Innovative Interprofessional Education Model for Substance Use Disorder Care

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INTRODUCTION

- Our Academic Medical Center identified a critical gap in substance use disorder (SUD) treatment and education.
- ~16% of the local population is uninsured with limited SUD treatment access, especially among persons experiencing homelessness.
- Recent studies highlight the importance of interprofessional education (IPE) in enhancing healthcare delivery and educational outcomes. [1-5]
- Interprofessional SUD courses improve educational outcomes and patient treatment agreements for follow-up care. [1]
- There is a need for educational reforms integrating interprofessional training with healthcare delivery changes. [2]
- These insights led to the creation of an innovative interprofessional community-based clinic to provide comprehensive, evidence-based SUD care while educating future healthcare professionals.

AIMS

- Develop an interprofessional clinic to offer comprehensive SUD care to underserved populations.
- Integrate community engagement to improve access and continuity of care for vulnerable populations.
- Provide a robust educational framework for medical students and residents focused on interprofessional collaboration.
- Address immediate clinical needs and prepare healthcare professionals to tackle complex SUD challenges.
- Enhance student understanding of social determinants of health and advocacy for SUD patients.

METHODS

- Established the Galveston Safe Against Fentanyl Emergencies (G-SAFE) clinic in partnership with community organizations.
- Located within Galveston Central Church, providing trusted community services such as meals and transportation.
- Coordinated research and outcomes with UTMB Center for Addiction Sciences and Therapeutics (CAST, UTMB IRB 24-0010)
- Implemented the Interprofessional Continuity of Practice Experience (I-COPE) model, integrating IPE into a continuity-of-care framework.
- Medical students work in rotating teams with SUD providers, attending bi-weekly clinics for sustained learning.
- Graduate Medical Education including mandatory SUD curriculum for Internal Medicine (IM) interns and electives for IM and Family Medicine residents

Galveston - Safe Against Fentanyl Emergencies (G-SAFE) Clinic

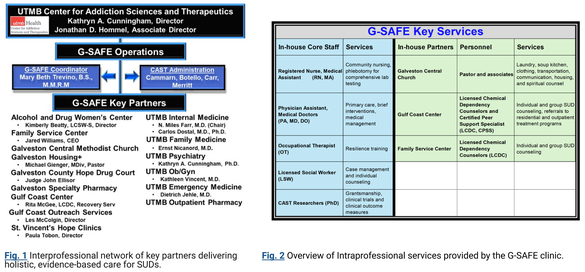

Fig. 1 Interprofessional network of key partners delivering holistic, evidence-based care for SUDs.

G-SAFE Key Services

In-house Core Staff	Services	In-house Partners	Personnel	Services
Registered Nurse, Medical Assistant (RN, MA)	Community nursing, phlebotomy for comprehensive lab testing	Galveston Central Church	Pastor and associates	Laundry, soup kitchen, clothing, transportation, communication, housing, and spiritual counsel
Physician Assistant, Medical Doctors (PA, MD, DO)	Primary care, brief interventions, medical management	Gulf Coast Center	Licensed Chemical Dependency Counselors and Certified Peer Support Specialist (LCDC, CPSS)	Individual and group SUD counseling, referrals to residential and outpatient treatment programs
Occupational Therapist (OT)	Resilience training	Family Service Center	Licensed Chemical Dependency Counselors (LCDC)	Individual and group SUD counseling
Licensed Social Worker (LSW)	Case management and individual counseling			
CAST Researchers (PhDs)	Grantsmanship, clinical trials and clinical outcome measures			

Fig. 2 Overview of Intraprofessional services provided by the G-SAFE clinic.

Fig. 3 G-SAFE clinic's intraprofessional workspace located at Galveston Central Church embeds SUD care in a space where people already feel comfortable

G-SAFE Demographics

Age Range	Patients
10-19 y/o	n=5
20-29 y/o	n=8
30-39 y/o	n=36
40-49 y/o	n=56
50-59 y/o	n=25
60-69 y/o	n=26
70-79 y/o	n=36
Gender	50% Female (3 pregnant) 50% Male
Language	98% English 2% Spanish

Fig. 4 The G-SAFE clinic treated 159 unique patients, totaling 615 encounters from January to December 2024.

G-SAFE Research Demographics

Gender	57.4% Female and 42.6% Male
Ethnicity and Race	81.4% Hispanic/Latino
	57.7% White
	15.4% Black
	5.8% Native American
	1.9% Pacific Islander
	9.6% Other
Education Levels	31.1% did not complete high school
	42.2% completed high school
	26.6% engaged in higher education
Employment Status	15.4% employed
	48.1% unemployed
	28.8% retired or disabled
Income Levels	64.4% earn less than $10,000 per year
	26.7% earn $10,000–$25,000 per year
Psychosocial Factors	High adverse childhood experiences
	Poor baseline quality of life
G-SAFE Research Outcomes	
Drug Use Severity	Significant reductions (p < 0.001)
Alcohol Use Severity	Significant reductions (p = 0.004)
Depression Severity	Significant reductions (p < 0.001)

Fig. 5 Demographic and outcome data from the G-SAFE study (UTMB IRB 24-0010), which enrolled 82 participants, highlight significant reductions in drug, alcohol, and depression severity among a vulnerable population with limited prior access to SUD treatment.

