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Courtesy Dr. Denise M. Dupras, Mayo Clinic, Rochester, Minn.

Dr. Denise M. Dupras of the Mayo Clinic, Rochester, Minn., and colleagues found less than half of internal medicine residency programs have formal health disparities curricula.

Internal medicine residents

Health disparities training falls short

BY HEIDI SPLETE
MDedge News

Less than half of internal medicine residency program directors report formal curricula on the topic of health disparities, according to findings of a survey of medical directors and residents across the United States.

Despite recommendations from the Institute of Medicine going back to 2002 calling for increased education on the topic for health care providers, data from a 2012 survey showed that only 17% of internal medicine programs had a health disparities curriculum, wrote Denise M. Dupras, MD, of the Mayo Clinic, Rochester, Minn., and colleagues.

To describe internal medicine residency training programs' curricula and educational experiences on health disparities and to determine residents' perceptions of training, the researchers designed a cross-sectional survey study including 227 program directors and 22,723 internal medicine residents. The sur-

See **Disparities** · *page 25*

AGA Clinical Practice Update

Management of nonvariceal upper GI bleeding

BY WILL PASS
MDedge News

The American Gastroenterological Association (AGA) has published a clinical practice update for endoscopic management of nonvariceal upper GI bleeding (NVUGIB).

The update includes 10 best practice recommendations based on clinical experience and a comprehensive literature review, reported lead author Daniel K. Mullady, MD, of Washington University in St. Louis.

"Numerous endoscopic devices have been developed over the past 30 years with demonstrated effectiveness in treating NVUGIB," Dr. Mullady and colleagues wrote in Gastroenterology. "The purpose of this clinical practice update is to review the key concepts, new devices, and therapeutic strategies in endoscopically combating this age-old clinical dilemma."

According to the investigators, endoscopy is central to management of NVUGIB, but only after patients are appropriately triaged and stabilized.

"[E]ndoscopy should be performed to determine

See **Bleeding** · *page 17*

INSIDE

Complete endoscopic healing tied to better Crohn's disease outcomes

BY AMY KARON
MDedge News

Patients with Crohn's disease who experienced complete endoscopic healing with biologic therapy had significantly lower subsequent rates of treatment failure, intestinal resection, and hospitalization, compared with patients who experienced only partial mucosal healing, according to the findings of a two-center retrospective study.

Over a median of 4.8 years of follow-up (interquartile range, 2.1-7.2 years) rates of treatment

See **Healing** · *page 7*

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LETTER FROM THE EDITOR

September marks 9 months

It has been a busy month. September will mark the ninth month of U.S. COVID-19 with the country now surpassing 5 million cases and more than 175,000 deaths. Daily life and our medical practices will never be the same. Many have lost friends, family, businesses, and hope. Instead of acting as a nation to pull through this together, we seem to be entering a continual state of Thoreau solitude combined with Garrett Hardin's tragedy of the commons.

Dr. Allen

September will mark the ninth month of U.S. COVID-19. Daily life and our medical practices will never be the same. Many have lost friends, family, businesses, and hope.

In the last 2 months *GI & Hepatology News* published a two-part opinion piece about the acquisition of physicians' GI practices by private equity (PE) companies. I received a strongly worded (but justified) email criticizing the newspaper for being one sided and not declaring a conflict of interest on the part of the author. For both issues, I take sole responsibility. While it is important for us to understand how PE is affecting GI practices, the author did have a personal stake in the success of this financial model. It is important to note that details of a PE acquisition can vary greatly depending on the PE company involved and PE companies looking to acquire practices now can be counted in the hundreds. The pros and cons of PE acquisitions were argued prior to COVID-19, but since the first quarter of 2020, the model is even more confusing. We will find out over the next several years whether this ever-proliferating model of practice financing will be successful or disastrous.

In November, *GI & Hepatology News* will publish a special supplement called *Gastroenterology Data Trends*. This publication will include brief, but robust snapshots of major trends in topics ranging from NAFLD, IBD, and GI cancers to the impact of COVID-19 on GI practices. We have collected a stellar group of authors to help us.

This month, the school year begins in ways that are still being sorted out. The "Big House" will not host its usual 110,000 fans packed like sardines watching Michigan football. I hope all of our readers skipped Sturgis this year. Stay safe, stay apart, and mask up.

John I. Allen, MD, MBA, AGAF
Editor in Chief

Top AGA Community patient cases

Physicians with difficult patient scenarios regularly bring their questions to the AGA Community (https://community.gastro.org) to seek advice from colleagues about therapy and disease management options, best practices, and diagnoses. The upgraded networking platform now features a newsfeed for difficult patient scenarios and regularly scheduled Roundtable discussions with experts in the field.

In case you missed it, here are some clinical discussions and Roundtables in the newsfeed this month:

- AGA Clinical Practice Update on Pancreas Cancer Screening in High-Risk Individuals: Expert Review (https://community.gastro.org/posts/22199)
- Establishing an acute colitis pathway (https://community.gastro.org/posts/22171)
- Preprocedure COVID testing (https://community.gastro.org/posts/22164)
- Patient case: Gastroesophageal varices (https://community.gastro.org/posts/22098)
- Patient case: IBD with intra-abdominal sepsis (https://community.gastro.org/posts/22055)
- Patient case: Hypervascular pancreatic parenchyma (https://community.gastro.org/posts/22039)

Roundtables (https://community.gastro.org/discussions/)

- Windows on Clinical GI
- Clinical Challenges in IBD: Ulcerative colitis and a fistula
- GI COVID-19 Connection: Implementing an effective long-term telehealth program in a post-COVID world

View all upcoming Roundtables in the community at https://community.gastro.org/discussions.

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Prospective study eyes risks for poor outcomes in PSC

BY AMY KARON
MDedge News

In individuals with inflammatory bowel disease (IBD) and primary sclerosing cholangitis (PSC), younger age at diagnosis, male sex, and Afro-Caribbean heritage were significant risk factors for liver transplantation and disease-related death, based on a 10-year prospective population-based study.

These factors should be incorporated into the design of clinical trials, models for predicting disease, and studies of prognostic biomarkers for PSC, Palak J. Trivedi, MBBS, MRCP, of the University of Birmingham (England) wrote with his associates in Gastroenterology.

The researchers identified newly diagnosed cases from a national health care registry in England between 2006 and 2016 (data on outcomes were collected through mid-2019). In all, 284,560 individuals had a new diagnosis of IBD, among whom 2,588 also had PSC. The investigators tracked deaths, liver transplantation, colonic resection, cholecystectomy, and diagnoses of colorectal cancer, cholangiosarcoma, and cancers of the pancreas, gallbladder, and liver. They evaluated rates of these outcomes among individuals with both PSC and IBD (PSC-IBD) and those with IBD only.

After controlling for sex, race, socioeconomic level, comorbidities, and older age, the researchers found that both men and women with PSC-IBD had a significantly greater risk for all-cause mortality, compared with individuals with IBD alone (hazard ratio, 3.20; 95% confidence interval, 3.01-3.40; *P* less than .001). Strikingly, individuals who were diagnosed with PSC when they were younger than 40 years had a more than sevenfold higher rate of all-cause mortality, compared with individuals with IBD only. In contrast, the incidence rate ratio for individuals diagnosed with PSC when they were older than 60 years was less than 1.5, compared with IBD-only individuals.

Having PSC and ulcerative colitis, being younger when diagnosed with PSC, and being of Afro-Carribean heritage all correlated with higher incidence of liver transplantation or death related to PSC.

Having PSC and ulcerative colitis, being younger when diagnosed with PSC, and being of Afro-Carribean heritage all correlated with higher incidence of liver transplantation or death related to PSC. Individuals with PSC-IBD who were of Afro-Caribbean heritage had an approximately twofold greater risk for liver transplantation or PSC-related death compared with whites (adjusted HR, 2.05; 95% CI, 1.14-3.70; *P* = .016). In contrast, women with PSC-IBD were at significantly lower risk for liver transplantation or disease-related death than were men (adjusted HR, 0.74; 95% CI, 0.57-0.97; *P* = .026).

"The onset of PSC confers heightened risks of all hepatobiliary malignancies, although annual imaging surveillance may associate with a reduced risk of cancer-related death," the investigators found. Among patients with hepatobiliary cancer, annual imaging was associated with a twofold decrease in risk for cancer-related death (HR, 0.43; 95% CI, 0.23-0.80; *P* = .037).

