
- Saloman JL**, Albers KM, Cruz-Monserrate Z, Davis BM, Edderkaoui M, Eibl G, Epouhe AY, Gedeon JY, Gorelick FS, Grippo PJ, Groblewski GE, Husain SZ, Lai KKY, Pandol SJ, Uc A, Wen L, **Whitcomb DC**. Animal Models: Challenges and Opportunities to Determine Optimal Experimental Models of Pancreatitis and Pancreatic Cancer. *Pancreas*. 2019 Jul;48(6):759-779.
- Saloman JL**, Cohen JA, Kaplan DH. Intimate neuro-immune interactions: breaking barriers between systems to make meaningful progress. *Curr Opin Neurobiol*. 2020 Jun;62:60-67. Epub 2019 Dec 13.
- Satturwar S, Monaco SE, Xing J, **Brand RE**, Pantanowitz L. Bizarre benign cells in peri-rectal endoscopic ultrasound-guided fine-needle aspiration due to seminal vesicle sampling. *Diagn Cytopathol*. 2020 Jun;48(6):586-588. Epub 2020 Mar 19.
- Scott AJ, Alexander JL, Merrifield CA, Cunningham D, Jobin C, Brown R, Alverdy J, **O'Keefe SJ**, Gaskins HR, Teare J, Yu J, Hughes DJ, Verstraeten H, Burton J, O'Toole PW, Rosenberg DW, Marchesi JR, Kinross JM. International Cancer Microbiome Consortium consensus statement on the role of the human microbiome in carcinogenesis. *Gut*. 2019 Sep;68(9):1624-1632. Epub 2019 May 15.
- Sehrawat TS, Arab JP, Liu M, Amrollahi P, Wan M, Fan J, Nakao Y, Pose E, Navarro-Corcuera A, Dasgupta D, Liao CY, He L, Mauer AS, Avitabile E, Ventura-Cots M, **Bataller RA**, Sanyal AJ, Chalasani NP, Heimbach JK, Watt KD, Gores GJ, Gines P, Kamath PS, Simonetto DA, Hu TY, Shah VH, Malhi H. Circulating extracellular vesicles carrying

sphingolipid cargo for the diagnosis and dynamic risk profiling of alcoholic hepatitis. *Hepatology*. 2020 Apr 4. Online ahead of print.

Seo DW, Sherman S, Dua KS, **Slivka A**, Roy A, Costamagna G, Deviere J, Peetermans J, Rousseau M, Nakai Y, Isayama H, Kozarek R; Biliary SEMS During Neoadjuvant Therapy Study Group. Covered and uncovered biliary metal stents provide similar relief of biliary obstruction during neoadjuvant therapy in pancreatic cancer: a randomized trial. *Gastrointest Endosc*. 2019 Oct;90(4):602-612.e4. Epub 2019 Jul 2.

Sethi A, Tyberg A, **Slivka A**, Adler DG, Desai AP, Sejjal DV, Pleskow DK, Bertani H, Gan SI, Shah R, Arnelo U, Tarnasky PR, Banerjee S, Itoi T, Moon JH, Kim DC, Gaidhane M, Rajjman I, Peterson BT, Gress FG, Kahaleh M. Digital Single-operator Cholangioscopy (DSOC) Improves Interobserver Agreement (IOA) and Accuracy for Evaluation of Indeterminate Biliary Strictures: The Monaco Classification. *J Clin Gastroenterol*. 2020 Feb 7. Online ahead of print.

