

Emergency Preparedness Interprofessional Collaborative Practice Simulation: Student's Perceptions of Understanding and Contribution to their Community

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Southern Adventist University

The Problem

- Increased need for emergency preparedness
 - Terrorism
 - Natural disasters
 - Man made disasters
- Inability to turn theoretical knowledge into practice
- Minimal interprofessional collaboration with other professions

Being Prepared

It is of vital importance that schools be prepared for the unthinkable! (Blinici, 2014)

You can't control world events, but you can control your families preparedness.

Preparedness is Peace

| | | | | |
|--------------------|-----------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------|--------------------|
| Event Level | SEVERE | <p>Complete Self Reliant Lifestyle 2+ Year Supply of Long Term Food Storage with the knowledge and resources to produce more food Knowledge of livestock farming, bees, medicinal herbs, soap making, candle making, fabric weaving, sewing, survival, building and other essential skills, etc. etc. Emergency Shelter (like a 4 season canvas tent and tent stove), and Fuel for Heat.</p> | No Fear | Ready Level |
| | HIGH | <p>1 Year+ Supply of Long Term Food Storage of Grains, Legumes, and basic survival foods. YOU have been doing this long enough to TEACH others how to do it. Emergency Toilet, Lighting, Cooking Fuel (indoor and outdoor) All IMPORTANT information has been printed off in Hard Paper Copies in case of loss of internet. Cash on hand, Longer term Medicine and CERT Training</p> | Resource | |
| | ELEVATED | <p>90 Day Supply of Foods you Already Eat that you can rotate through 90 days of DRINKING water stored Spouting Seeds stored to use for Fresh Vegetables if you can't get any Savings in the Bank, Debt Free from Consumer Debt Worm Cloths/ur, including tools and tools for your whole family Sleeping Bags, Basic Camping Gear, Fire Starters Special supplies like feminine products, infant products and medical supplies Ability to use alternative cooking methods, like solar or thermal or dutch oven</p> | Progress | |
| | GUARDED | <p>Two Weeks of Food in Pantry (fat pantry), Two Weeks of Income in the Bank Two weeks of drinking water, Two Weeks of Fuel Paying off debts, Over saving addictions 72 hour kits for fireing & car kits in the car for incidents on the road First Aid Supplies and Training A Family Emergency Plan, written down and discussed with the family Know your Neighbors, Know your Community Resources Have all contact numbers available on hand, easy to find place Home prepared for earthquakes</p> | Started | |
| | LOW | <p>Relative Safety and Peace Private Family Emergencies are occurring like sickness, job losses, on a case by case Best Time to Prepare your family</p> | Not Ready | |



Power for Mind & Soul

INACSL

- Simulation Design
- Outcomes and Objectives
- Facilitation
- **Debriefing**
- Participant Evaluation
- Professional Integrity
- **Simulation-Enhanced Interprofessional Education (Sim-IPE)**
- Simulation Glossary



Literature Review

Need for Disaster Simulations

- ❖ Students may not know how to help or what to do when disaster arises. (Brewer, 2010)
- ❖ A gap (exists) between education and practice. (Alim, Kawabata, & Nakazawa, 2015)

Simulation

- ❖ Incorporation of simulation into pre-licensure education provides an opportunity for future healthcare workers to engage in life like scenarios and gain practical knowledge in a safe, intentional, and orderly environment (Pinar, 2015).

