NLN
National League for Nursing

Guide to Effective Interprofessional Education Experiences in Nursing Education

This toolkit includes:

- A brief history of the progression of interprofessional education into a standard of nursing and all health professions education
- A guide to infusing a culture of collaboration and patient-centeredness into your institution
- Eight detailed guides for interprofessional education activities suitable for a variety of nursing education environments
- Strategies for evaluating a program's impact and implementing evidence-based teaching practices
- And more

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Statement of Purpose

In a time of health care redesign in the United States, today's health professionals are called to understand the complexity of patients' health needs. For the nursing profession and nursing education, this understanding has two major implications: 1) Nurses are expected to use knowledge from several disciplines to treat patients, and 2) A coordinated interprofessional approach is needed to deliver quality care (Benner, Sutphen, Leonard & Day 2010; World Health Organization [WHO], 2010). Yet, recent reports express concern about the current capacity of nursing education to adapt to these demands, considering the shortage of nurse faculty and mentors (Benner et al.). Also, research shows concern about the inability of health professionals to work together due to poor communication and collaborative practices (Brandt, 2015). Both concerns, if unattended, can have adverse effects on the health outcomes of patients.

In response to this challenge, the National League for Nursing, as the voice of nurse educators nationally and internationally, published a *Vision for Interprofessional Collaboration in Education and Practice* (NLN, 2016) that calls for schools of nursing to change the historical and still predominant educational model of separate professional programs and create interprofessional education and practice initiatives. The NLN's mission and core values and long history of being inclusive of professions and perspectives to promote innovative approaches to health professions' education provide the foundation to address this challenge and opportunity.

Nurses in particular are in a key position to improve patient outcomes and team productivity.

As a profession, nursing has a history of being family- and patient-centered and providing comprehensive, compassionate, and coordinated care (Vincent & Reed, 2014). Representing the largest sector of the health professions and spending more time in direct contact with patients than many other health professionals, nurses have the ability and responsibility to influence practice team culture and assume leadership roles at all levels (IOM, 2011). Per recommendations from the Institute of Medicine (IOM) and the Robert Wood Johnson Foundation (RWJF) in 2011, nursing education must advance interprofessional education (IPE) in order to meet the

Interprofessional Education (IPE) is defined as occurring when students from two or more professions learn about, from, and with each other (WHO, 2010).

demand for safe, high quality, and patient-centered health care service and prepare nurses to fulfill their expanding role (IOM, 2011).

With IPE, students learn to collaborate and communicate effectively, and, by doing so, they develop leadership qualities and mutual respect for one another's knowledge and skill sets (Interprofessional Education Collaborative [IPEC] Expert Panel, 2011). These methods and values are crucial to success in health care team settings where team functionality and patient safety are priorities. Nurses can utilize their skills to engage with physicians and other health professionals in an effective manner as vital members of the team and as leaders within the team by supporting others. By honing their collaborative practice (CP) skills in IPE programming, nursing professionals at all levels will be more likely to utilize these skills in their own clinical practice.

This Interprofessional Education Toolkit is a step-by-step guide to effective IPE experiences in nursing education. Appreciating that methods available for implementing IPE differ based on the local context of a school or university, this guide is not grounded in one local context and is meant to be a resource for a variety of nursing education settings. This guide is a step-by-step overview of building, implementing, and sustaining IPE at your organization.

Before diving into IPE program development, the following page presents a brief history of IPE and collaborative care along with implications for nursing and nursing education.

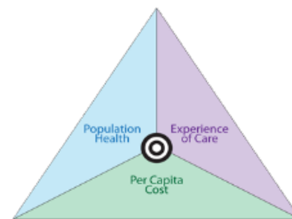
PULSE CHECK

Take a few minutes to reflect on how nurses engage in teamwork every day to provide high quality patient care.

Background

The complex and burgeoning demands of health care practice on nursing education today are not a new phenomenon. In 1972, the first IOM conference recommended that all academic health centers have an "obligation" to foster cooperation among different professionals in the health care team, a team that is built around the "personal needs of patients" (p. 19). Since then, several other reports, such as those from the IOM, WHO, and the Josiah Macy Jr. Foundation, illustrate the growing realization that the success of health care practice is inextricably linked to the composition, skills, and functionality of the health care team (IOM, 2000, 2001, 2003, 2011; WHO, 2010; Thibault, 2013). The Institute for Healthcare Improvement (IHI) described a goal of improving the performance of the US health care delivery system, called the "Triple Aim," that illustrates an approach to health system optimization in three dimensions:

- Improving the patient experience of care
- Improving the health of populations, and
- Reducing the per capita cost of health care.