Colorectal cancer tended to occur at a younger age in individuals with PSC-IBD, compared with those with IBD alone (median ages at diagnosis, 59 vs. 69 years; *P* less than .001). Notably, individuals with PSC diagnosed under age 50 years had about a fivefold higher incidence of colorectal cancer than did those with IBD alone, while those diagnosed at older ages had only about a twofold increase. With regard to colectomy, men diagnosed with PSC at younger ages were at the greatest risk, compared with women or individuals diagnosed after age 50 years. Individuals with ulcerative colitis and PSC had a 40% greater risk for colectomy risk than did IBD-only individuals (time-dependent adjusted HR, 1.65; 95% CI, 1.45-1.85; *P* less than .001).

"Whilst all-cause mortality rates increase with age, younger patients [with PSC] show a disproportionately increased incidence of liver transplantation, PSC-related death, and colorectal cancer," the researchers concluded.

Dr. Trivedi disclosed support from the National Institute for Health Research Birmingham Biomedical Research Centre, at the University Hospitals Birmingham NHS Foundation Trust and the University of Birmingham. No other disclosures were reported.

ginews@gastro.org

SOURCE: Trivedi PJ et al. Gastroenterology. 2020 May 19. doi: 10.1053/j.gastro.2020.05.049.

Changing disease course possible

Healing *from page 1*

failure were 25% in patients with complete mucosal healing at baseline (that is, a Crohn's Disease Endoscopic Index of Severity [CDEIS] score of 0) and 48% in patients with partial healing (CDEIS score greater than 0 but less than 4). The difference was statistically significant (*P* = .045). No patient with a baseline CDEIS score of 0 required intestinal resection, compared with 11% of patients with scores greater than 0 but less than 4 (*P* = .031). Rates of hospitalization because of Crohn's disease were 3.5% versus 18.5%, respectively (*P* = .013). Clara Yzet, MD, of Amiens (France) University Hospital, Université de Picardie Jules Verne, reported the findings together with her associates in Clinical Gastroenterology and Hepatology.

Mucosal healing is a key therapeutic target in Crohn's disease that has been linked to desirable outcomes, such as steroid-free remission and a less frequent intestinal resection. However, prior observational studies have inconsistently defined mucosal healing, and clinical trials of biologics have used any of at least seven different definitions, the researchers wrote. Recently, in patients with ulcerative colitis, a Scandinavian Journal of Gastroenterology (2016;51[9]:1069-74) and another in the Journal of Crohn's and Colitis (2016;10[1]:13-9) linked a stricter definition of mucosal healing (an endoscopic Mayo score of 0, or histologic healing) with superior long-term clinical outcomes. In patients with Crohn's disease, however, there has been no established threshold for mucosal healing based on either the CDEIS or the Simplified Endoscopic Score for Crohn's disease (SES-CD).

Therefore, Dr. Yzet and her associates identified and reviewed the medical records of 84 consecutive adults with clinically remitted Crohn's disease who received anti–tumor necrosis factor therapies (infliximab and adalimumab) or vedolizumab at two university hospitals in France between 2008 and 2015. All patients received baseline and follow-up colonoscopies, with results scored on the CDEIS. In all cases, the second CDEIS score was less than 4 (the CDEIS ranges from 0 to 44). The primary outcome was treatment failure, defined as the need for biologic optimization (increasing the dose or shortening the dosing interval of the biologic), corticosteroids, or immunosuppressants; a Harvey-Bradshaw score greater than 4 associated with a change in treatment; or the need for intestinal resection or hospitalization because of Crohn's disease.

At baseline, 57 patients had CDEIS scores of 0 (complete mucosal healing) and 27 patients had scores greater than 0 but less than 4 (partial mucosal healing). The two groups were otherwise similar except that patients with complete mucosal healing had a shorter median duration of Crohn's disease (10.3 vs. 15.1 years in the partial healing group; *P* = .029) and a lower prevalence of Crohn's disease phenotype B2 (stricturing) according to the Vienna classification (1.8% vs. 14.8%; *P* = .035). In the multivariate analysis, CDEIS score was the only factor associated with treatment failure (hazard ratio, 2.61; 95% confidence interval, 1.16-5.88; *P* = .02).

"Our findings suggest that we should be more ambitious in clinical practice to change patients' life and disease course by achieving complete endoscopic healing. However, this strategy could be limited by the ability of current drugs to achieve complete mucosal healing," the researchers wrote.

No external funding sources were reported. Two coinvestigators disclosed ties to AbbVie, Amgen, Biogaran, Biogen, Ferring, Janssen, MSD, Pfizer, Takeda, and several other pharmaceutical companies. The remaining investigators reported no conflicts of interest.

ginews@gastro.org

SOURCE: Yzet C et al. Clin Gastroenterol Hepatol. 2019 Nov 16. doi: 10.1016/j.cgh.2019.11.025.

Antibodies improved inflammation in mice with NASH

BY AMY KARON
MDedge News

Changes in a variety of T cells in the liver and visceral adipose tissue play a key role in the pathogenesis of nonalcoholic steatohepatitis (NASH), according to the results of a murine study.

Mikhaïl A. Van Herck, of the University of Antwerp (Belgium), and associates fed 8-week-old mice a high-fat, high-fructose diet for 20 weeks, and then switched the mice to standard mouse chow for 12 weeks. The high-fat, high-fructose diet induced the metabolic syndrome and NASH, accompanied by shifts in T cells. Interleukin-17–producing (Th17) cells increased in the liver, visceral adipose tissue (VAT), and blood, while regulatory T cells decreased in VAT, and cytotoxic T (Tc) cells rose in VAT while dropping in the blood and spleen.

These are "important immune disruptions," the researchers wrote in Cellular and Molecular Gastroenterology and Hepatology. "In particular, [VAT] Tc cells are critically involved in NASH pathogenesis, linking adipose tissue inflammation to liver disease."

After the mice were switched from the high-fat, high-fructose diet to standard mouse chow, their body weight, body fat, and plasma cholesterol significantly decreased and their glucose tolerance and insulin sensitivity improved to resemble that of mice fed standard mouse chow throughout the study. Mice that underwent diet reversal also had significantly decreased liver weight and levels of plasma ALT, compared with mice that remained on the high-fat, high-fructose diet. Diet reversal also improved liver histology (nonalcoholic fatty liver disease activity scores), compared with the high-fat, high-fructose diet, the researchers wrote.

Genetic tests supported these findings. On multiplex RNA analysis, hepatic expression of Acta2, Col1a1, and Col1a3 reverted to normal with diet reversal, indicating a normalization of hepatic collagen. Hepatic expression of the metabolic genes Ppara, Pparg, and Fgf21 also returned to normal, while VAT showed a decrease in Lep and Fgf21 expression and resolution of adipocyte hypertrophy.

However, diet reversal did not reverse inflammatory changes in T-cell subsets. Administering anti-CD8a antibodies after diet reversal decreased Tc cells in all tissue types that were tested the investigators wrote. Treating the mice with antibodies targeting IL-17A did not attenuate NASH but did reduce hepatic inflammation.

The fact that "the most pronounced effect" on NASH resulted from correcting immune disruption in VAT underscored "the immense importance of adipose tissue inflammation in [NASH] pathogenesis," the researchers wrote. The finding that diet reversal alone did not reverse inflammation in hepatic or VAT "challeng[es] our current understanding of the reversibility of NASH and other obesity-related conditions."

Funders included the University Research Fund, University of Antwerp, and Research Foundation Flanders. The researchers reported no conflicts of interest except that one coinvestigator is the chief science officer at Biocellvia, which performed some histologic analyses.

ginews@gastro.org

SOURCE: Van Herck MA et al. Cell Molec Gastroenterol Hepatol. 2020 Apr 20. doi: 10.1016/j.jcmgh.2020.04.010.

This study by Van Herck et al. advances our understanding of just how important a two-pronged environmental and biologic approach is to turn the NASH tide. The authors demonstrate that both dietary environmental exposure and biologic tissue-specific T-cell responses are involved in NASH pathogenesis, and that targeting one part of the equation is insufficient to fully mitigate disease. They observed that mice with more severe diet-induced NASH had more Th17 cells in the liver and visceral adipose tissue and more cytotoxic T cells in VAT. Conversely, there were fewer VAT T regulatory cells in mice with more liver inflammation. The major novelty of this study is that simply changing the diet to a metabolically healthier diet failed to correct T-cell dysregulation. Only T cell–directed therapies improved this abnormality.