Shah ND, Ventura-Cots M, Abraldes JG, Alborae M, Alfadhi A, Argemi J, Badia-Aranda E, Arús-Soler E, Barritt AS 4th, Bessone F, Biryukova M, Carrilho FJ, Fernández MC, Dorta Guiridi Z, El Kassas M, Eng-Kiong T, Queiroz Farias A, George J, Gui W, Thurairajah PH, Hsiang JC, Husifá-Selimovic A, Isakov V, Karoney M, Kim W, Kluwe J, Kochhar R, Dhaka N, Costa PM, Nabeshima Pharm MA, Ono SK, Reis D, Rodil A, Domech CR, Sáez-Royuela F, Scheurich C, Siow W, Sivac-Burina N, Dos Santos Traquino ES, Some F, Spreckic S, Tan S, Vorobioff J, Wandera A, Wu P, Yacoub M, Yang L, Yu Y, Zahiragic N, Zhang C, Cortez-Pinto H, **Bataller R**. Alcohol-Related Liver Disease Is Rarely Detected at Early Stages Compared With Liver Diseases of Other Etiologies Worldwide. *Clin Gastroenterol Hepatol*. 2019 Oct;17(11):2320-2329.e12. Epub 2019 Jan 29.

Shaikh OS, Rogal S, Malik A, Sharma V, Cacciarelli T. Liver Transplant From Increased-Risk Donors in the Era of Direct-Acting Antivirals for Hepatitis C. *Exp Clin Transplant*. 2019 Jul 19. Online ahead of print.

Shelton CA, Grubs RE, Umapathy C, **Yadav D, Whitcomb DC**. Impact of hereditary pancreatitis on patients and

their families. *J Genet Couns*. 2020 Feb 5. Online ahead of print.

Singh VK, Yadav D, Garg PK. Diagnosis and Management of Chronic Pancreatitis: A Review. JAMA. 2019 Dec 24;322(24):2422-2434.

Singhi AD, Nikiforova MN, **Chennat J**, Papachristou GI, **Khalid A, Rabinovitz M, Das R, Sarkaria S**, Ayasso MS, Wald AI, Monaco SE, Nalesnik M, Ohori NP, Geller D, Tsung A, Zureikat AH, Zeh H, Marsh JW, Hogg M, Lee K, Bartlett DL, Pingpank JF, Humar A, Bahary N, Dasyam AK, **Brand R, Fasanella KE, McGrath K, Slivka A**. Integrating next-generation sequencing to endoscopic retrograde cholangiopancreatography (ERCP)-obtained biliary specimens improves the detection and management of patients with malignant bile duct strictures. *Gut*. 2020 Jan;69(1):52-61. Epub 2019 Apr 10.

Singhi AD, Wood LD, Parks E, Torbenso MS, Felsenstein M, Hruban RH, Nikiforova MN, Wald AI, Kaya C, Nikiforov YE, Favazza L, He J, **McGrath K, Fasanella KE, Brand RE**, Lennon AM, Furlan A, Dasyam AK, Zureikat AH, Zeh HJ, Lee K, Bartlett DL, **Slivka A**. Recurrent Rearrangements in PRKACA and PRKACB in Intraductal Oncocytic Papillary Neoplasms of the Pancreas and Bile Duct. *Gastroenterology*. 2020 Feb;158(3):573-582.e2. Epub 2019 Oct 31.

Skef W, McGrath K. Pancreatic cyst through-the-needle biopsy: two's the charm. Gastrointest Endosc. 2019 Dec;90(6):944-946.

Springer S, Masica DL, Dal Molin M, Douville C, Thoburn CJ, Afsari B, Li L, Cohen JD, Thompson E, Allen PJ, Klimstra DS, Schattner MA, Schmidt CM, Yip-Schneider M, Simpson RE, Fernandez-Del Castillo C, Mino-Kenudson M, Brugge W, **Brand RE**, Singhi AD, Scarpa A, Lawlor R, Salvia R, Zamboni G, Hong SM, Hwang DW, Jang JY, Kwon W, Swan N, Geoghegan J, Falconi M, Crippa S, Doglioni C, Paulino J, Schulick RD, Edil BH, Park W, Yachida S, Hijioka S, van Hooft J, He J, Weiss MJ, Burkhart R, Makary M, Canto MI, Goggins MG, Ptak J, Dobbyn L, Schaefer J, Sillman N, Popoli M, Klein AP, Tomasetti C, Karchin R, Papadopoulos N, Kinzler KW, Vogelstein B, Wolfgang CL, Hruban RH, Lennon AM. A multimodality test to guide the management of patients with a pancreatic cyst. *Sci Transl Med*. 2019 Jul 17;11(501):eaav4772.