The Triple Aim (IHI, 2007)

Each dimension asks health systems to derive greater value from their workforce and their resources. With the passing of the Patient Protection and Affordable Care Act (ACA) in 2010, the social and economic climate changed and effective team approaches were urgently needed to accommodate the millions of additional Americans who had previously been uninsured. The majority of health care reforms under the ACA indicate enhanced roles for nursing and patient-centered care (Vincent, 2014).

Yet, despite these significant changes in practice, the training and education to prepare practitioners to participate in team-based care were delayed. As stated in the 2003 IOM report, "Once in practice, health professionals are asked to work in interdisciplinary teams, often to support those with chronic conditions, yet they are not educated together or trained in team-based skills." Nurse educators have an opportunity and responsibility to prepare nursing students for increasingly common team-based care settings. With the number of nurse practitioners per primary care doctor more than doubling between 1995 and 2009, the nursing profession must lead the way to new national norms for health professions education. During this process, it is especially critical to have a clear vision of what high quality nursing education looks like and what programs are needed to meet those standards (Benner et al., 2010).

Nursing education programs need to offer curricula that have interprofessional educational opportunities.

Interprofessional collaboration has gained much traction in the last decade in education and in practice. While widespread integration of IPE in health curricula remains limited by perceived and actual barriers, models for IPE infrastructure and educational standards are established and strengthening (NLN, 2016)). The National Center for Interprofessional Practice and Education was created in 2012 and offers support to those in the field advancing IPE efforts. The National League for Nursing's 2013–2015 strategic plan indicated support of initiatives fostering the "development of a nursing workforce that participates in team-focused, interprofessional, person-centered care to advance the nation's health" (NLN, 2013). The vision of nurses as key members of high-functioning teams improving the experience, outcomes, and costs of health care is building (IHI, 2007).

SECTION 1: Why Are Interprofessional Education and Practice Important?

The current state of health care delivery in the US is gaining widespread attention as new demands on health care have formed. An aging population, longer life spans, and chronic health problems are changing priorities in health care practice and education to keep the nation healthy.

1.1 Stakeholders in nursing education recognize their responsibility to positively impact future patient outcomes through training nursing students for team-based, patient-centered care.

As described previously, many institutions, such as the IHI, IOM, WHO, and the NLN, describe high quality health care delivery as team-focused and patient-centered. The emphasis on patient-centered collaborative care in practice environments influences accreditation requirements. Along with its impact on collaborative practice and, ultimately, patient safety, evolving accreditation is a main source of recent momentum for IPE. The NLN's recently released *Vision for Interprofessional Collaboration in Education and Practice* describes a paradigm shift in how care is delivered and challenges nurse educators to develop meaningful IPE opportunities and place students in team-based learning opportunities to prepare for the evolving role of the nurse (NLN, 2016). The American Association of Colleges of Nursing (AACN) also includes "interprofessional communication for improving patient outcomes" as essentials in its undergraduate and graduate accreditation standards (AACN, 2008, 2011). The greater focus on preparation for collaborative, patient-centered care from nursing stakeholders signals that nurse educators have an obligation to refocus as well.

1.2 Interprofessional education prepares future clinicians to deliver patient-centered care as members of interprofessional teams.

IPE creates opportunities for health students to engage in interactive learning with those outside their profession so that, when they enter the workplace, they have the baseline knowledge and confidence for team interactions that lead to better patient care. Because students learn from what they experience, students who engage in collaborative activities in their learning will be more likely to bring a collaborative approach to their work as practitioners (Speakman, 2015). The call for IPE to be embedded in health care training is gaining more traction in recent years. The IOM *Future of Nursing* report calls for "leadership-related competencies" to be major components and more "leadership development and mentoring programs" to be made available to create a culture that promotes nurse leadership (IOM,

2011). A framework for interactive learning among students of different professions was created in 2011 by the Interprofessional Education Collaborative Expert Panel (IPEC, 2011). The panel identified four core competencies within IPE in an effort to standardize learning activities. The competencies encapsulate many of the principles of health care reform, such as patient-centered, community-oriented, and outcome-driven care.