Dr. Carr

The implication of their study is that, despite weight loss and improvement in liver histology and metabolic parameters, individuals with NASH may still harbor an inflammatory milieu involved in NASH pathogenesis. Perhaps this at least partially explains why the majority of NASH patients have recurrent NASH post transplant. These data should prompt those who care for NASH patients to establish long-term care models that are focused on both adherence to dietary recommendations and monitoring of (and ultimately treatment of) systemic inflammation.

Rotonya M. Carr, MD, is an assistant professor of medicine in the division of gastroenterology at the University of Pennsylvania, Philadelphia. She is director of the liver metabolism and fatty liver program, and codirector of the human metabolic tissue resource. She receives research and salary support from Intercept Pharmaceuticals.

Model identified heavy drinkers at highest risk of ALD progression

BY AMY KARON
MDedge News

In heavy drinkers with alcohol-related liver disease, a Markov model based on age, sex, body mass index, and duration and extent of alcohol use predicted risk for disease progression, researchers reported in Clinical Gastroenterology and Hepatology.

The study included 2,334 hospitalized adults with consistently abnormal liver test results who had consumed at least 50 grams of alcohol (about 3.5-4 drinks) per day for the previous 5 years. The model was developed using data from 1,599 individuals with baseline liver biopsies and validated in 735 individuals with no baseline liver biopsies but available data on the presence or absence of hepatic decompensation.

For a 40-year-old man with F0-F2 fibrosis who had been drinking alcohol for 15 years, who drank 150 grams of alcohol daily, and who had a body mass index of 22 kg/m^2, the model predicted a 31.8% likelihood of having a normal liver at baseline, a 61.5% probability of baseline steatosis, and a 6.7% probability of baseline steatohepatitis. In women with the same baseline variables, respective probabilities were 25.1%, 66.5%, and 8.4%. Based on these findings, the 5-year weighted risk for liver complications ranged from 0.2% for men with normal initial liver findings to 10.3% for men with baseline steatohepatitis. Among women, the corresponding risk estimates ranged from 0.5% to 14.7%, wrote PhD student Claire Delacôte of Centre Hospitalier Universitaire de Lille (France), and associates.

"This tool might be used by general practitioners or hepatologists to identify heavy drinkers at high risk for alcohol-related liver disease progression," the investigators added. "This model might be used to adapt patient care pathways."

The patients in this study were admitted to the hepatogastroenterology unit of a French hospital between 1982 and 1997. The Markov model incorporated seven stages of alcohol-related liver disease: normal liver (no fibrosis or steatosis), steatosis and F0-F2 fibrosis, alcohol-induced steatohepatitis and F0-F2 fibrosis, steatosis and F3-F4 fibrosis, alcohol-induced steatohepatitis and F3-F4 fibrosis, liver complications without steatohepatitis, and liver complications with alcohol-induced steatohepatitis. Liver complications were defined as hepatocellular carcinoma or liver decompensation (bilirubin >50 mmol/L, gastrointestinal hemorrhage, or ascites). Risk for progressing to liver complications was based on METAVIR score and onset of alcohol-induced steatohepatitis.

The researchers also looked specifically at F3-F4 (severe) fibrosis because of its clinical significance and common use as a study endpoint. Among 40-year-olds with a 15-year history of heavy drinking, the estimated prevalence of alcohol-induced steatohepatitis was 30.0% for men

Continued on following page

Switching to low-inflammatory diet linked to lower risk for Crohn's disease

BY AMY KARON
MDedge News

Among adults who consumed a proinflammatory diet, switching to a diet with lower inflammatory potential was associated with a significant subsequent decrease in risk for Crohn's disease, according to a study of three longitudinal observational cohorts.

Researchers calculated empirical dietary inflammatory pattern (EDIP) scores based on food-frequency questionnaires completed by 166,903 women and 41,931 men who participated in the Nurses' Health Study, the Nurses' Health Study II, and the Health Professionals Follow-up Study. Questionnaires were completed at two time points, separated by 8 years. Overall, adults whose cumulative average EDIP scores fell within the highest quartile – meaning their diets had the highest inflammatory potential – were at 51% greater risk for developing Crohn's disease than were adults whose diets fell within the lowest EDIP quartile (hazard ratio, 1.51; 95% confidence interval, 1.19-2.07; *P* = .01).

Strikingly, however, adults who initially consumed a proinflammatory diet (which is high in calories, red meat, high-fat dairy, and refined grains) and then switched to a low-inflammatory diet (one based around fruit, vegetables, legumes, whole grains, fish, and lean protein) had a statistically similar risk for Crohn's disease as adults who consumed a low-inflammatory diet at both time points. The 95% confidence interval for the hazard ratio crossed 1.0 (HR, 1.51; 95% CI, 0.76-3.00). In contrast, adults who initially consumed a low-inflammatory diet and later changed to a proinflammatory diet were at twofold greater risk for Crohn's disease than were those who remained on a low-inflammatory diet (HR, 2.05; 95% CI, 1.10-3.79).

These findings accounted for potential confounders, such as age, study cohort, time period, race, smoking, physical activity, and use of oral contraceptives and hormone replacement therapy, wrote Chun-Han Lo, MD, of the Harvard T.H. Chan School of Public Health, Boston, together with his associates in Gastroenterology.

The EDIP score is a weighted sum of 18 food groups that characterizes the potential for dietary inflammation based on circulating concentrations of inflammatory biomarkers. A proinflammatory diet may "trigger the onset of intestinal inflammation by inducing changes in [the] gut microbiome, altering host homeostasis, and regulating T-cell immune response," the investigators noted.

In this study, which included nearly 5 million person-years of follow-up, 328 individuals were diagnosed with Crohn's disease and 428 individuals developed ulcerative colitis. Median age at inflammatory bowel disease diagnosis was 55 years, with a range of 29-85 years. Notably, change in EDIP score was not linked to ulcerative colitis risk. Diet may be more relevant in Crohn's disease than ulcerative colitis, and dietary factors linked to ulcerative colitis were not associated with inflammatory markers in the cohorts and, thus, were not factored into EDIP score, the researchers wrote.

The link between EDIP score and Crohn's disease in this study did not change after controlling for fiber intake. Red wine (which contains anti-inflammatory resveratrol) might be a protective factor, the researchers hypothesized. They also found that pizza – a processed, calorie-dense food – was significantly inversely linked to inflammatory markers, perhaps because pizza contains abundant lycopene (from tomato paste) and fat (which facilitate lycopene absorption).

Prior studies on diet and inflammatory bowel disease assessed diets at only one time point and categorized dietary habits based on food groups, rather than linking foods with inflammatory markers, the researchers wrote. "Here, by identifying a combination of food groups predictive of circulating markers of inflammation, we provide a more robust evidence base behind the association of these foods with inflammation and inflammatory bowel disease."

Most study participants were White health professionals. The researchers noted that "studies of

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and 33.3% for women. The 5-year risk for liver complications was higher in women (30.1%) than men (24.5%) and was highest among women with baseline alcohol-induced steatohepatitis (41.0%). Overall, women had a 24.8% greater risk for disease progression than men (hazard ratio, 1.248).

Risk for liver complications also increased with age, and each 1-year increase in age at the beginning of heavy drinking heightened the risk for disease progression by 3.8%, regardless of stage of liver disease. "Based on these predictions, 50-year-old women are a high-risk subgroup of [alcohol-related liver] disease progression and should receive close follow-up," the researchers wrote.

In addition, obese individuals (BMI, 30) had an 11.8% greater risk for progression of alcohol-related liver disease, compared with those with a BMI of 22. Consuming an additional 10 grams of alcohol per day had less impact on risk, the researchers noted.

"If patients are identified as being heavy drinkers by the general practitioner with no evaluation of fibrosis, these patients should be referred to a hepatologist. Nevertheless, we think that the threshold defining the high-risk population, which has been arbitrarily fixed at 5%, should be discussed by experts because it affects the patient's care pathway. An online application is being developed to help clinicians and general practitioners in their daily practice," they wrote.