Stapersma L, van den Brink G, van der Ende J, **Szigethy EM**, Groeneweg M, de

Bruijne FH, Hillegers MHJ, Escher JC, Utens EMWJ. Psychological Outcomes of a Cognitive Behavioral Therapy for Youth with Inflammatory Bowel Disease: Results of the HAPPY-IBD Randomized Controlled Trial at 6- and 12-Month Follow-Up. *J Clin Psychol Med Settings*. 2019 Sep 10. Online ahead of print.

Stärkel P, Schnabl B, Leclercq S, Komuta M, **Bataller R**, Argemi J, Palma E, Chokshi S, Hellerbrand C, Maccioni L, Lanthier N, Leclercq I. Deficient IL-6/Stat3 Signaling, High TLR7, and Type I Interferons in Early Human Alcoholic Liver Disease: A Triad for Liver Damage and Fibrosis. *Hepatol Commun*. 2019 May 10;3(7):867-882. eCollection 2019 Jul.

Szigethy E. Editorial: The Promise of Psychiatric Translational Research: Exploring How the Gut Can Influence Brain Development. J Am Acad Child Adolesc Psychiatry. 2019 Nov;58(11):1059-1061. Epub 2019 Jun 3.

Szigethy E, Murphy SM, Ehrlich OG, Engel-Nitz NM, Heller CA, Henrichsen K, Lawton R, Meadows P, Allen JI. Mental Health Costs of Inflammatory Bowel Diseases. *Inflamm Bowel Dis*. 2020 Feb 25;izaa030. Online ahead of print.

Tam V, Schwartz M, Holder-Murray J, Salgado Pogacnik J. Change in paradigm: impact of an IBD medical home on the outpatient management of acute severe ulcerative colitis. BMJ Case Rep. 2019 Oct 5;12(10):e230491.

Tandon M, Coudriet GM, Criscimanna A, Socorro M, Eliwi M, Singhi AD, Cruz-Monserrate Z, Bailey P, Lotze MT, Zeh H, **Hu J**, Goffin V, Gittes GK, Biankin AV, Esni F. Prolactin Promotes Fibrosis and Pancreatic Cancer Progression. *Cancer Res*. 2019 Oct 15;79(20):5316-5327. Epub 2019 Aug 8.

Tandon P, Dunn MA, Duarte-Rojo A. Resistance Training Reduces Risk of Sarcopenia in Patients With Cirrhosis. Clin Gastroenterol Hepatol. 2020 May;18(5):1036-1039. Epub 2019 Oct 4.

Tehrani S, Klinge M, Saul M, Morris M, Diergaarde B, **Schoen RE**. Prevalence of colorectal cancer and advanced adenoma in patients with acute diverticulitis: implications for follow-up colonoscopy. *Gastrointest Endosc*. 2020 Mar;91(3):634-640.

Thomas AL, Castellanos K, Mancinelli G, Xia Y, Bauer J, Yazici C, Fantuzzi G, Hwang RF, Krett NL, Papachristou GI, **Whitcomb DC**, Jung B. Activin A Modulates Inflammation in Acute Pancreatitis and Strongly Predicts Severe