Adapted from the IPEC report, the interprofessional core competencies are described here:

Values and Ethics	Work with individuals of other professions to maintain a climate of mutual respect and shared values
Roles and Responsibilities	Use the knowledge of one's own role and those of other professions to appropriately assess and address the healthcare needs of the patients and populations served
Interprofessional Communication	Communication with patients, families, communities, and other health professionals in a responsive and responsible manner that supports a team approach to the maintenance of health and the treatment of disease
Team and Teamwork	Apply relationship-building values and the principles of team dynamics to perform effectively in different team roles to plan and deliver patient-/population-centered care that is safe, timely, efficient, effective, and equitable

Nursing students must learn to engage in teamwork, which involves a commitment to efficient, high quality care in patients' best interests, a respect for teammates' skills and areas of expertise, and a willingness to work together and communicate effectively. In response to the publication of these core competencies, a cascade of new accreditation standards and health profession curricula redesigns emerged incorporating interprofessional education (Brandt, 2015). A competency-based program helps guide professional curricular development and helps programs meet accreditation requirements (Hall & Zierler, 2015).

1.3 Interprofessional education and collaborative practice are increasingly linked to improved patient outcomes and patient experience.

The link between IPE and student learning is well documented. In addition, research correlating IPE with enhanced patient outcomes is strengthening, with studies linking IPE to such patient outcome measures as fewer medical errors, decreased length of patient stay, and improvement in symptoms (Capella et al., 2010; IOM, 2015). The IOM (2015) identified the need for a well-defined analytical framework for measuring the impact of IPE and CP, due to complexity in the educational and practice settings where research is conducted. This IOM report clarifies the intended outcome of IPE as not only improving student attitudes and skillsets, "but improving the health of individuals and populations and enhancing the

responsiveness of health systems to such non-health dimensions as respect for patients and families, consumer satisfaction, and the affordability of health care for all" (p. 2).

Teamwork and communication training are also related to reducing patient injuries from medical errors. The Joint Commission (JCAHO) reported that 63 percent, or approximately two thirds, of all sentinel events are due to poor communication (2002). IPE intentionally trains students to communicate clearly and efficiently with their health team, which also includes patients and their families. Strong communication lends itself to a decreased amount of omitted information, more contextual description, and trust and honesty between two parties. Many researchers recommend creating a culture of strong communication to decrease medical errors (Noguchi, 2014).

PULSE CHECK

Take a few minutes to reflect on how your institution's current curricula for nursing students align with the IPEC interprofessional core competencies.

SECTION 2: Preparing for Interprofessional Education at Your Institution

The Agency for Healthcare Research and Quality (AHRQ) characterizes a climate conducive to change by the "leadership and key staff members who are committed to making a change and who are willing and able to dedicate the necessary time, resources, and personnel" (2014, October). Despite the many benefits and endorsements of IPE and CP, many schools and health systems face numerous barriers to establishing IPE programming in a sustainable way. In the beginning stage, it may be more feasible to gain approval for a singular activity in a specific department, rather than launching an organization-wide program. Regardless of the breadth of your program, this section explains the key players and resources needed to make the program successful.

2.1 Building Your IPE Community: Enlist Support from Across Your Institution

Establishing an enthusiastic general body with a shared IPE vision is essential to support program coordination. By formalizing commitment among the interested administrators, staff, faculty, and students, coordination is more efficient and mechanisms for effecting organizational culture and curricular reform are more easily leveraged. This section identifies individuals from across the learning continuum from whom you will want to seek support as you build an IPE presence at your institution.

1 Senior Leadership

Support from senior leadership is important from the beginning (Brashers, Owen, & Haizlip, 2015). It is your institution's deans, board members, and chief officers who have the power to empower or squelch your efforts. Their approval will help to allocate resources, obtain a budget, and gain institutional recognition, and they may designate particular faculty members to support coordination (Freeth, 2001; Reeves, Goldman, & Oandasan, 2007). The support of the senior leadership is also symbolically significant, as it may influence buy-in from others.