No funding sources were reported. Ms. Delacôte reported having no conflicts of interest. Three coinvestigators disclosed ties to AbbVie, Bayer Healthcare, Eisai, Gilead, MSD, Novartis, Sanofi, and Servier. The others reported having no conflicts.

ginews@gastro.org

SOURCE: Delacôte C et al. Clin Gastroenterol Hepatol. 2020 Jan 11. doi: 10.1016/j.cgh.2019.12.041.

In the life of a hepatologist few things are as gratifying as when a patient with alcohol-related liver disease (ALD) quits drinking. Though we wish this were the norm, ALD is both increasingly common and morbid. Tools to connect with and empower real change in our patients with ALD are urgently needed. Unfortunately, our toolbox is somewhat bare.


Dr. Tapper

To improve, we must become accustomed to (and partner with experts in) the care of substance use disorder. We must learn to maximize the impact of our counseling on our patients. Behavioral interventions for ALD require goal-setting and self-regulation and both depend on the patient's outcome expectations. All would be immeasurably strengthened with concrete prognostic data.

This is why the Delacôte et al. study is important. The authors create a multistate model with inputs from cohorts of patients with biopsy-proven and staged ALD. The result is a specific 5-year risk of cirrhotic decompensation or hepatocellular carcinoma tailored to the patient's age, sex, body mass index, alcohol use duration, and liver histology. Although this model's estimates have confidence intervals and their generalizability would be improved if histology were replaced with noninvasive indices, these data are among the most tangible illustrations of risk available for patient-doctor deliberations.

Knowledge, when communicated effectively, is the cornerstone of behavioral change. Translating the abstract concept of progressive ALD into personalized, modifiable risks is a leap forward. We have a new tool; let's use it.

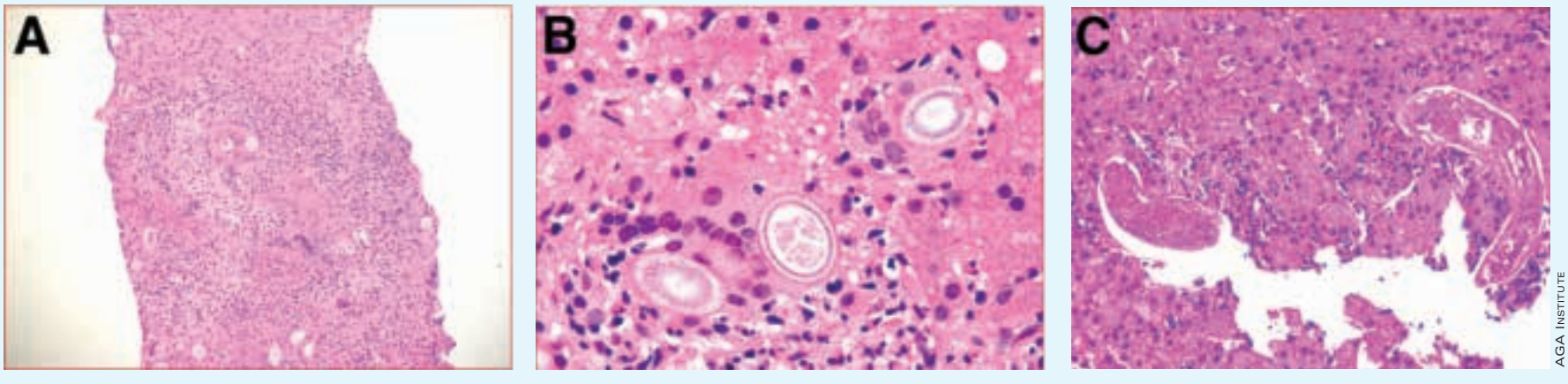
Elliot B. Tapper, MD, is an assistant professor in gastroenterology and internal medicine at Michigan Medicine, Ann Arbor. He has no conflicts of interest.

What is your diagnosis?

By Aathira Ravindranath, MBBS, MD, Moinak Sen Sarma, MD, and Surender Kumar Yachha, MBBS, MD. Published previously in Gastroenterology (2019;157[1]:23-4).

A 15-month-old, previously thriving boy from western urban India was brought in with high-grade pyrexia of unknown origin for the last 45 days. He had received multiple courses of antibiotics and antimalarials elsewhere without any response. Appetite and general activity were preserved. Examination revealed mild pallor, significant nontender soft hepatomegaly (liver span of 14 cm) without splenomegaly or peripheral lymphadenopathy. Investigations showed a hemoglobin of 9 g/dL, microcytic hypochromic smear, total leukocyte count of 48,900/mm^3, neutrophils at 16%, lymphocytes at 23%, eosinophils at 58%, absolute eosinophil count of 28,362/mm^3, platelet count of 490,000/mm^3, bilirubin of 0.8 mg/dL, aspartate aminotransferase of 203 IU/L, alanine aminotransferase of 179 IU/L, total protein of 9.3 g/dL, albumin of 3.6 g/dL, alkaline phosphatase of 203 IU/L, and gamma-glutamyl transpeptidase of 107 IU/L. Ultrasound examination and computed tomography scans of abdomen showed no focal lesions or abscesses. A bone marrow biopsy revealed an increase in eosinophils and its precursors. Echocardiography, retroviral serology, and multiple blood and urine cultures were unyielding. Liver biopsy was performed for diagnosis (Figures A–C).

The diagnosis is on page 18.



Continued from page 9

dietary risk factors have not revealed a strong ethnicity-specific association, [but] extrapolating our findings to individuals of other ethnicity should be performed with caution."

The National Institutes of Health, the Beker Foundation, the Chleck Family Foundation, and the Crohn's and Colitis Foundation provided funding. Three coinvestigators disclosed ties to AbbVie, Bayer Pharma AG, Boehringer Ingelheim, Gilead, Janssen, Kyn Therapeutics, Merck Pfizer, Policy Analysis, and Takeda.

SOURCE: Lo C-H et al. Gastroenterology. 2020 May 1. doi: 10.1053/j.gastro.2020.05.011.

Diet is the single most modifiable risk factor influencing inflammatory bowel disease (IBD) development. Accordingly, animal studies show that specific nutrients and food additives impact gut barrier function and/or microbiota, thereby influencing disease development. However, using these studies to provide humans practical dietary advice has been difficult, in part because effects of isolated food components can be quite different from those of complex foods. The complex nature of human foods has also stymied epidemiologic approaches to determine how diet influences IBD risk. This difficulty is exacerbated by the potential of IBD itself to influence diet, likely beginning long before disease diagnosis.

Dr. Gewirtz

Lo and colleagues surmount these problems by developing the "empirical dietary inflammatory pattern" (EDIP), which is a metric that quantifies the proinflammatory potential of one's overall diet based on the extent to which its components associate with proinflammatory cytokine levels in a large healthy human cohort. Retrospective application of this metric to three large human cohorts found that consumption of proinflammatory diets increased risk of developing Crohn's disease but not ulcerative colitis. This indicates, perhaps not surprisingly, that a central means by which diet influences risk of Crohn's is by promoting inflammation in susceptible hosts. Furthermore, while this approach implicated the usual suspects, such as low-fiber processed foods, in promoting Crohn's, it also found a protective role for pizza, perhaps reflecting the anti-inflammatory action of its tomato-based components. It should soon be possible for persons with high genetic risk for Crohn's to use the EDIP to discern how their diet is influencing that risk and, moreover, designing practical strategies to mitigate it.

Andrew T. Gewirtz, PhD, is a professor at Georgia State University's Institute for Biomedical Sciences, Atlanta. He has no conflicts.

AGA launches new virtual series on COVID-19 findings

Join us for our new GI Forging Forward virtual symposia series, a practical educational training program covering timely topics for GIs through the lens of COVID-19. Experts in the field will present the latest COVID-19 findings, share proven strategies to communicate and manage disaster and crisis situations, and educate participants on evidence-based recommendations to meet today's evolving needs. Upcoming topics will cover keeping you, your staff, and patients safe, new approaches and training in research, leading in times of crisis, and rapid-response guideline development.

Upcoming topics will cover keeping you, your staff, and patients safe, new approaches and training in research, leading in times of crisis, and rapid-response guideline development.