- Disease Independent of Body Mass Index. *Clin Transl Gastroenterol*. 2020 May;11(5):e00152.
- Tirkes T, Shah ZK, Takahashi N, Grajo JR, Chang ST, Wachsman AM, Mawad K, Farinas CA, Li L, Appana SN, Conwell DL, **Yadav D**, Dasyam AK; Consortium for the Study of Chronic Pancreatitis, Diabetes, Pancreatic Cancer. Inter-observer variability of radiologists for Cambridge classification of chronic pancreatitis using CT and MRCP: results from a large multi-center study. *Abdom Radiol (NY)*. 2020 May;45(5):1481-1487.
- Tirkes T, **Yadav D**, Conwell DL, Territo PR, Zhao X, Venkatesh SK, Kolipaka A, Li L, Pisegna JR, Pandol SJ, Park WG, Topazian M, Serrano J, Fogel EL; Consortium for the Study of Chronic Pancreatitis, Diabetes, and Pancreatic Cancer. Magnetic resonance imaging as a non-invasive method for the assessment of pancreatic fibrosis (MIN-IMAP): a comprehensive study design from the consortium for the study of chronic pancreatitis, diabetes, and pancreatic cancer. *Abdom Radiol (NY)*. 2019 Aug;44(8):2809-2821.
- Tokuyama M, Geisler D, Deitrick C, **Fasanella KE**, **Chennat JS**, **McGrath KM**, Pai RK, Davison JM. Use of p53 immunohistochemistry in conjunction with routine histology improves risk stratification of patients with Barrett's oesophagus during routine clinical care. *Histopathology*. 2020 May 20. Online ahead of print.
- Uttam S, **Hashash JG**, LaFace J, **Binion D**, Regueiro M, Hartman DJ, **Brand RE**, **Liu Y**. Three-Dimensional Nanoscale Nuclear Architecture Mapping of Rectal Biopsies Detects Colorectal Neoplasia in Patients with Inflammatory Bowel Disease. *Cancer Prev Res (Phila)*. 2019 Aug;12(8):527-538. Epub 2019 Jun 4.
- Varelas LJ, Klinge MJ, **Malik SM**, Borhani AA, Neal M. Idiopathic pneumatosis intestinalis secondary to lactulose use in patients with cirrhosis. *J Gastroenterol Hepatol*. 2020 Jun;35(6):1065-1068. Epub 2019 Dec 9.
- Venkatesan T, **Levinthal DJ**, Li BUK, Hasler WL. Response to the letter by Udo Bonnet. *Neurogastroenterol Motil*. 2020 Jan;32(1):e13715.
- Ventura-Cots M, Abalde JG, **Bataller R**. REPLY: Factors Other Than Climate Are Likely to Influence Alcohol Consumption. *Hepatology*. 2020 May 17. Online ahead of print.
- Ventura-Cots M, Ballester-Ferré MP, Ravi S, **Bataller R**. Public health policies and alcohol-related liver disease. *JHEP Rep*. 2019 Aug 8;1(5):403-413. eCollection 2019 Nov.
- Vivian E, Cler L, Conwell D, Coté GA, Dickerman R, Freeman M, Gardner TB, Hawes RH, Kedia P, Krishnamoorthi R, Oduor H, Pandol SJ, Papachristou GI, Ross A, Sethi A, Varadarajulu S, Vege SS, Wassef W, Wilcox CM, **Whitcomb DC**, Wu BU, **Yadav D**, Ellison A, Habash S, Rastegari S, Reddy R, Yen T, Brooks MR, Tarnasky P. Acute Pancreatitis Task Force on Quality: Development of Quality Indicators for Acute Pancreatitis Management. *Am J Gastroenterol*. 2019 Aug;114(8):1322-1342.
- Wahlang B, Hardesty JE, Head KZ, Jin J, Falkner KC, Prough RA, Cave MC, **Beier JI**. Hepatic Injury Caused by the Environmental Toxicant Vinyl Chloride is Sex-Dependent in Mice. *Toxicol Sci*. 2020 Mar 1;174(1):79-91.
- Wahlang B, Jin J, **Beier JI**, Hardesty JE, Daly EF, Schnegelberger RD, Falkner KC, Prough RA, Kirpich IA, Cave MC. Mechanisms of Environmental Contributions to Fatty Liver Disease. *Curr Environ Health Rep*. 2019 Sep;6(3):80-94.
