The following posters will be presented on Friday, October 14, 2016:

01F “As a General Pediatrician I Don't Know the Second, Third or Fourth Thing To Do: Behavioral Health and Residency Training”
Authors: Sharon L. Larson, Jeffrey D. Shahidullah, Paul W. Kettlewell, Amy Signore
Medical students trained in US medical schools typically receive about 1 month of exposure to mental health treatment practicum during their training. However, there is little evidence that training to identify diagnose, and treat behavioral health concerns occurs during residency. This study represents the first phase of a program intended to train pediatric residents to deliver care for behavioral health conditions. Residents at two large medical centers participated in focus groups to describe their training prior to beginning their residency, as well as to describe attitudes, concerns, beliefs, and barriers in their training as they begin to treat children and their families. Nine key themes emerged in these first focused conversations with residents including time management, struggles with establishing rapport with patients, knowing referral sources and protocols, comfort level diagnosing but not knowing how to treat a variety of conditions, difficulties in establishing communication and relationships with adults and dysfunctional families, making mistakes that result in children dying, the relative importance of behavioral health compared to some of the more obvious “physical’ conditions, and a general lack of training in addressing a wide range of behavioral health issues. Fear, frustration, and a recognition that training to date limits new physicians in their ability to confidently address behavioral health problems. Changes in medical school training and residency to improve skills in behavioral health treatment may be warranted. Residents will be followed throughout their training to determine best strategies to improve knowledge, skills, and confidence.

This poster will complement Concurrent Education Session number G3.

02F “Understanding the Immigrant Experience: How Mental Health Mediates the Relationship Between Perceived Discrimination and Self-reported Physical Health.”
Authors: Ebony Iheanacho-Dike, Jasmine Ferrill, Fiorella L. Carlos, and Melinda A. Gonzales-Backen
Immigrants are vulnerable to perceived discrimination, which impacts mental and physical health. Grounded in the biopsychosocial model (Clark et al., 1999), this study investigated depressive symptoms and self-esteem as mediators in the relation between perceived discrimination and physical health. Using longitudinal data (N=5,262; 57% Latin American; 50% female; M Wave 1 age=14) we found depressive symptoms mediated the association between perceived discrimination (i.e., interpersonal and societal) and self-reported physical health. This study suggests that two distinct constructs of perceived discrimination impact future physical health (10 years after baseline) via mental health. Findings hold implications for acknowledging experiences of discrimination in health programs.

This poster will complement Concurrent Education Session number:
The following posters will be presented on Friday, October 14, 2016:

**03F** “Extending Self-Efficacy into the Family Realm: Dyadic Efficacy among Patients who are Prescribed Supplemental Oxygen Therapy (O2)"

*Authors: Kristen Holm, PhD, MPH Richard Casaburi, PhD, MD Scott Cerreta, BS, RRT Vanessa Gonzalez, BS Micquel Hart, BS Robert Sandhaus, MD, PhD Katherine Regan Sterba, PhD, MPH Frederick Wamboldt, MD Jerry Krishnan, MD, PhD*

**Background:** Dyadic efficacy refers to confidence in the ability to work with a family member to manage illness-related challenges. Dyadic efficacy has been examined in arthritis and smoking cessation, but has not been examined in O2. Dyadic efficacy should be very relevant to O2, given that patients on O2 often need help with tasks such as carrying O2 tanks that can weigh more than 20 pounds. The current study examined the hypothesis that dyadic efficacy is associated with better patient-reported outcomes. Methods: Data were collected via self-report questionnaires administered at baseline among patients enrolled in a clinical trial to improve O2 adherence. All participants were prescribed O2 24 hours per day. Analyses include only patients who are married because prior research on dyadic efficacy has focused exclusively on married/partnered individuals. Dyadic efficacy was measured via 16 items (Cronbach’s alpha=0.96). Outcomes were assessed via PROMIS measures. A linear regression model was calculated for each outcome, adjusting for age, gender, length of marriage, and O2 flow rate with activity. Results: 55 individuals were included in analyses. The mean age was 68.0 (SD=8.3) and 53% of the sample was female. The average length of marriage was 34.2 years (SD=14.5). The mean score for dyadic efficacy was 4.4 (SD=.74). The unstandardized regression coefficient (with p-value in parentheses) for the association of dyadic efficacy with each outcome is below:

- Anxiety: -5.79 (.001)
- Depression: -4.56 (.015)
- Ability to Participate in Social Roles and Activities: 3.82 (.003)

**Conclusion:** Patients on O2 experience challenges such as carrying and organizing equipment. Our team is developing a measure of confidence in the ability to work with a family member to manage these challenges. Our current analyses suggest that dyadic efficacy is highly relevant to patients who are on O2. If further research confirms these findings, a novel avenue for improving health outcomes in this population would be to develop patient- and family-centered interventions to increase dyadic efficacy.