Registration for this month's virtual webinars are now open:

Demystifying publishing in AGA journals: Perspectives from our authors and editors: Sept. 3, 2020, 5:30 p.m. EDT

Flexing your communications skills during a time of crisis: Sept. 17, 2020, 5:30 p.m. EDT

For more information, visit www.gastro.org/GIForgingForward.

ginews@gastro.org

How we're combatting racism, health disparities

The AGA Equity Project advisory board has released a new commentary in Gastroenterology: "From Intention to Action: Operationalizing AGA Diversity Policy to Combat Racism and Health Disparities in Gastroenterology."

The commentary provides a transparent self-examination of AGA's recent racial and ethnic demographic data of its members, volunteer leaders, and staff compared with U.S. population data. It also assesses AGA's previous initiatives focused on diversity, equity, and inclusion. It then looks ahead by detailing AGA's plans to further operationalize the goals enumerated in the AGA Diversity Policy.

For more information, read the full commentary at www.gastro.org/diversitycommentary.

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New AGA guidance on virus testing patients before endoscopy

A new evidence-based review published in *Gastroenterology* helps you answer the question: Should my endoscopy center test asymptomatic patients for SARS-CoV-2 prior to endoscopy?

Key guidance for GIs

1. Endoscopy centers in areas with an intermediate prevalence of SARS-CoV-2 infection should consider testing patients for the virus before endoscopy. Several important factors contribute to this decision including testing feasibility, personal protective equipment (PPE) availability, and risk aversion threshold of endoscopists and staff.

2. Endoscopy centers in both low- and high-prevalence areas may not benefit from a pre-testing strategy.

- Rationale for low-prevalence areas: Diagnostic tests have a high proportion of false positives with significant downstream consequences, such as patient burden (quarantining and out of work for 14 days), unnecessarily delayed cases, and over-utilization of testing which may already be limited in availability. Therefore, PPE availability may drive decision-making for case triage instead. If PPE is not limited, then the majority of endoscopists and staff may reasonably select to use N95/N99 respirators or PAPRs.
- Rationale for high-prevalence areas: Highest available PPE (such as N95/N99 respirators or PAPRs) would be used universally, as available. Additionally, testing is often limited because of a high demand for a potential surge of cases.

AGA created an online tool to help endoscopy centers make decisions about their pre-endoscopy testing strategy. This tool combines local prevalence with diagnostic test performance data to calculate the proportion of true versus false positives and negatives to help endoscopy centers understand the downstream consequences of implementing a pre-procedure testing strategy.

To access the Rapid Review and online tool, visit www.gastro.org/COVID.

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When to screen for pancreas cancer

AGA has released a new Clinical Practice Update providing best practice advice for clinicians screening and diagnosing pancreatic cancer in high-risk individuals. Screening to detect pancreas cancers and their precursor lesions in high-risk patients can improve survival if it facilitates surgical resection for early-stage disease.

In the AGA Clinical Practice Update on Pancreas Cancer Screening in High-Risk Individuals: Expert Review, published in *Gastroenterology's* July issue, the authors provide 13 best practice advice statements to address key issues in clinical management of these patients.

For more information, visit www.gastro.org/PancreasCPU.

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Clinical judgment is key

Bleeding *from page 1*

the source of bleeding, to assess rebleeding risk, and to treat lesions at high risk for rebleeding," they wrote. "Exactly when the endoscopy should be performed is a clinical judgment made by the gastroenterologist in consultation with the primary service."

The investigators recommended that endoscopy be performed within 12 hours for emergent cases and within 24 hours for urgent cases, whereas elective cases could wait longer.

They noted that NVUGIB can range from mild and self-limiting, allowing for outpatient management, to severe and life-threatening, necessitating intensive care. Because of this broad range, the investigators recommended familiarity with triage scoring systems, including the Glasgow-Blatchford Score, the Rockall Score, and AIMS-65.

Concerning hemostatic technique, Dr. Mullady and colleagues recommended familiarity with conventional thermal therapy and placement of hemoclips. If these approaches are unsuccessful, or deemed unlikely to succeed, they recommended an over-the-scope clip.

"A common decision is deciding whether or not to wait until the next morning to perform endoscopy on a patient presenting after hours with suspected NVUGIB," the investigators wrote.

The investigators cautioned that emergent endoscopy may actually be associated with poorer outcomes because of "inadequate resuscitation," and suggested that "[p]atients who are hemodynamically stable, do not have ongoing hematemesis, and have melena only can generally be deferred to the following morning."

Concerning hemostatic technique, Dr. Mullady and colleagues recommended familiarity with conventional thermal therapy and placement of hemoclips. If these approaches are unsuccessful, or deemed unlikely to succeed, they recommended an over-the-scope clip.

For ulcers "with a rigid and fibrotic base," or those that are hard to reach, the investigators recommended monopolar hemostatic forceps with low-voltage coagulation.

According to the update, hemostatic powder should be reserved for scenarios in which bleeding is diffuse and difficult to locate.

"In most instances, hemostatic powder should be preferentially used as a rescue therapy and not for primary hemostasis, except in cases of malignant bleeding or massive bleeding with inability to perform thermal therapy or hemoclip placement," the investigators wrote.

They noted that hemostatic powder generally dissolves in less than 24 hours, so additional treatment approaches should be considered, particular when there is a high risk of rebleeding.

When deciding between transcatheter arterial embolization (TAE) and surgery after endoscopic failure, the update calls for a comprehensive clinical assessment that incorporates patient factors, such as coagulopathy, hemodynamic instability, and multiorgan failure; bleeding etiology; potential adverse effects; and rebleeding risk.

"An important point is that prophylactic TAE of high-risk ulcers after successful endoscopic therapy is not recommended," the investigators wrote.

Beyond these recommendations, the update includes a comprehensive discussion of relevant literature and strategies for effective clinical decision making. The discussion concludes with global remarks about the evolving role of endoscopy in managing NVUGIB, including a note about cost-effectiveness despite up-front expenses associated with some methods.

"With this expanded endoscopic armamentarium, endoscopic therapy should achieve hemostasis in the majority of patients with NVUGIB," the investigators wrote. "Despite the increased costs of newer devices or multimodal therapy, effective hemostasis to preventing rebleeding and the need for hospital readmission is likely to be a dominant cost-saving strategy."

Dr. Mullady disclosed relationships with Boston Scientific, ConMed, and Cook Medical.

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SOURCE: Mullady DK et al. Gastro. 2020 Jun 20. doi: 10.1053/j.gastro.2020.05.095.

Swallowable 'sponge on string' helps spot Barrett's

BY NEIL OSTERWEIL

An experimental cell-collection device that can be administered without anesthesia in a primary care practice was shown to be better at detecting Barrett's esophagus than the standard of care in a community-based clinical trial.

Use of this patient-swallowed device, called Cytosponge-TFF3, could allow clinicians to diagnose esophageal conditions such as dysplasia or cancer at an earlier and potentially curable stage, said the investigators. However, it would also increase the likelihood of unnecessary endoscopies, owing to false-positive results.

"In this multicenter, pragmatic, randomized controlled trial we found that an invitation to have a Cytosponge-TFF3 test led to increased diagnosis of Barrett's esophagus when compared with usual care by general practitioners," write Rebecca C. Fitzgerald, MD, AGAF, from the Hutchison/MRC Research Center in Cambridge, England, and colleagues.

The study was published online in The Lancet.

"What it shows is that, if you opt to have this procedure, you're much more likely to have your Barrett's diagnosed than if you don't opt to have it," said Stephen J. Meltzer, MD, professor of medicine and oncology at Johns Hopkins University, Baltimore, who was approached for comment.

Collection of cells

Dr. Meltzer was senior author of a case-control study published in 2019 in Clinical Cancer Research that described use of a similar device. That device, called EsophaCap, uses a "methylation on bead" technique to collect DNA on a swallowed sponge. The DNA is then extracted from the sponge and analyzed with a methylation biomarker panel.

Like the EsophaCap device, the Cytosponge-TFF3 device consists of a compressed, gelatin-coated collection sponge attached to a thread. The patient swallows the device. After the gelatin dissolves and the sponge expands, it is gently withdrawn through the esophagus, picking up cells as it passes through.

The collected cells are then analyzed with an in vitro test for biomarker trefoil factor 3 (TFF3), a sign of intestinal metaplasia that is a histopathologic hallmark of Barrett's esophagus, the authors explained.