- Wang X, O'Connell K, Jeon J, Song M, Hunter D, Hoffmeister M, Lin Y, Berndt S, Brenner H, Chan AT, Chang-Claude J, Gong J, Gunter MJ, Harrison TA, Hayes RB, Joshi A, Newcomb P, **Schoen R**, Slattery ML, Vargas A, Potter JD, Le Marchand L, Giovannucci E, White E, Hsu L, Peters U, Du M. Combined effect of modifiable and non-modifiable risk factors for colorectal cancer risk in a pooled analysis of 11 population-based studies. *BMJ Open Gastroenterol*. 2019 Dec 2;6(1):e000339. eCollection 2019.
- Wang X, Sun Z, Zhang Y, Xu Z, Xin H, Huang H, **Duerr RH**, Chen K, Ding Y, Chen W. BREM-SC: a bayesian random effects mixture model for joint clustering single cell multi-omics data. *Nucleic Acids Res*. 2020 Jun 19;48(11):5814-5824.
- Weaver E, **Szigethy E**. *Managing Pain and Psychosocial Care in IBD: a Primer for the Practicing Gastroenterologist*. *Curr Gastroenterol Rep*. 2020 Mar 17;22(4):20.
- Weinberg DS, **Schoen RE**. Preneoplastic Colorectal Polyps: "I Found Them and Removed Them-Now What?". *Ann Intern Med*. 2019 Nov 5;171(9):667-668. Epub 2019 Sep 24.
- Werder EJ, **Beier JI**, Sandler DP, Falkner KC, Gripshover T, Wahlang B, Engel LS, Cave MC. Blood BTEXS and heavy metal levels are associated with liver injury and systemic inflammation in Gulf states residents. *Food Chem Toxicol*. 2020 May;139:111242. Epub 2020 Mar 20.
- Whitcomb DC**. *Barriers and Research Priorities for Implementing Precision Medicine*. *Pancreas*. 2019 Nov/Dec;48(10):1246-1249.
- Whitcomb DC**. *Primer on Precision Medicine for Complex Chronic Disorders*. *Clin Transl Gastroenterol*. 2019 Jul;10(7):e00067.
- Wilson AS, Koller KR, Ramaboli MC, Nesen-gani LT, Ocvirk S, Chen C, Flanagan CA, Sapp FR, Merritt ZT, Bhatti F, Thomas TK, **O'Keefe SJD**. Diet and the Human Gut Microbiome: An International Review. *Dig Dis Sci*. 2020 Mar;65(3):723-740.
- Wiseman KP, Silver MI, Klabunde CN, Buckman D, Wright P, Hickey TP, **Schoen RE**, Doria-Rose VP. Accuracy of Self-reported Colonic Polyps: Results from the Prostate, Lung, Colorectal, and Ovarian Screening Trial Study of Colonoscopy Utilization. *Cancer Epidemiol Biomarkers Prev*. 2020 May;29(5):982-989. Epub 2020 Feb 12.
- Wong C, Chen F, Alirezaie N, Wang Y, Cuggia A, Borgida A, Holter S, Lenko T, Domecq C; Alzheimer, Aô Disease Neuroimaging Initiative, Petersen GM, Syngal S, **Brand R**, Rustgi AK, Cote ML, Stoffel E, Olson SH, Roberts NJ, Akbari MR, Majewski J, Klein AP, Greenwood CMT, Gallinger S, Zogopoulos G. A region-based gene association study combined with a leave-one-out sensitivity analysis identifies SMG1 as a pancreatic cancer susceptibility gene. *PLoS Genet*. 2019 Aug 30;15(8):e1008344. eCollection 2019 Aug.
- Woodward Davis AS, Roozen HN, DuFort MJ, DeBerg HA, Delaney MA, Mair F, Erickson JR, Slichter CK, Berkson JD, Klock AM, Mack M, Lwo Y, Ko A, **Brand RM**, McGowan I, Linsley PS, Dixon DR, Prlic M. The human tissue-resident CCR5(+) T cell compartment maintains protective and functional properties during inflammation. *Sci Transl Med*. 2019 Dec 4;11(521):eaaw8718.
- Xu J**, **Liu Y**. *A guide to visualizing the spatial epigenome with super-resolution microscopy*. *FEBS J*. 2019 Aug;286(16):3095-3109. Epub 2019 Jun 5.
- Xu J**, Ma H, Ma H, Jiang W, Mela CA, Duan M, Zhao S, Gao C, Hahm ER, Lar-do SM, Troy K, Sun M, Pai R, Stolz DB, Zhang L, Singh S, **Brand RE**, Hartman DJ, **Hu J**, Hainer SJ, **Liu Y**. Super-resolution imaging reveals the evolution of higher-order chromatin folding in early carcinogenesis. *Nat Commun*. 2020 Apr 20;11(1):1899.