2 Local Department Leaders as IPE Champions

Faculty members from every profession that you want to include in programming should be enlisted in your efforts. If your nursing program is located at an institution that does not have other health-related degree programs, reach out to other academic departments. In today's workforce, it is rare to find a profession that doesn't require some teamwork coordination skills (Speakman & Sicks, 2015). Work with faculty members from other departments, for instance environmental science, law, public policy, computer design, or the arts, to identify interests or

areas of study where the two professions intersect and then coordinate an interprofessional activity around the topic.

The WHO report on establishing a framework for IPE and CP calls for health leaders to "champion the benefits of interprofessional collaboration with their…partners, educators, and health workers" (2010, p. 11). The term "champion" is commonly used to refer to faculty partners as they assume many responsibilities and promote IPE as vital learning within their local communities, often on a volunteer basis. Faculty members are needed to recruit students for programs, supervise and facilitate activities, and develop programming. A variety of perspectives should be included in planning committees, curricular workgroups, and evaluation efforts. An interprofessional faculty group also offers a wide professional community for you to call upon for funding, sources to publish research, and other needs.

Scheduling is a widespread challenge for IPE programs as different health profession programs have different curricular requirements and vary in duration, student availability for in-person activities, and accreditation standards (Bridges, Davidson, Odegard, Maki, & Tomkowiak, 2011). Your IPE champions who represent each profession have the information needed to determine the best schedule and learning objectives for all students. As was mentioned, champions are often secured, at least initially, on a volunteer basis as funding may be limited. If funding is available for the time and efforts champions devote, it can help with program sustainability and defer attrition for a period of time until individual faculty members retire or leave. By sustaining the work of champions, funding or other incentives can have a positive [illegible] on programming.

3

Pre-Existing Interprofessional Teams

Section 2.3 explains the importance of conducting an initial needs assessment of your institution's local environment to determine your institution's strengths and gaps in IPE competencies. If your institution is closely linked with a hospital or other practice environment, the identification of pre-existing interprofessional health care teams, where collaboration between professions is already entrenched, is an institutional strength. Because students learn from what they experience, these teams can be engaged for clinical observation, leading simulations, and panel discussions about collaboration and teamwork in practice. If your institution doesn't have access to health care teams, teams from other professional fields can be just as valuable, serving as examples of real-world collaborative work from which students can gain insight about team functioning. If your institution is not directly affiliated with a practice environment, reach out to the locations where nursing students are completing their

clinical rotations to see if any interprofessional teams would be interested in hosting an activity for your students. Also, your local institution may have teams that are not health-related, but could serve as exemplars of teamwork in action and could have equal educational value

4 Students

It is crucial to include students in the IPE planning process. Students help shape programming by offering insight into their real-time needs. They also inspire their peers to buy-in to the value of CP. Student interest will increase when there are meaningful ways to contribute, such as serving as a student adviser on a planning committee, assuming leadership roles in a student organization, participating in research opportunities, and otherwise closely engaging with their faculty and any practitioners involved in programming.

PULSE CHECK

Take a few minutes to write down a list of senior leaders and faculty leaders who have expressed interest in or are already coordinating IPE programming. Are you missing any professions that you want to include?

2.2 Supporting Your IPE Community

If resources are available and you seek to make IPE a regular aspect of educational programming, other supports will need to be in place for progress to occur. Faculty members will not be able to sustain a program on their own and will need training.

Develop an IPE Center

Establishing an IPE center with its own staff will centralize all efforts and can take an IPE program from occasional, disconnected activities to an established, regular fixture of the institution where the program can thrive. IPE-specific staff would be one team solely dedicated to planning, organizing, and facilitating conversations involving the different professions. Roles at IPE centers often include director, assistant director, education programs coordinator, and administrative assistant. Staff coordinate activity logistics, facilitate activities, lead evaluation, and serve as the workspace for new IPE programming to be developed.

Professional Development for Faculty

The training of IPE administrative faculty and staff is an important element. Diane R. Bridges, associate dean of interprofessional education at Chicago Medical School says, “Mentors and faculty need to feel confident in their interactions with students. The significance of any interprofessional course needs to be shared with faculty so they can see its importance” (Bridges et al., 2011). While it is important that faculty members and facilitators individually understand the positive effects of interprofessional collaborative skills, the value of more formalized IPE and CP skills training should not be understated. Training can be helpful for those individuals willing to facilitate IPE programming and can be used as a way to engage new faculty members and garner their support. Interprofessional programming was not a part of the schooling of many current faculty members. For this reason, recruiting faculty support may need to begin with introductory education so that faculty can make informed decisions around IPE.