Interprofessional Continuity of Practice Experience (I-COPE) model

- The I-COPE model integrates interprofessional education within a longitudinal continuity-of-care framework.
- Medical students are organized into rotating teams to shadow:
  - SUD providers, nurses, social workers, peer-coaches or counselors.
- Medical students attend bi-weekly clinic sessions
  - Continuity-of-care , Sustained learning experiences across the MS3 year
- Fourteen medical students participated in the I-COPE program at the G-SAFE clinic. s
- Students gained valuable insights into interprofessional care and the impact of social determinants of health.
- An anonymous survey revealed that 100% of students felt the course positively influenced their understanding and advocacy for individuals with SUDs.
- 25% of students agreed, and 75% strongly agreed with the positive impact of the course.

Transformative Themes and Insights demonstrating the SUD curriculum impact

1. **Empathy and Compassion**: The rotation fostered a deeper sense of empathy, enabling trainees to view SUDs as complex medical conditions rather than moral failings.
2. **Understanding Stigma**: Students gained insights into the stigma and systemic barriers faced by patients with SUDs. They emphasized the importance of patient-centered communication, such as asking for permission before discussing substance use, to build therapeutic alliances.
3. **Personal Transformation**: Many students experienced a shift in their perceptions of addiction, moving beyond preconceived notions to appreciate the resilience and humanity of patients, enhancing their commitment to empathetic care.
4. **Connection and Gratitude**: The supportive clinic environment highlighted the impact of gratitude and connection, transforming clinical encounters into meaningful exchanges that underscored the human significance of patient narratives.
5. **Acknowledging Patient Agency**: Reflections emphasized the importance of recognizing patient agency and personal stories, appreciating their human significance beyond clinical implications.

These insights equip future physicians with the skills and sensitivity necessary to effectively address the challenges of SUDs, fostering a holistic, patient-centered approach to care.

Graduate Medical Education - Addiction Medicine Curriculum

- **General Internal Medicine - Addiction Medicine Selective**
  - Clinical Addiction Medicine
    - SUD Clinic (4 ½ days / week)
  - SUD Community Experiences (3 minimum)
    - Drug Court (required)
      - + signed attendance verification
      - + reflection
    - AA and/or NA (in person)
      - + signed attendance verification
      - + reflection
    - SMART Recovery (virtual)
      - + reflection
  - SUD autonomous learning modules (required)
    - MedMastery SUD
      - + Quizzes + 2.75 hours min
    - NEJM Pain Management & Opioids
    - Curbsiders AM Podcast
- **Lecture Series in Addiction Medicine**
  - Introduction to Addiction Medicine
  - Brief interventions and the Brief Negotiated Interview
  - Alcohol Use Disorder
  - Stimulant Use Disorder
  - Opioids Use Disorder
  - Opioids and Chronic Pain

Category	Task Description	#	Verification	Completion Date(s)
Community Experiences: attend at least 3 community experiences, so can choose which experience below to do twice Make sure to load your signed verification of attendance and reflection to Blackboard				
Galveston County Hope Drug Court	Attend at least 1 session of the drug court, Thursday 3p-5p	1	Upload Verification of Attendance form in Blackboard for each experience (3 total)	
Community Support Group	Attend at least 1 **in-person** community support group (AA, NA, Celebrate Recovery)	1		
Community Support Group	Attend at least 1 additional community support group (in-person or virtual)	1		
Virtual Curriculum: load certificates of completion for each section to Blackboard				
Medmastery Course	Complete the Medmastery course, Essentials of Addiction Medicine (minimum of 2 hours and 45 minutes spent on content)		Online Only, nothing to load to Blackboard	
NEJM Knowledge+ Pain Management and Opioids Course	Complete all 8 topic areas		Upload course transcript to Blackboard	
Curbsiders Podcasts on Pain Management and Opioids	Complete 3 modules		Upload CME certificates to Blackboard	
Reflection Assignment	Caring for Patients with Substance Use Disorders		Upload Reflection to Blackboard	

Fig. 6 Summary of Requirements for Interns Completing the Additional Medicine Component of the Ambulatory Elective. 21 of 29 Interns have completed this rotation.

CONCLUSION

- The G-SAFE clinic and its interprofessional model effectively addressed SUD treatment and educational gaps.
- Significant improvements in patient outcomes and enriched medical education through interprofessional experiences.
- Demonstrates the potential of IPE and community engagement to enhance patient care and educational experiences.
- Future efforts should refine educational integration and employ more validated quantitative assessments for curriculum evaluation.
- The G-SAFE clinic and I-COPE model provide a replicable framework for addressing SUDs through innovative, collaborative approaches.

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