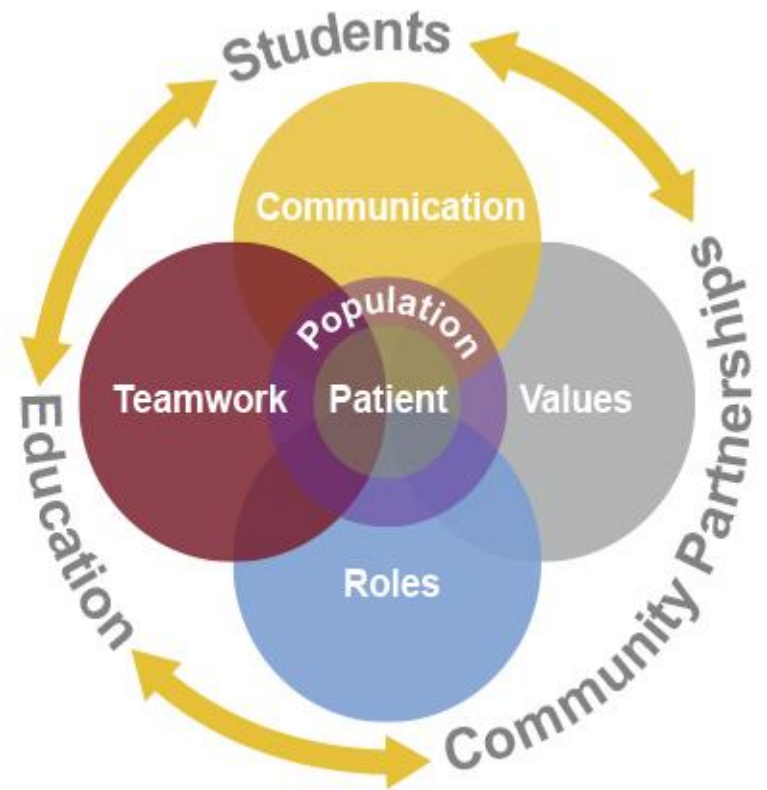
Interprofessional Collaborative Practice

- ❖ “When multiple health workers from different professional backgrounds work together with patients, families, caregivers, and communities to deliver the highest quality of care, it allows health workers to engage any individual whose skills can help achieve local health goals.”
(WHO, 2010, p. 7)

Summary

There must be a seamless integration between the education system and the various workforces who employs them.

(IPECEP, 2011)



Purpose of the Study

- Provide an EP IPCP simulation experience
- Discover participants' perceptions of the EP IPCP
 - Spiritual Preparedness
 - Contribution to their community
 - Understanding the various roles



How can they work together
if they don't learn together?



EP IPCP Simulation



EP IPCP Simulation



Power for Mind & Soul

Sim Roles



2015 EP IPCP sim [video](#)

2018 EP IPCP sim [newscast](#) from Journalism students

Methodology

Research Design

Mixed Methods study



- Quantitative:
 - Post-Simulation Survey
- Qualitative:
 - Recorded “Hot Wash”

Sample

- Students enrolled from F15 – F17
- Southern Adventist University:
 - Education
 - Nursing
 - Religion
 - Social work
- $N = 339$





Demographics

Major

Education 16% ($n = 53$)

Nursing: 60% ($n = 202$)

Religion: 9% ($n = 5$)

Social Work: 14% ($n = 29$)

Gender

Male: 25% ($n = 85$)

Female: 75% ($n = 252$)

$N = 339$

Ethics

- IRB approval obtained from Southern
- Informed consents obtained
- Surveys completed anonymously
- Data stored in password-protected encrypted investigators' database



Procedure

- Worship and Pre-Brief (orientation)
- Self Care Overview
- START Triage Overview
- Simulation
- Recorded “Hot Wash” debrief session
- Data collection



Instrument



IPCP Interprofessional Collaborative Practice Simulation Survey

* Required

IPCP Simulation Study Informed Consent Form *

You are being asked to participate in a study investigating your perceptions of participating in the IPCP classroom disaster simulation experience. The research team is intentionally exploring young adults' knowledge and perceptions of participating in a classroom disaster simulation experience. Completing this survey demonstrates your consent to participate in this research study. You may complete the questionnaire electronically on your smart phone or iPad via the link on your course eClass site. You will also have the opportunity to participate in a group-specific debriefing session, which will be recorded for research purposes; the information collected will be kept totally confidential. Only group averages will be reported. The electronic questionnaire should take you approximately 10 – 20 minutes to complete. The recorded group-specific debrief sessions may take up to 45 minutes. By completing the questionnaire, you are agreeing to participate in this study and are giving permission for your photo to be taken. Although all studies have some degree of risk, the potential of risk to you in this investigation is quite minimal. All activities are similar to normal