2.3 Conduct an Assessment to Determine Your Starting Point

Successful IPE and CP programming is not possible without the backing of key players in your institution who can help you create an impactful and sustainable program. Assessing your institution's environment will inform the next steps you need to take.

An institution is more likely to successfully implement an initiative when it has objective information about the crucial gaps that need to be filled. John P. Kotter, a scholar on leadership and change, developed the 8-Step Change Model to describe the different phases of the organizational change process (Kotter, 1995). Step 1 is defined as "Establishing a Sense of Urgency," which is done by identifying and discussing potential crises or issues "broadly and dramatically" (p. 60). A sense of urgency motivates people to seek change. Kotter warns that failure in Step 1 is common as many underestimate how difficult it is to influence people to step out of their comfort zones, and many overestimate how effective they are in doing so. Spend time formulating your compelling argument for a change in culture. This argument will require evaluation of and research on how well your current environment prioritizes and supports patient safety and collaborative practice. It could take a variety of forms, such as evaluation of patient safety challenges locally and nationally or a cost-benefit analysis of implementation. Due to the significance of this initial step, see Table 1, "Building the Case for IPE," which extrapolates how to successfully create a sense of urgency.

Table 1: **Building the Case for IPE**

Local Environment Research	Local Financial Data	National Sources to Reference
-Presentation of IPE accreditation requirements for each degree program and department-specific compliance with IPE requirements -Review safety concern reports -Survey a sample of physicians, nurses, pharmacists, other clinical staff, students, and patients on perceptions of patient safety and teamwork behavior -Survey clinical staff and/or student attitudes towards teamwork and patient safety -Observe clinical teams for site-specific collaborative and patient-centered processes -Consult with practitioners, students, and/or faculty for their perspective on collaboration in a certain environment	-Report of local expenditures due to medical errors -Cost-benefit analysis of expenditures due to medical errors as a way to enhance collaborative practice/care and thus prevent medical errors caused by miscommunication -Proposed budget for IPE programming	-Institute of Medicine's 1998 report *To Err Is Human: Building a Better Health System* -National League for Nursing Commission for Nursing Education Accreditation website at *www.nln.org/accreditation-services* -Institute of Medicine's 2010 *The Future of Nursing: Leading Change, Advancing Health* -Interprofessional Education Collaborative Expert Panel's 2011 *Core Competencies for Interprofessional Collaborative Practice: Report of an Expert Panel* *-Joint Commission Perspectives on Patient Safety*, Volume 2, Number 9, September 2002

The above suggestions are some of the many ways you can build your case. Be aware at your own institution of particular initiatives or the special interests of senior leadership. You may want to incorporate these into your presentation. Local research and data will inevitably be difficult to collect as documentation of medical errors and research about clinician attitudes and interpersonal behaviors can be hard to access if you do not already have a relationship with clinicians. While national data and publications can be convincing about national priorities, local data and research will help frame IPE as a local priority.

Once you have built your compelling argument, it is imperative to garner the support and gather the resources needed to create an impactful program. **Checklist 1,** "Steps to Interprofessional Education Readiness," on the following page will help you determine how ready your institution is to implement IPE. It is also important to note that the steps listed may

not take place in the order in which they are listed. For instance, you may concurrently be meeting with senior leadership and recruiting interested faculty members as working partners. It is also important to emphasize that this chart can be useful whether you are trying to implement a single IPE activity or a comprehensive IPE program.

The chart is organized into five overarching stages of program development, with key prompting questions within each stage. Following the chart is a description of each of the five stages with advice to follow if you answered "No" to any of the questions. The checklist, adapted from the AHRQ's "Organizational Readiness Assessment Checklist," thoroughly describes the institutional process for implementing the TeamSTEPPS® program (AHRQ,2014b). The intention of this adaptation was to make the tool relevant to all types of IPE programming.

PULSE CHECK

Take a few minutes to consider what the change process is like at your institution. Write down a projected timeline of events.