Cytosponge-TFF3 study

The study by Dr. Fitzgerald and colleagues was conducted in patients aged 50 years and older taking medications for gastroesophageal reflux (GER) for more than 6 months. The patients were undergoing treatment at 109 general practice clinics in England. They had not undergone endoscopy within the previous 5 years.

The study was randomized at both the clinic level (cluster randomization) and the individual patient level. Patients were assigned to either standard management of GER, with endoscopies performed only if recommended by the practitioner, or to the intervention group, where individuals received usual care and were offered the Cytosponge-TFF3 procedure. Those patients whose samples yielded TFF3-positive cells subsequently underwent endoscopy.

AGA Resource

Help your patients better understand the risks, testing, and treatment options for Barrett's esophagus by sharing education from the AGA GI Patient Center at http://ow.ly/p9hU30r4oya.

Among 6,834 patients assigned to the intervention group, 2,679 (39%) expressed willingness to undergo the Cytosponge-TFF3 procedure. Of this group, 1,750 patients met all of the eligibility criteria on telephone screening and underwent the procedure.

The large majority of patients (95%) who agreed to undergo the procedure were able to swallow the capsule and the attached thread.

Patients in the intervention group who declined the Cytosponge-TFF3 and all patients assigned to the usual-care arm underwent endoscopy only at the recommendation of their primary practitioner.

During a mean follow-up of 12 months, 140 of the 6,834 patients in the intervention group (2%) were diagnosed with Barrett's esophagus, compared with 13 of 6,388 patients in the usual-care group (0.2%). The absolute difference per 1,000 person-years, the trial's primary endpoint, was 18.3. The rate ratio adjusted for cluster randomization was 10.6 ($P < .001$).

A total of four patients in the intervention group were diagnosed with dysplastic Barrett's esophagus, and five were diagnosed with stage I esophagogastric cancer. No patients in the usual-care group were diagnosed with either condition.

Of the 1,654 patients in the intervention group who opted for the Cytosponge device and swallowed it successfully, 221 underwent endoscopy after testing positive for TFF3. Of these patients, 131 (59%) were diagnosed with either Barrett's esophagus or cancer.

The most common adverse event with the Cytosponge procedure was sore throat, reported by 4% of those who opted for it.

The study was funded by Cancer Research UK, the U.K. National Institute for Health Research, the U.K. National Health Service, Medtronic, and the Medical Research Council. Dr. Fitzgerald is named on patents related to the Cytosponge-TFF3 test. Dr. Meltzer has cofounded a company, Capsulomics, to commercialize the methylation biomarker panel used in EsophaCap studies.

A version of this article originally appeared on Medscape.com.

CLINICAL CHALLENGES AND IMAGES

Answer to "What is your diagnosis?" on page 14: *Capillaria hepatica* Infection.

The diagnosis

The liver parenchyma shows spindle-shaped eosinophilic eggs surrounded by eosinophilic inflammatory infiltrates and epithelioid granuloma (Figure A, original magnification ×200). Figure B shows spindle-shaped eosinophilic eggs with shells, radial striations, and visible polar body, containing granular eosinophilic debris (original magnification ×1,000), consistent with *Capillaria hepatica*. Figure C reveals crescent-shaped, degenerated adult worms of *C. hepatica* showing longitudinal bacillary bands, vacuolated intestine, and convoluted gonads surrounded by intense eosinophilic inflammation in liver parenchyma (original magnification ×400). The outer cuticle is not appreciated because the worms are degenerated.

A review of history revealed that the child played with stray cats and had pica. He was given 10 mg/kg of oral albendazole for 16 weeks and 1 mg/kg of oral prednisolone for the first 2 weeks to prevent paradoxical inflammatory response. Thereafter, prednisolone was tapered and stopped. Pyrexia, liver size, AEC, and liver enzymes normalized at 24 hours, 72 hours, 4 months, and 5 months, respectively. At 12 months of follow-up, the child is asymptomatic.

Capillaria hepatica is a rare nematodal invasive parasitosis where humans are the dead-end host; the main lifecycle occurs between rodents and their predators. Adult worms live, mate, and lay noninfective unembryonated eggs in rodent livers. Embryogenesis occurs only after contact with the soil in two settings: 1) the rodent is eaten by the predator and the unembryonated eggs are released in the predator's feces or 2) carcass disintegration after natural death of the rodent. Humans incidentally ingest the infective embryonated eggs by soil to mouth transmission. They hatch in the human intestine, and the larvae migrate through the portal vein into the liver where they mature into adult worms. In the liver, the cycle continues with the adult worms mating and laying eggs. This elicits intense inflammation with systemic symptoms.[1] In the index case, we hypothesize that the toddler with pica would have come in contact with soil in the vicinity of the stray cats. This soil would have initially contained the feline feces with unembryonated eggs that later underwent embryogenesis. The triad of fever, hepatomegaly, and eosinophilia is the hallmark and characteristic liver histology clinches the diagnosis. Duration of anthelminthic therapy should be guided by AEC response.[2,3]

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GI & HEPATOLOGY NEWS
THE OFFICIAL NEWSPAPER OF THE AGA INSTITUTE

AGA releases iron-deficiency anemia GI guideline

BY WILL PASS
MDedge News

The American Gastroenterological Association (AGA) has released a clinical practice guideline for gastrointestinal evaluation of iron-deficiency anemia.

The seven recommendations aim to improve quality of care and reduce practice variability, according to lead author Cynthia W. Ko, MD, of the University of Washington, Seattle, and four copanelists.

First, the panel recommended that iron deficiency be defined by a serum ferritin level less than 45 ng/mL, instead of 15 ng/mL. Data from 55 studies showed that the higher cutoff value had a sensitivity of 85% and a specificity of 92%, compared with respective values of 59% and 99% for the lower threshold.

"Optimizing the threshold ferritin level with high sensitivity will detect the great majority of patients who are truly iron deficient, minimize delays in diagnostic workup, and minimize the number of patients in whom serious underlying etiologies such as gastrointestinal malignancy might be missed," the panelists wrote. The guideline was published in Gastroenterology.

For asymptomatic postmenopausal women and men with iron-deficiency anemia, the panel recommended bidirectional endoscopy instead of no endoscopy. A similar recommendation was given for premenopausal women, calling for bidirectional endoscopy instead of iron-replacement therapy alone.

Dr. Ko and colleagues noted that these recommendations differ from those issued by the British Society of Gastroenterology (BSG).

For postmenopausal women and men, the BSG suggests that symptoms and local availability of endoscopy should inform diagnostic work-up, with either colonoscopy or CT colonography used for assessment. The BSG recommends against bidirectional endoscopy in premenopausal women, unless they are older than 50 years, have a family history of colorectal cancer, or show symptoms of gastrointestinal disease.

When bidirectional endoscopy does not reveal an etiology, the panelists recommended noninvasive testing for *Helicobacter pylori*.

"An association between *H. pylori* infection and iron deficiency has been demonstrated in observational studies," noted Dr. Ko and colleagues.

They also cited three randomized controlled trials in which treating patients with iron-deficiency anemia for *Helicobacter pylori* infection in combination with iron-replacement therapy led to a 23.2-ng/mL mean improvement in serum ferritin, compared with patients who received iron-replacement therapy alone.

According to the guideline, if asymptomatic patients with negative bidirectional endoscopy are also negative for *H. pylori*, then they should receive trial iron supplementation, instead of undergoing video capsule endoscopy.

Dr. Ko and colleagues also recommended against routine gastric biopsies to diagnose autoimmune atrophic gastritis, as earlier diagnosis does not appear to affect outcomes or management of iron-deficiency anemia.

Finally, the panelists recommended that asymptomatic patients with iron-deficiency anemia and suspected celiac disease undergo serologic testing first, with small-bowel biopsy performed only if testing is positive.

The only two strong recommendations in the guideline are for the ferritin cutoff value and the use of bidirectional endoscopy in men and postmenopausal women. The other five recommendations are conditional, three of which are based on very low-quality evidence. As such, the guideline includes a discussion of research needs.

Dr. Ko and colleagues called for more studies investigating the prevalence of gastrointestinal lesions and risks of bidirectional endoscopy in premenopausal women, role of fecal occult blood testing, timing of serologic testing for *H. pylori* and celiac disease in relation to endoscopy, comparative efficacy of small-bowel visualization techniques, and other topics.