- Yakovchenko V, Miech EJ, Chinman MJ, Chartier M, Gonzalez R, Kirchner JE, Morgan TR, Park A, Powell BJ, Proctor EK, Ross D, Waltz TJ, **Rogal SS**. Strategy Configurations Directly Linked to Higher Hepatitis C Virus Treatment Starts: An Applied Use of Configurational Comparative Methods. *Med Care*. 2020 May;58(5):e31-e38. 2020 May;65(5):1324-1333. Epub 2019 Oct 23.
- Yeh CY, Ye Z, Moutal A, Gaur S, Henton AM, Kouvaros S, **Saloman JL**, Hartnett-Scott KA, Tzounopoulos T, Khanna R, Aizenman E, Camacho CJ. Defining the Kv2.1-syntaxin molecular interaction identifies a first-in-class small molecule neuroprotectant. *Proc Natl Acad Sci U S A*. 2019 Jul 30;116(31):15696-15705.
- Yin H, Hardikar S, Lindstroem S, Hsu L, Anderson KE, Banbury BL, Berndt SI, Chan AT, Giovanucci EL, Harrison TA, Joshi AD, Nan H, Potter JD, Sakoda LC, Slattery ML, **Schoen RE**, White E, Peters U, Newcomb PA. Telomere Maintenance Variants and Survival after Colorectal Cancer: Smoking- and Sex-Specific Associations. *Cancer Epidemiol Biomarkers Prev*. 2020 Jun 25. Online ahead of print.
- Young JL, Yan X, Xu J, Yin X, Zhang X, **Arteel GE**, Barnes GN, States JC, Watson WH, Kong M, Cai L, Freedman JH. Cadmium and High-Fat Diet Disrupt Renal, Cardiac and Hepatic Essential Metals. *Sci Rep*. 2019 Oct 11;9(1):14675. Publisher Correction: 2020 Feb 10;10(1):2609.
- Zakas AL, Leifeste C, Dudley B, Karloski E, Afonso S, Grubs RE, Shaffer JR, Durst AL, Parkinson MD, **Brand R**. The impact of genetic counseling on patient engagement in a specialty cancer clinic. *J Genet Couns*. 2019 Oct;28(5):974-981. Epub 2019 Jul 11.
- Zanieri F, Levi A, Montefusco D, Longato L, De Chiara F, Frenguelli L, Omenetti S, Andreola F, Luong TV, Massey V, Caballeria J, Fondevila C, Shanmugavelandy SS, Fox T, Mazza G, Argemi J, **Bataller R**, Cowart LA, Kester M, Pinzani M, Rombouts K. Exogenous Liposomal Ceramide-C6 Ameliorates Lipidomic Profile, Energy Homeostasis, and Anti-Oxidant Systems in NASH. *Cells*. 2020 May 16;9(5):1237.
- Zhang G, Patel K, Moghe A, Reid A, Serper M, Calgaro L, Gibson S, Zickmund S, **Shaikh O**, **Rogal S**. Provider Perceptions of Hepatitis C Treatment Adherence and Initiation. *Dig Dis Sci*.

ACKNOWLEDGMENTS

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