Checklist 1: **Steps to Interprofessional Education Readiness**

*Adapted from AHRQ's Organizational Readiness Assessment Checklist (AHRQ, 2015a)

Establish Need for IPE	
Have you identified strengths and gaps in the current curricula and/or clinical environment?	**YES** **NO**
Have you prepared an effective data-driven presentation, taking into consideration your audience's interests?	**YES** **NO**
Support from Senior Leadership	
Have you gathered approval from senior leadership for offering interprofessional education and valuing a culture of teamwork and safety across the institution?	**YES** **NO**
Will your institution provide sufficient staff and resources to support program development and coordination?	**YES** **NO**
Building Your Team	
Have you assembled a working group of adequate size with faculty representation from all professions that you intend to include in programming?	**YES** **NO**
Have you identified a sufficient number of faculty members who are adept in IPE competencies to serve as instructors for your activities?	**YES** **NO**
Have you organized faculty development activities for interested leaders, faculty, and staff to increase their knowledge of IPE and engage in discussion of how to incorporate IPE into their teaching and practice?	**YES** **NO**
Program Development	
Have you reviewed all professions' academic calendars and curricula to determine the best positioning of IPE programs?	**YES** **NO**
Have you developed interprofessional programming, such as classroom learning, clinical observation and practice, and/or simulation activities?	**YES** **NO**
Sustaining Your Program	
Will your institution revise curricula and allow time in order for learners to attend IPE trainings?	**YES** **NO**
Have you developed an evaluation process for programming?	**YES** **NO**
Have you developed the appropriate structure to revise and improve programming?	**YES** **NO**
Will your institution be able to reinforce and reward positive teamwork behaviors and	**YES**

improvements?	NO

Supplement to “Steps to Interprofessional Education Readiness” Chart

How to Increase Your Readiness:

If you answered “No” to any of the above questions, this section describes how to succeed in each step.

Establish Need for IPE:

Have you identified strengths and gaps in the current curricula and/or clinical environment?

Refer to Section 2.3 and Table 1. Also, you may seek other assessment tools to clarify your organization’s strengths and needs. Some other tools include examinations of outcomes, patient safety assessments, and patient, staff, or student satisfaction surveys. These will help you describe the current environment and develop your case. It will also help you determine how large an undertaking is feasible at the current time, for example, a single program or a comprehensive IPE curriculum.

Have you prepared an effective data presentation taking into consideration your audience?

Devote time and energy to developing your case and preparing briefings. Carefully consider the purpose and goals of an IPE activity and/or program at your specific institution and why it’s so vital. Prepare to be upfront about all that will be needed in order for your efforts to be a lasting success, including all potential barriers. Demonstrate that you have thoroughly considered these barriers and have plans for overcoming them. An organized and captivating presentation for key players will increase your chances of success. As more reports about the effect of IPE on student behavior, team function, and, ultimately, patient outcomes are published, be sure to highlight these positive effects in presentations to illustrate expansions that are desirable to the leadership in your institution, strengthening initiatives to formalize the utilization of IPE in curricula (Brashers et al. 2015).

Support from Senior Leadership:

Have you gathered approval from senior leadership for IPE core competencies and a culture of teamwork and safety?

Conduct a briefing of senior leaders in which you justify IPE at your institution and illustrate the urgency of implementation. Describe your purpose and goals so that they can make an informed decision. Be aware of your exact audience. Compile the specific information that will be most important to them and consider their special interests or priorities and how they could benefit from IPE programming. Refer to current changes taking place at the institution (e.g., curriculum revisions, staffing changes) and who is affected. Describe how those changes affect the institution's capacity to implement IPE and suggest the ideal time for implementation. Point out that your program is a collaborative effort involving multiple, if not all, academic departments to emphasize that many students will benefit from the program. Gaining the approval of senior leaders will be integral to the success of your program and enable it to be an established part of your institution.

Will your institution provide sufficient staff and resources to support program development and coordination?

Whether you are trying to implement a single extracurricular event or a comprehensive curricular program, you will need financial resources, faculty support, and student time. For long-term success, it is important to assess the willingness of your institution to support culture change and the willingness of institution leaders to allocate resources to the initiative. Administrative recognition of the value of IPE is essential for sustainability because coordinating IPE programs can be labor-intensive for faculty champions who must also meet other job responsibilities. Faculty efforts are needed in the preceding preparatory work, activity facilitation, and for grading or evaluation.