*This poster will complement Concurrent Education Session number D3.*

**04F** “Coping styles predict poor health related quality of life (HRQOL) in rural Appalachians”

*Authors: Shannon Beish, M.A., Penny Koontz, Psy.D., April Fugett, PhD, Marshall University, Emily Selby-Nelson, Psy.D., Cabin Creek Health System, Alyssa Frye, M.A., Marshall University*

Manner of coping with health problems has been linked to health related outcomes. Historically, Appalachia has been known for poor health with many risk factors. The purpose of this study was to identify health stress coping and its impact on health behaviors and HRQOL. Results suggest that particular coping styles negatively impact HRQOL in rural Appalachian primary care patients. Active coping t = -2.41, substance use, t = -2.84, and behavioral disengagement t = 2.27 (all at p < .05) were significant predictors in the model.

*This poster will complement Concurrent Education Session number:*
The following posters will be presented on Friday, October 14, 2016:

05F “Conversational Advice: A mixed-methods analysis of medical residents’ experiences co-managing primary care patients with behavioral health providers”

Authors: Patrick Hemming, Joseph J Gallo

Introduction: Behavioral Health Providers (BHP’s) are increasingly common in the regular functioning of residency primary care clinics. When BHPs and residents co-manage patients, residents may learn new approaches to counseling and medical management. To better understand the impact that patient co-management has on residents’ learning about behavioral health management, we conducted a multi-site survey of internal medicine and family medicine residents. Methods: For this cross-sectional study, we surveyed residents from 2 Internal Medicine (IM) and 3 Family Medicine (FM) residency training programs with behavioral health integration in residents’ continuity clinics. To quantify the intensity of co-management, residents were asked to report whether or not the co-management included (1) a shared visit with the BHP and (2) meeting outside of the visit face-to-face to discuss the patient’s care. Respondents were asked whether or not they received feedback from the BHP on their management. Associations between co-management intensity and several variables (resident demographics, receipt of feedback and perceived patient impact of the collaborative care) were assessed using multiple logistic regression. We asked residents to qualitatively describe what they had learned from co-managing with a BHP. Qualitative responses were coded thematically by two researchers. Common themes were grouped into categories. Statistical software was used to examine associations between frequency of common themes and co-management intensity. Results: 113 residents (Overall response rate 113/169) described their most recent experience co-managing a patient with a BHP. 70% of the co-management had occurred in the previous month. 41% of co-managed visits (45/113) occurred with a psychologist or psychology fellow. Being a family medicine resident and being male were associated with increased intensity of co-management. Residents were much more likely to receive feedback on their patient management if they had a shared visits or face-to-face coordination. If they had both they were 26 times more likely to receive feedback than if they had co-managed without face-to-face interactions. Common learning themes reported by residents were: obtaining a better history, improving their general BH management, and strategies for counseling. Residents who had more high intensity co-management were more likely to report learning themes relating to concrete patient skills, such as history-taking and counseling. Conclusion: Residents working in primary care settings where BHPs are integrated have frequent opportunities to co-manage patients and learn new approaches. BHPs are more likely to provide feedback to resident learners when they co-manage patients through face-to-face interactions. These face-to-face interactions can result in valuable learning experiences for residents, and result in residents reporting acquisition of important skills and knowledge.

This poster will complement Concurrent Education Session number A6b.
The following posters will be presented on Friday, October 14, 2016:

06F “Healthy lifestyles: An innovative approach to team-based care for childhood obesity”

Obesity is a significant health problem across the United States. This program provides a series of four classes for families, designed to improve healthy lifestyle habits by incorporating nutritionists, behavioral health providers, and a fitness coordinator. Program success is measured by Body Mass Index and self-reported satisfaction, knowledge, and behavior change. Most participants reported lifestyle improvements, daily physical activity, and intent to maintain their new healthy lifestyles. Based on high participant satisfaction, course retention, and ease of curriculum, this course could be adopted and utilized successfully in other clinical settings to promote obesity prevention and healthy lifestyles.