The investigators disclosed no conflicts of interest. The guideline was funded by the AGA Institute.

ginews@gastro.org

SOURCE: Ko CW et al. Gastroenterology. 2020. https://doi.org/10.1053/j.gastro.2020.06.046

Prioritize bariatric surgery during pandemic

BY MIRIAM E. TUCKER

The American Society for Metabolic & Bariatric Surgery (ASMBS) has issued a statement declaring that obesity surgery is not elective and should be resumed as soon as it's safe to do so during the COVID-19 pandemic.

The ASMBS statement, "Safer Through Surgery," was published online in Surgery for Obesity and Related Diseases by the ASMBS executive committee.

It is a reaction to the fact that some U.S. states have placed metabolic and bariatric surgery in the same low-priority category as cosmetic surgery as examples of "elective" procedures that should be among the last to be restarted when pandemic restrictions are eased.

Rather, ASMBS argues, although obesity surgery must be postponed along with other nonemergency procedures when surges in the novel coronavirus make them unsafe, such operations should be resumed as soon as possible along with other medically necessary procedures.

"Metabolic and bariatric surgery is NOT elective. Metabolic and bariatric surgery is medically necessary and the best treatment for those with the life-threatening and life-limiting disease of severe obesity," the statement says.

And obesity itself is a major risk factor for worse COVID-19 outcomes, ASMBS President Matt Hutter, MD, said in an interview, noting that individuals with obesity are "more likely to be in [intensive care units]."

"Mortality rates are higher, even in young patients. And [obesity] is associated with other comorbidities including diabetes and heart disease."

Because the pandemic may be around for a while, "If we can make people [with obesity] safer ... because they've had surgery ... they may be better off," should they get COVID-19 later, he pointed out.

Dr. Hutter noted that the ASMBS recorded a series of webinars, archived on the society's website, with panels discussing in-depth issues to consider in prioritizing patients when restarting metabolic and bariatric surgery.

There are some differences of opinion, such as whether the sickest patients should be the first to have the surgeries upon reopening, or whether those individuals might be worse off if they contract COVID-19 in the perioperative setting.

"I don't think there's a right or wrong answer, but I think we have to figure out what's right for the individual patient, considering their specific risks of having versus not having surgery, of waiting 1 month, 2 months, or 6 months. One thing we do know is that obesity is a significant disease."

'Before, during, and after COVID, obesity itself remains an epidemic'

Asked to comment on the ASMBS stance, Obesity Society president Lee M. Kaplan, MD, PhD, AGAF, said in an interview.

"We do not fully understand which aspects of obesity pathophysiology ... are most responsible for the adverse COVID-19 outcomes, nor do we know the degree to which reduced access to care, social isolation, and other social and environmental determinants of health disproportionately affect COVID-19 patients with obesity," he noted.

Nonetheless, Dr. Kaplan said, "the extended COVID-19 pandemic underscores the importance of increasing, not diminishing, our commitment to understanding and treating obesity, using all available, evidence-based therapies, including lifestyle modification, antiobesity medications, bariatric surgery, and combinations thereof."

"Before, during, and after COVID, obesity itself remains an epidemic. Its high global prevalence, increasing severity, and profound impact on all aspects of health and disease require that it be addressed more universally within the health care system, with the same commitment afforded to other chronic diseases."

Dr. Hutter reported receiving honoraria from Ethicon and Medtronic, and is a consultant for Vicarious Surgical and Sigilon Therapeutics. Dr. Kaplan has reported consulting for Boehringer Ingelheim, Fractyl, Gelesis, GI Dynamics, Johnson & Johnson, Novo Nordisk, Pfizer, Rhythm Pharmaceuticals, the National Institutes of Health, and the Department of State.

A version of this article originally appeared on Medscape.com.

Should beta-blockers be used in portal hypertension?

Beta-blockers in portal hypertension – Yes!

BY GUADALUPE GARCIA-TSAO, MD

Portal hypertension is the main driver of the complications of cirrhosis. Nonselective beta-blockers reduce portal pressure and, by doing so, reduce the risk of developing decompensation (in patients with compensated cirrhosis) and further decompensation and death (in patients with decompensated cirrhosis). Patients who develop hypotension while on nonselective beta-blockers should have the dose reduced or discontinued. If there is a precipitant for hypotension (e.g., infection), nonselective beta-blockers can be temporarily discontinued and reinitiated once blood pressure is at baseline.


Dr. Garcia-Tsao

Dr. Garcia-Tsao is professor of medicine, digestive diseases; chief, digestive diseases, Veterans Affairs Connecticut Healthcare System; director, clinical and translational core, Yale Liver Center; program director, VA Connecticut Hepatitis C Resource Center, New Haven. She has no conflicts.

Can be a double-edged blade too dangerous to wield

BY MARWAN GHABRIL, MD, AGAF

Nonselective beta-blockers are a cornerstone in the primary and secondary prophylaxis of variceal bleeding in patients with cirrhosis and clinically significant portal hypertension. However, the safety of their use in patients with advanced decompensation, and particularly in refractory ascites, has been called into question because of increased mortality. Multiple studies with differing designs offer contradictory accounts of benefit or risk with nonselective beta-blocker use in advanced decompensation. The complex interactions of splanchnic and systemic hemodynamics with increasing sympathetic activation, compensatory cardiac contractility, and effective arterial hypovolemia with vital organ hypoperfusion characterize the hyperdynamic state in advanced decompensation. It provides a rational framework for an initially protective role for nonselective beta-blockers. However, recognizing limitations of cardiac reserve over time, it also demonstrates the detrimental impact of nonselective beta-blockers on systemic hemodynamics. Impaired global cardiac function is associated with refractory ascites and may identify patients with advanced ascites using nonselective beta-blockers at risk for increased mortality and acute kidney injury. As liver disease progresses, so does the risk associated with nonselective beta-blockers, although we lack definitive features at the bedside to define when such risk is prohibitive. In the absence of randomized trials, caution is reasonable given the shifting risk profile of nonselective beta-blockers.


Dr. Ghabril

Read more!
Please find full-length versions of these debates online at MDedge.com/gihepnews/perspectives.

Dr. Ghabril is a gastroenterologist with the Indiana University, Indianapolis. He has no conflicts.

Dear colleagues and friends,


Dr. Kahi

Thank you for your continued support of the Perspectives debates. In this edition, Dr. Guadalupe Garcia-Tsao and Dr. Marwan Ghabril discuss the rationale for and against beta-blocker therapy in portal hypertension, and ultimately highlight the nuances required for appropriate decision-making. This topic invariably generates controversy and debate, and is broadly relevant to general GI and hepatology practices. I hope you will find it as informative as I did, and I welcome your comments and suggestions for future topics at ginews@gastro.org.

Charles J. Kahi, MD, MS, AGAF, professor of medicine, Indiana University, Indianapolis. He is also an associate editor for GI & Hepatology News.

Prolonged recovery times for some, rapid drop in antibodies after mild cases

BY LUCAS FRANKI
MDedge News

One-third of outpatients with COVID-19 are unwell weeks later

A recovery time longer than 3 weeks is common in patients with COVID-19, even when they are younger, new research suggests.

In a survey of 274 patients who had tested positive for the disease, just over one-third reported that they had not returned to normal health 21 days after receiving positive test results. While delayed recovery was most common in adults older than 50 years, one-quarter of respondents aged 18-34 years and one-third of those aged 35-49 years also reported delayed recovery.

Kyle Annen, DO, of the University of Colorado at Denver, Aurora, noted that the study results "should impact the perception of this being a mild illness in the young adult population and encourage them to comply with recommendations of social distancing, masking, and hand washing." She also noted that psychiatric comorbidities were significantly associated with prolonged recovery.

Rapid drop of antibodies seen in those with mild COVID-19

The number of antibodies seen in patients with mild COVID-19, the most common form of the disease, appears to drop by half after 36 days, according to a new study.

The research, performed on 34 adults who had recovered from COVID-19, supports the conclusion of a study done in China that also found that antibodies for the disease can fade quickly. However, this does come with some caveats, according to study coauthor Otto Yang, MD, as the antibodies may not actually be preventing reinfection, and that, even if they do, current tests may not be measuring antibodies in the correct way.

The results have implications for herd immunity, as a short protection period means that herd immunity will be nearly impossible to achieve. The window that convalescent plasma can be used to treat currently ill patients is narrowed as well.