Senior leaders will need to understand the program requirements, such as facilitator training and regular meetings among the coordinators. If you are seeking assistance in recruiting personnel, be specific about what you are looking for. You can also seek external funding; however, this will most likely be more viable once the program has begun and you can demonstrate its impact. There are public and private grant agencies that welcome applications for interprofessional education, practice, and research efforts (Brashers et al., 2015). More resources can increase faculty engagement and institutional support.

Building Your Team:

Have you assembled a working group of adequate size with faculty representation from all professions that you intend to include in programming?

Working groups should include faculty who have influence on their departments' curricula and student schedules in order to accommodate IPE activities. They will need to promote and champion IPE and CP in their own departments to enact larger culture and behavior changes in everyday practice. You can seek support from senior leaders in referring you to talented individuals who are advocates of teamwork and who have flexibility in their schedules. Leaders may be aware of similar programs or individuals at your institution who have similar interests or may already be implementing an interprofessional program or safety and quality initiative with whom you could partner.

Have you identified a sufficient number of faculty and clinicians who are adept in IPE competencies to serve as instructors for your activities?

As for faculty facilitators, they will need to be familiar with IPE competencies (teamwork, values/ethics, roles/responsibilities, and communication), have respect for other professions, and have presentational skills (Steinert, 2005). The facilitation group, similar to the working group, will need flexibility in scheduling and should be comprised of a variety of professions to provide profession-specific coaching to students during the activities. Facilitators should be willing to be trained in collaborative practice concepts and skills. For deeper engagement, they should be part of the development or customization of the IPE activity at your institution.

Have you organized faculty development activities for interested leaders, faculty, and staff to increase their knowledge of IPE and engage in discussion of how to incorporate IPE into their teaching and practice?

Students will follow their faculty's example. If your institutional leaders and calendars support it, interprofessional learning for faculty members is as valuable as activities for students. Faculty who are trained in teamwork and collaboration are able to integrate them into coursework and into practice (Steinert, 2005). No national standards or competencies exist at this time for faculty training purposes, yet there are supported resources available on the online resource exchange of the National Center for Interprofessional Practice and Education. (If faculty learning is supported by institutional leaders, it may be easier to determine a convenient time for interprofessional faculty to meet.

Program Development:

Have you reviewed all professions' academic calendars and curricula to determine the best positioning of IPE programs?

As mentioned before, finding consistent scheduling availability among students of different professions can be one of the largest barriers to a successful program. In the organizational matrix of higher education faculty, back-and-forth conversations among departments may be required to determine event dates; selecting one individual responsible for ensuring a date is reached may be helpful. There may be protected times or agreed-upon times when multiple degree programs do not schedule classes, enabling students to attend other activities. When there is support for IPE as curricular activities, it is essential to convene a working group or committee of faculty from each profession for coordination. Group members can speak to the IPE accreditation requirements of their specific degree programs to ensure IPE activities benefit all.

Have you developed interprofessional curricula including classroom learning, clinical observation/practice, and/or simulation activities?

Institutions beginning IPE for the first time should begin with one or two pilot programs that can be developed into a larger curriculum of activities. Once your working groups and facilitators are selected, involve them in this program development. They can assist in identifying existing courses where IPE can be incorporated. **Section 3** of this toolkit includes in-depth activity descriptions to assist in program development.

Sustaining Your Program:

Will your institution allow time and revise curricula in order for learners to attend IPE trainings?

Your initiative will likely start out as a single activity and then may progress into an array of activities as a part of core learning with a central staff and budget for IPE coordination. Progressing from disjointed IPE activities to a standardized curriculum will involve faculty members prioritizing IPE as a core aspect of nursing education. To ensure IPE is seen as relevant to student learning, there should be a structure in place for periodic review of programming to ensure it is aligned with priorities in nursing and has measurable impact on student practice. Sharing the findings with curriculum committees to continually reinforce the importance of IPE is recommended.

Have you developed an evaluation process for programming?

A structure for rigorous analysis should be created to maintain high quality programming and to gain positive attention from academic leaders. Develop a system to map activities to

competencies and learning objectives. The four core competency domains for interprofessional collaborative practice, values/ethics, roles /responsibilities, and teamwork and communication can serve as a framework to formulate competencies for a local program. Local competencies should also be inclusive of the priorities of the local institution and curricular needs.

Have you developed the appropriate structure to revise and improve programming?