Instrument

After participating in this Interprofessional Collaborative Practice (IPCP) disaster simulation experience I feel:

9. Comfortable participating in a classroom disaster experience.

- Strongly disagree
- Disagree
- Neutral
- Agree
- Strongly agree

10. Confident in my ability to respond to disasters.

- Strongly disagree
- Disagree
- Neutral
- Agree
- Strongly agree



Data Analysis

- Quantitative data
 - Descriptive statistics & frequencies
- Qualitative data
 - Interviews transcribed and coded
 - Emerging themes identified

Limitations

- Data collection at one private Christian university
- Only one disaster scenario has been used



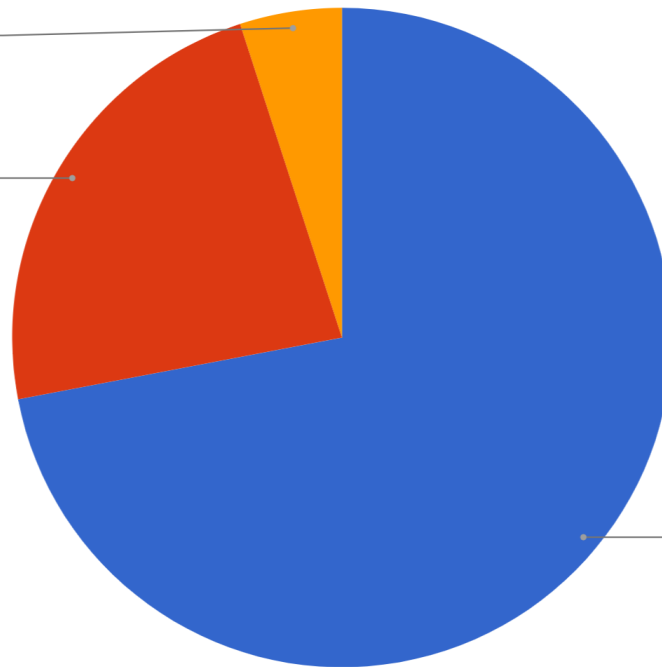
Quantitative Results



Better contribute to their community

Strongly Disagree/Disagree
5.0%

Neutral
23.0%



Strongly Agree/Agree
72.0%



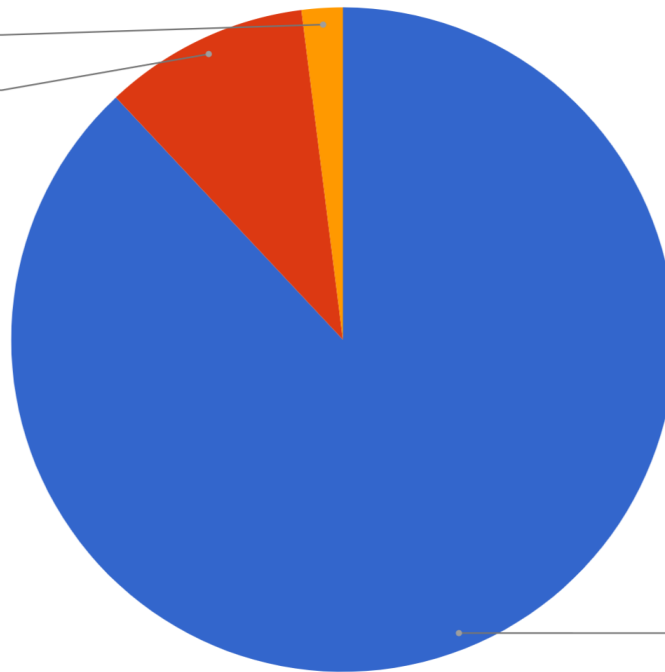
Spirituality is an Important Element of Preparedness