This poster will complement Concurrent Education Session number

07F “Associations between Economic Pressure and Diabetes Efficacy in Couples with Type 2 Diabetes”
Authors: Joshua R. Novak, Jared R. Anderson, & Matthew D. Johnson

Dyadic data from 117 married couples in which one member is diagnosed with Type 2 diabetes was used to explore associations between economic pressure and diabetes efficacy via emotional distress. Problem solving was added as a possible moderator of the link between economic pressure and emotional distress. Results revealed that greater economic pressure was associated with lower diabetes efficacy through higher levels of emotional distress for both patient and spouse. Furthermore, the deleterious association between economic pressure and emotional distress was less pronounced when spouses reported a more effective problem solving ability. These results provide evidence that the economic pressure couples with Type 2 diabetes face may reduce the patient and spouse's confidence in the patient's ability to manage their disease. This study also demonstrates the importance of couple process variables in buffering the impact of economic pressure on diabetes management, providing a clear target for intervention and education efforts.

This poster will complement Concurrent Education Session number:
The following posters will be presented on Friday, October 14, 2016:

**08F “Turning the Tide: Family Medicine Resident Experiences with Behavioral Science Education within the Primary Care Behavioral Health (PCBH) Model”**

Authors: Authors (Alphabetical Order): 1) Jane Chandy, DO 2) Cristian Fernandez-Falcon, MD 3) Barbara Kiersz, DO 4) Stacy Ogbeide, PsyD, MS 5) Miguel Palacios, MD

This poster will provide an overview of the Primary Care Behavioral Health (PCBH) model, an integrated care model and team-based approach for primary care settings. A hallmark of this model is the focus on a consultant approach. The Behavioral Health Consultant's goal is to assist the primary consumer (i.e., the primary care provider) with the management of behavioral issues of patients. This model provides a framework for how behavioral health providers are integrated into a primary care setting. Because of the increasing demands of family medicine practice, it is of importance to train the up and coming health care workforce (e.g., medical and behavioral health professionals) to become competent practitioners in team-based care. The three goals of this poster presentation will be to: 1) Provide an overview of the development of a PCBH-focused curriculum within a family medicine residency program in South Texas; 2) Examine how a PCBH-focused curriculum can satisfy a number of the Accreditation Council for Graduate Medical Education (ACGME) competencies connected to the Family Medicine Milestones; and 3) Review preliminary data on the impact of the curriculum on resident and faculty confidence to manage behavioral issues in primary care.

This poster will complement Concurrent Education Session number A6b.

**09F “Financial Justification & Sustainability of Clinical Pharmacist Services in a Patient Centered Medical Home”**

Authors: Elena Kline, PharmD, CGP; Diane Landosky, RN, BSN; Ruzica Dzebo, MD; Elie Mulhem, MD; Anne Van Dyke, PhD; Lori Lackman-Zeman, PhD; Paul Misch, MD

Background/Rationale: Meeting patients where they are at is an important part of ensuring successful medical care and medication compliance. This is especially true when patients have multiple chronic diseases with more complicated treatment plans. In this study, a clinical pharmacist was included as a part of the Integrated Care Team (alongside a health psychologist) to coordinate services with a goal of justifying a full-time pharmacist position to expand clinical services. Methods/Results: Pharmacist interventions were tracked through Clinical Measures software which resulted in over $700,000 in cost-savings as a part of Integrated Care services. The pharmacist identified appropriate means of billing for both current and additional services to ensure sustainability. A 1.0 FTE clinical pharmacist position was justified through $160,000 in anticipated revenue to the health system annually. Conclusion: The clinical pharmacist was found to be an important part of the medical team. Clinical pharmacy services were found to be financially justified and sustainable through cost-saving interventions and billing codes which will create revenue for the health system.

This poster will complement Concurrent Education Session number:
**10F “A Feasibility Audit of an "Incident To"/Shared Billing Protocol”**

Authors: Courtney L. Cook, M. A. Natasha Gouge, Ph. D.