Frontline associate editor Lucas Franki compiled this column from reports first published on MDedge.com and Medscape.com.

Residents learn in context of care

Disparities *from page 1*

vey was conducted from August to November 2015.

Overall, 91 program directors (40%) reported a curriculum in health disparities, but only 16 of them described the quality of their education as very good or excellent. In 56% of the programs, outcomes were not measured.

A majority (90%) of the programs included racial/ethnic diversity and socioeconomic status in their curricula, 58% included information about limited English proficiency, and 53% included information about gender identity and sexual orientation.

Reported barriers to curriculum development in 132 programs that did not have a health disparities curriculum included lack of time in the current curriculum, insufficient faculty skill to teach the topic, lack of institutional support, and lack of faculty interest, the researchers noted.

A total of 13,251 residents (70%) reported receiving some training in caring for patients at risk for health disparities over 3 years of training, and 10,494 (80%) of these rated the quality as very good or excellent. "Residents who cared for a larger proportion of underserved patients perceived that they received health disparities training at a higher rate," the researchers wrote. However, increased care of at-risk populations does not necessarily translate into increased knowledge and skills. "Our finding that residents' rating of the quality of their training was not associated with the presence of a curriculum in health disparities in their program also raises a concern that perceptions may overestimate the acquisition of needed skills," they added.

The major limitation of the study was "that residents were not asked directly if they were exposed to a curriculum in health disparities but rather if they received training in the care of patients who would be at risk, which raises the concern that we cannot distinguish between their recognition of a formal and informal curriculum," the researchers noted.

However, the results were strengthened by the large and comprehensive study population, and highlight not only the need for standardized health disparities curricula, but also the need for research to determine the most effective domains for such curricula in graduate medical education, they emphasized.

The surveys were conducted in 2015 and the comparative work in 2018, prior to the COVID-19 pandemic and the subsequent increased concerns about disparities in health care, Dr. Dupras said in an interview.

"We conducted the survey because we recognized that health disparities were still prevalent in our society despite calls to improve the education of our learners to address them. We wanted to determine what our programs were providing for educational curriculum and what our learners were experiencing," she said.

"One of the challenges in interpreting our results is inherent in studies that rely on surveys. We cannot know how those filling out the surveys interpret the questions," said Dr. Dupras. The study results yield several messages.

"First, residency training programs have opportunities to do a better job in developing educational opportunities related to health disparities; second, residents learn in the context of care and we must optimize education around these experiences; third, every patient is different. It is time to move towards cultural humility, since the risk for disparities is not associated with one patient characteristic, but composed of multiple factors," she said.

"Given that 5 years has passed since our original survey, it would be important to repeat the survey and consider expanding it to include other training programs that provide frontline care, such as family medicine and pediatrics," Dr. Dupras noted.

Dr. Dupras and colleagues had no financial conflicts to disclose.

ginews@gastro.org

SOURCE: Dupras DM et al. JAMA Netw Open. 2020 Aug 10. doi: 10.1001/jamanetworkopen.2020.12757.

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PROFESSIONAL OPPORTUNITIES

CMS sticks with E/M pay plan over some objections

BY KERRY DOOLEY YOUNG

The Trump administration is sticking with a plan to boost certain Medicare pay for many primary care and other specialties focused heavily on office visits while lowering that for other groups to balance these increased costs.

On Aug. 4, the Centers for Medicare & Medicaid Services posted on the Federal Register draft versions of two of its major annual payment measures: the physician fee schedule and the payment rule for hospital outpatient and ambulatory surgery center services. On Aug. 3, the CMS informally posted a copy of the physician fee schedule on its own website, allowing medical groups to begin reading the more than 1,300-page rule.

Federal officials normally use annual Medicare payment rules to make many revisions to policies as well as adjust reimbursement.

The draft 2021 physician fee schedule, for example, calls for broadening the authority of clinicians other than physicians to authorize testing of people enrolled in Medicare.

The CMS intends to allow nurse practitioners, physician assistants, and certain other health care professionals to more widely supervise diagnostic psychological and neuropsychological tests.

The draft 2021 hospital outpatient rule proposes a gradual changeover to allow more procedures to be performed on an outpatient basis. This shift could save money for Medicare as well as for the people enrolled in the giant federal health program who need these services, the CMS explained.

Medicare would begin with a change in status for almost 300 musculoskeletal-related services, making them eligible for payment in the hospital outpatient setting when appropriate, CMS wrote in a fact sheet.

The initial reaction to Medicare's proposed 2021 rules centered on its planned redistribution of funds among medical specialties. The CMS had outlined this plan last year. It is part of longstanding efforts to boost pay for primary care specialists and other physicians whose practice centers more around office visits than procedures.

There is broad support in health policy circles for raising pay for these specialties, but there also are strong objections to the cuts the CMS plans to offset the cost of rising pay for some fields.

Susan R. Bailey, MD, president of the American Medical Association, addressed both of these ideas in an AMA news release on the proposed 2021 physician fee schedule. The in-

Measuring the cost of the new Medicare physician fee schedule for GIs

We all agree that E/M services have been undercompensated for many years and applaud CMS for increasing their reimbursements, but this does not mean that endoscopic services are suddenly less valuable as a result. Nor does it mean that the work required to perform endoscopic services has declined.

Unfortunately, implementation of the new Medicare physician fee schedule in the proposed rule will result in a 10% decline in the reimbursement for both upper and lower endoscopies. Although rises in E/M services will negate half of this loss, gastroenterologists will still be faced with a 5% net decline in professional reimbursement. Since we all have different combinations of CPT codes, the American Gastroenterological Association has developed an MPFS 2021 Proposed Rule Impact Calculator, which will allow you to calculate how this proposed MPFS will impact your practice. We all must speak out against these unacceptable declines in endoscopic reimbursements both through our societies and individually. AGA has a campaign on budget neutrality (https://gastro.quorum.us/campaign/28353/).

Dr. Kosinski

Lawrence R. Kosinski, MD, MBA, AGAF, is the chief medical officer at SonarMD, Chicago. He is also an associate editor for GI & Hepatology News.

crease in pay for office visits, covered under evaluation and management services (E/M), stems from recommendations on resource costs from the AMA/Specialty Society RVS Update Committee, Dr. Bailey said.

"Unfortunately, these office visit payment increases, and a multitude of other new CMS proposed payment increases, are required by statute to be offset by payment reductions to other services, through an unsustainable reduction of nearly 11% to the Medicare conversion factor," Dr. Bailey explained.

In the news release, Dr. Bailey asked Congress to waive Medicare's budget-neutrality requirements to allow increases without the cuts.

"Physicians are already experiencing substantial economic hardships due to COVID-19, so these pay cuts could not come at a worse time," she said.

Winners and losers

The CMS details the possible winners and losers in its payment reshuffle in Table 90 of the proposed 2021 physician fee schedule. In the proposed rule, CMS notes in the draft that these figures are based upon estimates of aggregate allowed charges across all services furnished by physicians and other clinicians.

Specialties in line for increases under the 2021 draft rule include allergy/immunology (9%), endocrinology (17%), family practice (13%), geriatrics (4%), hematology/oncology (14%), internal medicine (4%), physician assistants (8%), psychiatry (8%), rheumatology (16%), and urology (8%).

In line for cuts would be anesthesiology (–8%), cardiac surgery (–9%), emergency medicine (–6%), gastroenterology (–5%), general surgery (–7%), infectious disease (–4%), neurosurgery (–7%), physical/occupational therapy (–9%), plastic surgery (–7%), and radiology (–11%).

An umbrella group, the Surgical Care Coalition, had a quick statement ready about the CMS proposal. Writing on behalf of the group was David B. Hoyt, MD, executive director of the American College of Surgeons.

"Today's proposed rule ignores both patients and the surgeons who care for them. The middle of a pandemic is no time for cuts to any form of health care, but today's announcement moves ahead as if nothing has changed," Dr. Hoyt said in the statement. "The Surgical Care Coalition believes no physician should see payment cuts that will reduce patients' access to care."

Making a similar request Aug. 4 in a unified statement were the American Physical Therapy Association (APTA), the American Occupational Therapy Association (AOTA), and the American Speech-Language-Hearing Association (ASHA).

"Our organizations call on Congress and CMS to advance well-reasoned fee schedule payment policies and waive budget neutrality," the groups said.

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