Strongly Disagree/Disagree

2.0%

Neutral

10.0%



Strongly Agree/Agree

88.0%



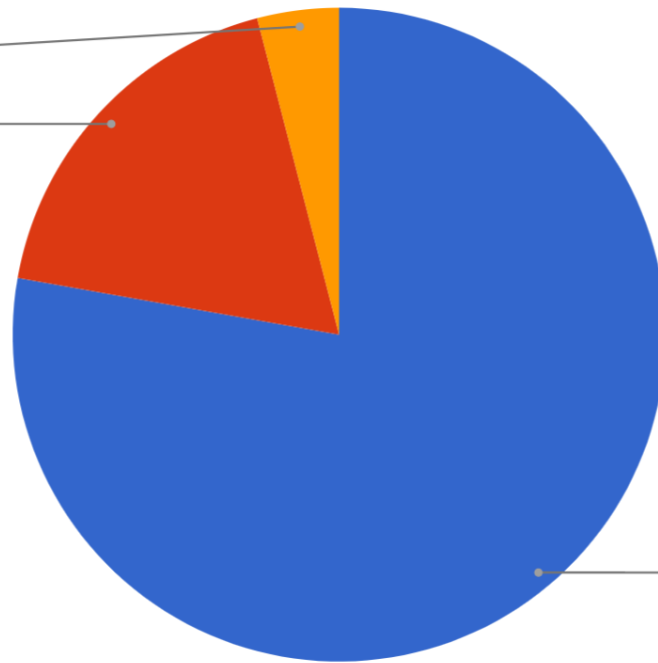
Comfort Level Participating in a Classroom Disaster