One potential method to generate revenue within an integrated care fee-for-service model involves the use of incident to and shared billing techniques. While a plethora of data are available illustrating cost offset of integration, no studies have provided data specific to revenue generated by an incident to/shared visit protocol. This study seeks to examine: 1) revenue generated through a shared visit protocol and 2) feasibility of a shared visit protocol within a busy integrated practice. A protocol for tracking the generation, documentation, and billing of shared visits was developed in consultation with organizational Coding and Compliance and Legal Departments to ensure compliance with organization and third-party insurance policies. A total of 43 shared visits were captured with 62% of patients being male (N=28) and an average of 8.8 years old (SD=3.58 years). Discrepancies in protocol utilization were noted with one pediatrician of six documenting 55.6% of shared visits. Discussion points will examine reimbursement of shared and non-shared visits matched by diagnosis, age, and insurance type. The frequency of missed opportunities for shared visits and problems that arose in protocol implementation will also be reviewed. This will shed light on the feasibility of an incident to/shared visit protocol as a method of generating revenue within a busy integrated practice. Potential strategies for improving utilization will also be discussed.

*This poster will complement Concurrent Education Session number:*

**11F “Implementation of an academic integrated behavioral health program in a private non-profit medical home”**

Authors: David McAnulty, Cherisse Flanagan, Kelsey Bobo, Katrielle Marx & Megan Crabtree

The present study demonstrates the effectiveness of using psychology graduate student clinicians for providing cost effective integrated behavioral health (IBH) care in a non-profit medical home context. The study outlines the implementation of IBH services over a 4 year interval. The study consisted of three separate surveys: (a) pre-implementation assessment of most patients’ desired behavioral health services, (b) post-implementation assessment of perceptions of obstacles/ease of access, (c) follow-up satisfaction survey. Patients show a high degree of interest in a broad range of behavioral health services. They express a strong preference for accessing behavioral health care at the primary care site. Satisfaction ratings for graduate student clinicians are high.

*This poster will complement Concurrent Education Session number:*
The following posters will be presented on Friday, October 14, 2016:

12F “Predictors of Adherence to Behavioral Health Visits in Integrated Primary Care”

Authors: Meghan Sharp, Marissa Carraway, Chelsey Solar, Alyssa Adams, Krystal Trout, Melissa Decker, Kari Kirian, Dennis Russo, Doyle Cummings

Purpose: Integrated health care (IHC) includes assessing and addressing mental health and behavioral needs as part of an interdisciplinary team at the point of care. Although IHC can improve patient outcomes, many do not follow through with subsequent appointments with behavioral health (BH). As little is known about factors influencing BH follow-up appointment attendance, the purpose of the current study is to identify factors that improve adherence to referral to the BH clinic. Methods/Results: Survey data regarding initial consultation will be paired with patient and BH appointment factors and evaluated as predictors of adherence to behavioral health appointment. Preliminary analyses (N = 206) revealed 47% were scheduled for follow-up with BH, and 56% attended BH appointment. Two-thirds had a warm-handoff at integrated care, and 42% were diagnosed with depression. Patients who attended were significantly older than those who did not, p = .034. Conclusion: Further analyses will evaluate predictors of BH attendance: patient race and sex, time between consult and appointment, consistency of BH providers, distance between patient home and clinic, diagnosis. Knowledge gained from this study will facilitate effective implementation of IHC services to improve patient attendance to BH appointments. Increased adherence to BH referral will allow for increased opportunity for symptom treatment leading to improved patient and clinic outcomes.

This poster will complement Concurrent Education Session number:

13F “Relationship of Demographic and Medical Factors to Sexual Behavior”

Authors: Cierra Allen, MD; GE Alan Dever, MD, MPH, MT; Michele S. Smith, PhD; Antonio Williams, MD

CDC studies show that there are 19.7 million new STIs every year in the US; nearly half of these are among young people between the ages of 15 to 24. The total estimated direct cost of STIs annually in the US is $15.6 billion. Yet in a national survey of US physicians, fewer than one-third routinely screened patients for STDs/STIs. This study reviewed which factors influence discussions of sexual health in a patient care setting.

This poster will complement Concurrent Education Session number:

14F “RESeT West Texas: Teaching medical and psychology trainees to use SBIRT in rural communities”

Authors: Trotter PhD, David .R.M. Littlefield PhD, Andrew K. Popp PhD, R. Lisa Jones EdD, Betsy G. Onger MD, Fred Babb MD, Frank Sheets MD, Randal Haynes MD, Jamie L.

The Screening, Brief Intervention, and Referral to Treatment (SBIRT) model is effective at reducing risky alcohol and drug use. This poster will describe a successful SBIRT initiative designed to prepare a group of medical and behavioral health providers to use SBIRT in rural communities. We used a pre-post design to evaluate SBIRT competency, and we collected program satisfaction data from learners. Preliminary results show that learners demonstrated SBIRT competency after completing the curriculum, and found the curriculum valuable. Preliminary results suggest that the SBIRT program met its objectives, and that learners found the training valuable. This presentation will describe how the program was adapted to prepare an interdisciplinary group of learners for rural practice.

