Implementing Interprofessional Clinical Simulation Experience for Medical & Nurse Practitioner Students: Addressing the Turf War
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Presentation Objectives
1. Describe the use of a clinical simulation experience for teaching teamwork & communication skills in medical and NP students
2. Discuss the assessment of teamwork & communication skills using behavioral measures in clinical simulations
3. Identify clinical simulation experience's potential for advancing interprofessional teamwork skills in clinical experiences

Why Teamwork Skills—So What?
Not one patient with mental illness is treated in isolation of other providers
Barrier—"hierarchical rights of professions versus responsibilities"
Nurse practitioners and physicians bring their own expertise to the clinical arena

Gaps & Needs
• No behavioral teamwork measurement in medical & NP student TEAMS
• Used one session with different “TEAM” students
• Need performance objective measurements, appropriate feedback, clear learning objectives & facilitators with debriefing skills
• Evidence based curriculum

Purpose of the Project
• Develop & implement IPE clinical simulation experience for medical and NP student teams
• Test the feasibility of evaluating teamwork & communication skills through IPE clinical simulation experience
• Evaluate change in teamwork & communication skills using behavioral measures in IPE clinical simulation experience

Project Foundations
Continuum:
*EXPOSURE (Knowledge)
*IMMERSION (Skills/Behaviors)
COMPETENCE (Entry to Practice)
Team Structure in Project

One medical student and 1 NP student = 1 TEAM

Same TEAM Members throughout the Entire Experience (4 Sessions)
- 2 Online Sessions
- 2 Standardized Patient Sessions with Briefs & Debriefing Sessions (SP part of the TEAM)

Clinical Simulation Design

Standardized Patient (SP) case:
- Diagnosed with Bipolar I Disorder with Medical Co-morbidities and Health Risk Behaviors (e.g. smoking, alcohol, poor diet)
- TEAMS conduct psychiatric initial history on SP
- TEAMS conduct health education on same SP 1 week later

Sequence of Clinical Simulation

<table>
<thead>
<tr>
<th>Session</th>
<th>Procedure</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 Exposure</td>
<td>Separate Online Collaborate Sessions for Each TEAM—TeamSTEPPS</td>
</tr>
<tr>
<td>2 Immersion</td>
<td>Briefing Session—SP Psychiatric History Debriefing Session</td>
</tr>
<tr>
<td>3 Skills Behaviors</td>
<td>Separate Online Collaborate Sessions for Each TEAM—prioritize &amp; plan health education</td>
</tr>
<tr>
<td>4</td>
<td>Briefing Session for “1 week follow up”—SP Health Education Session Debriefing Session</td>
</tr>
</tbody>
</table>

Student Objectives in SP Sessions

1. Teams will decide on leadership & team roles in performing history & health education sessions.
2. Teams will demonstrate situational awareness of each member & the patient in each session.
3. Teams will demonstrate mutual support for each other.
4. Teams will demonstrate effective communication skills during the sessions.

Behavioral Measurement

Performance Assessment of Communication and Teamwork-Novice Form (PACT) (University of Washington Center for Health Sciences IPE, Research and Practice)

<table>
<thead>
<tr>
<th>TeamSTEPPs:</th>
<th>Session Sections Scored</th>
</tr>
</thead>
<tbody>
<tr>
<td>Team Structure, Leadership</td>
<td>BRIEFINGS</td>
</tr>
<tr>
<td>Situation Monitoring, Mutual Support, Communication</td>
<td>SP SESSIONS</td>
</tr>
</tbody>
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Ethical Concerns

- University of Maryland Baltimore IRB approval
- Informed Consent
- Recruited Students not taught by faculty members in study
Implementation Process

Recruitment
- Email, in class presentations
- School of Medicine: Combined Accelerated Psychiatric Program
- School of Nursing: PMHNPs and Family Nurse Practitioner (FNP) students

Sample

N = 10 students
- 1st year medical students = 5
  - (1 withdrew after Session 1)
- 1st year PMHNP students = 2
- 2nd year PMHNP student = 1
- 1st year FNP students = 2
  - (1 PMHNP student withdrew during Session 2)
- 3 Teams completed the entire project

Feasibility of Simulation

- Scheduling Sessions YES
- PACT Training and Scoring YES/NO
- Interrater Reliability YES

PACT Scores

<table>
<thead>
<tr>
<th>Domain</th>
<th>Team 1</th>
<th>Team 2</th>
<th>Team 3</th>
<th>Team 4</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>SP 1</td>
<td>SP 1</td>
<td>SP 1</td>
<td>SP 1</td>
</tr>
<tr>
<td>Team Structure</td>
<td>5</td>
<td>5</td>
<td>5</td>
<td>4</td>
</tr>
<tr>
<td>Leadership</td>
<td>5</td>
<td>4</td>
<td>5</td>
<td>4</td>
</tr>
<tr>
<td>Situational Monitoring</td>
<td>5</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>Mutual Support</td>
<td>4</td>
<td>5</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>Communication</td>
<td>3</td>
<td>5</td>
<td>4</td>
<td>3</td>
</tr>
</tbody>
</table>

Red = Team 1 improved scores
Green = Team 2 improved scores
Purple = Team 3 improved scores
xx = Not completed

Lessons Learned

- Importance of student fit
- Technology challenges
- One team member withdraws, team is gone

Next Steps

- Qualitative analyses on the process
- Plans for Curricula Change
  - Doctor of Nursing Practice and School of Medicine Psychiatric program
- Adapt simulation to include skills for patient partnering
Implications for Clinical Settings

- Practice environment before actual clinical placements
  - Dr. Ann Hackman: Severe mental illness outpatient
  - Dr. Sarah Edwards: Child Inpatient Unit
- Ongoing Exposure and Immersion

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References

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- Schmitt
- University of Toronto
- AHRQ
- PACT