Strongly Disagree/Disagree

4.0%

Neutral

18.2%



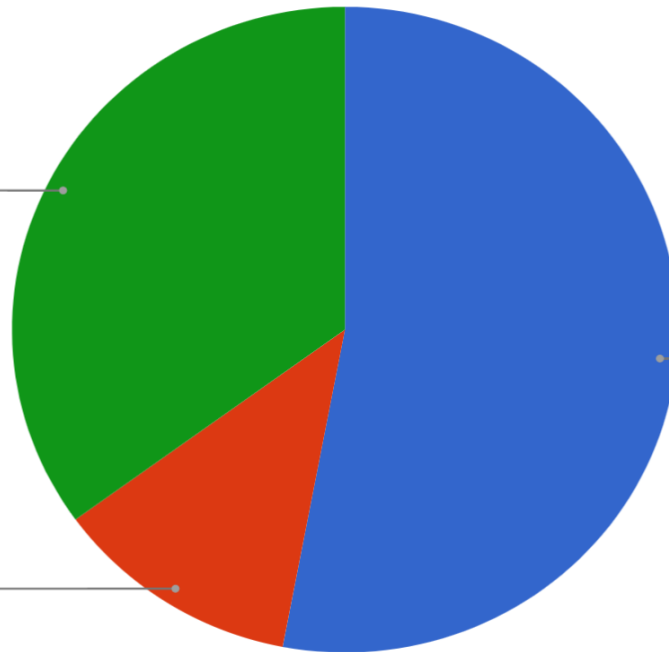
Strongly Agree/Agree

77.8%



Were Able to Apply Classroom Knowledge

N/A I'm a volunteer...
35.0%



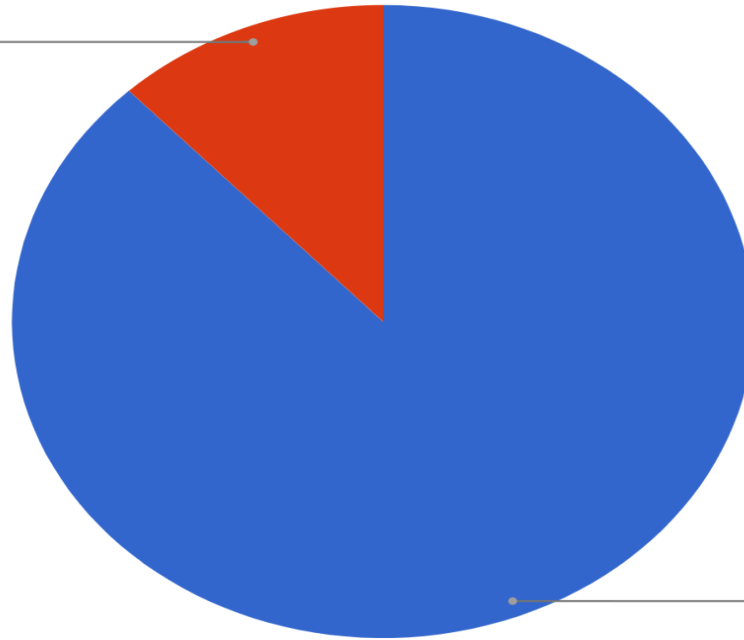
Strongly Agree/Agree
53.0%

Neutral
12.0%



Have a Deeper Understanding of IP Roles

Sort of
12.0%



Yes
88.0%



Qualitative Results



“Sharpening Skills”

- “I think this made us think on our feet and allowed us to pull from our class discussions and course work. This allowed us to see what we were made of as social workers.”
- “It always nice to see what happens when you just have a split second to make a decision.”
- “It was very different than what we normally do as nurses... more critical in the moment...we make our own decision instead of relying on the doctor.”

“Training and Collaboration”

- “I believed that the readings and training we've received through FEMA and other online training really prepared us [...].”
- “I really liked how the social workers were allowed to sit in on the training that the nurses received.”
- “I feel prepared for a real disaster. I feel that I would know how to deal with family members, but I would also know how to triage patients.”

Student Take-Aways

- “Very well prepared. I felt that it was real.”
- “It was intense, frightening, good.”
- “I think it was very realistic and helpful in identifying areas that I need improvement.”
- “I feel indifferent towards it. Neither hurtful or beneficial.”

Faculty Take-Aways

Providing EP IPCP experiences will allow students to develop a heightened awareness of:

- Differing roles
- Skills to respond to a disaster
- Collaboration with other care providers
- Confidence in abilities and skills learned
- Understanding victims' needs in mass casualties

Implications

- Incorporating EP-IPCP is vital for future professionals ready to respond to community disasters as indicated by the Sim-IPE and Debrief Standard from the International Nursing Association for Clinical Simulation and Learning (INACSL, 2016).

Implications – Education, Nursing, Religion, Social Work

- The EP-IPCP simulation provides students hands-on practice in a safe setting
- This includes empowering students for responding to the varied threats faced by society across a diverse community and population.

Does the Data Make a Difference?

- The findings support the INACSL (2016) Standards of SIM IPE and Debrief.
- Findings suggest that:
 - Students feel better prepared to respond to a disaster - Empowering
 - Feel they can better contribute to their community - Connecting
 - Feel Spirituality is an important element - Caring

Further Research

Further research agenda could include finding the relationship between different aspects of spirituality and preparation for disaster response as well as post disaster resilience.

The EP-IPCP simulation study could be replicated throughout multiple settings and regions, so that true generalization of the results could be achieved.

Biblical Foundation

Approaching disaster preparedness from a faith based education perspective supports the advancement of the Good News of salvation through a ministry that responds to human needs in their most difficult time (White, 2002).

Have no fear of sudden disaster or of the ruin that overtakes the wicked, for the Lord will be your confidence and will keep your feet from being snared (Prov 3:25-26)

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Thank you for your attention!