This poster will complement Concurrent Education Session number:
The following posters will be presented on Friday, October 14, 2016:

15F “A struggle for control: The influence of mother psychological control on adolescent differentiation, nutrition, and activity”

Authors: Dan Blocker, MS, East Carolina University  Claire Bell, MS, East Carolina University  Andy Brimhall, PhD, East Carolina University  Roy Bean, PhD, Brigham Young University

Guided by the limited previous literature of adolescent nutrition, adolescent differentiation (emotional availability and emotional control), and mother psychological control, this study examined the influence of mother psychological control and adolescent differentiation on health behaviors. Participants and measures were drawn from the Flourishing Families Project and included 258 mother-child dyads and variables from measures completed by adolescents. A structural equation model (SEM) was used to test the relationship between mother psychological control, adolescent differentiation (emotional availability and emotional control), and adolescent nutrition/physical activity. We controlled for adolescent gender, income, race, and adolescent BMI. The findings indicate that emotional availability and mother psychological control are associated with higher consumption of fruit. The findings indicate that physical activity was associated with emotional control. Findings suggest that mother control and adolescent differentiation influence adolescent nutrition and activity. Implications for future research is considered.

This poster will complement Concurrent Education Session number:

16F “Strengths and Difficulties of the SDQ and the HDI”

Authors: Carly Alexander, M.S., Harrison Wojcik, MS. Ed., Ken Perez, M.S., M.A., Haran King, M.S., & James V. Wojcik, Ph.D. Canvas Health, Natalis Outcomes

Strengths and Difficulties Questionnaire and Health Dynamics Inventory diagnostic specificity, measurement of severity, utility in treatment planning, and tracking of outcome success are compared. Some SDQ scales map to the diagnostic categories of the HDI. Correlations were low to moderate, e.g.: SDQ Overall Stress with certain HDI scales: r = .36 to .54, p <.001. Implication for the predictive value of each scale are discussed.

This poster will complement Concurrent Education Session number:
The following posters will be presented on Friday, October 14, 2016:

17F “Patterns of Primary Care-Mental Health Integration Adoption During Implementation Across Eight Clinics”

Authors: Woodward, E. N.; Pitcock, J. A.; Ritchie, M.; Kirchner, J. E.

Integrated primary care mental health in Veterans Health Administration (VA) is known as Primary Care-Mental Health Integration (PC-MHI) and was mandated in 2007 across all VA medical centers. Because of the complexity of PC-MHI, it warrants use of facilitation at sites that may need assistance to implement PC-MHI. Facilitation is an evidenced-based strategy to help individuals and teams navigate complex change processes to translate research to clinical practice. Using qualitative and quantitative data, we described patterns of PC-MHI adoption in eight clinics receiving facilitation, and also identified key events related to PC-MHI adoption over time. Because our study involved partnerships with clinical and operational leaders and a sustainability phase in which researchers were no longer involved, it provided data to leaders and decision makers in healthcare from a real-world trial of facilitation of PC-MHI adoption. Our study improved current evidence by capturing greater variance in PC-MHI adoption and better understanding key events that affect adoption, especially while the clinic is receiving implementation facilitation. This may influence the refinement of facilitation to improve conditions under which PC-MHI is best implemented, especially within Veteran and military populations.

This poster will complement Concurrent Education Session number:

18F “Addressing the mental health stigma of healthcare students using a multi-professional communications course”

Authors: Dannel K. Petgrave, M.A., & Chris S. Dula, Ph.D.

Stigma can be defined as problems with knowledge, attitudes, and behavior (Thornicroft et al., 2008). The stigma of mental illness endorsed by healthcare professionals has been associated with adverse patient outcomes. The culture of medical school may contribute to the development of stigma and underscores the need for intervention in this context. The present study aimed to assess stigma change in healthcare students (n = 154) enrolled in a multi-professional communications course. The Opening Minds Scale for Health Care Providers and the Marlowe-Crowne Social Desirability scale were administered to students at pre-test (T1), a mid-semester evaluation (T2), and at posttest (T3). Overall, students reported less stigma at T3 compared to T1. Consistent with previous literature, the present study demonstrated that the stigma of mental illness can be reduced with appropriate intervention. Implications and limitations are discussed.

This poster will complement Concurrent Education Session number A7, C7.