Successful IPE programming and organizational culture changes require ongoing evidence-based intervention. Develop ways to measure the effectiveness of the program and a process for implementing changes and capitalizing on new opportunities (AHRQ, 2014b). Section 4 is on evaluation and will give more information about measurement tools.

Will your institution be able to reinforce and reward positive teamwork behaviors and improvements in process?

If evaluation associates your IPE program with a positive impact on individuals and the institution, the findings should be publicized to reinforce culture change, increase buy-in, and as an incentive for participating. To build upon that incentive, faculty could be rewarded during promotion processes with money or release time.

PULSE CHECK

Take a few minutes to consider how ready your local environment is for IPE programming. What areas need more attention to make an intervention successful?

SECTION 3: Activity Session Guides

Once you clearly identify your local needs and determine what resources can be directed toward program development, establish program goals that describe the overall learning outcomes. Program objectives should be mapped to curricula, accreditation standards, and core competencies and be able to be demonstrated. The following chart is an example of learning objectives mapped to the IPEC core competencies for a clinical IPE activity.

Sample Learning Objectives & Core Competencies for Educational Clinical Activities

Learning Objectives	Core Competencies
1. Describe the roles of interprofessional team members in a clinical setting.	Values/Ethics Roles/Responsibilities
2. Participate as a member of an interprofessional team to develop a patient-centered plan of care.	Team and Teamwork
3. Demonstrate interprofessional communication skills during a team-based clinical experience.	Interprofessional Communication
4. Discuss how to apply patient-centered interprofessional principles in clinical settings.	Interprofessional Communication Team and Teamwork

3.1: Develop Program Type and Objectives

This section includes descriptions of IPE programming with tutorial descriptions, learning tools, and best practices that worked successfully during programs run at a mid-sized, urban, private academic medical center. The following activities accommodate, or can be accommodated, for all levels of nursing education and access to clinical partners. The activities are diverse in their format, level of access to clinical partners, and nursing education level. The four activity types are: Didactic, Simulation, Clinical Observation, and Clinical Practice. Please feel free to use all or portions of the sessions outlined.

Didactic Learning: Didactic activities involve an instructor educating participants in lecture or discussion form with the goal of introducing team-building skills and the rationales behind collaborative, team-based, patient-centered care. This is where students gain the essential foundational knowledge that they will rely on in simulation and practice scenarios. Didactic

activities are enhanced by an interprofessional student audience, which makes discussion richer and more diverse. They may be mapped to curricula of the different professions, which could facilitate the gathering of multiple professions more easily. Because these are introductory courses and possibly the first opportunity for students to interact with students from other professions, this learning type benefits from initial ice-breaker activities that help students develop rapport with one another and feel comfortable joining discussions (Bridges et al., 2011).

Simulation: Simulation is an activity that involves the imitation of patient care and health care team interactions. It was originally developed in the aviation industry to ensure that all personnel were well acquainted with safety and emergency protocols (Sharma, Boet, Kitto, & Reeves 2011). Simulation involves the use of human participants, manikins, or virtual representation. Human participants may be trained actors who specialize in simulation work, faculty or clinicians, or students. High-fidelity simulators or manikins, if available, can be advantageous because they don't require volunteer time or paid time from human participants. Your selection will likely depend on having financial resources available to purchase costly simulators and/or pay actors, as well as the availability and presentation ability of faculty. Some may find it preferable to use student volunteers as participants as that approach directly involves students in the simulation and has no cost. Visit the NLN's interactive Simulation Innovation Resource Center (SIRC) for resources on simulation activities.

Clinical Observation: Students observe existing interprofessional team interactions in a clinical setting. Clinical experiences allow students to develop more comprehensive understandings of the impact and management of chronic diseases and other patient conditions. George Thibault, president of the Macy Foundation, encourages clinical experiences that are frequent, immersive, and community based as those experiences lead to the students' ability to have meaningful experiences, develop relationships with practitioners and patients, and have greater impact on the environment (Thibault, 2013).

Clinical Practice: Clinical practice activities take place in hospital or other acute care settings. Students actively participate in a team-based clinical learning activity. The educational benefits of clinical practice are similar to those of clinical observation in terms of the impact of exposure to teams in practice. In addition, clinical practice allows students to experience relationship-building with patients and to practice behaviors in actual practice. In its 2013 report, the Macy Foundation recommends forming stronger coalitions between education and clinical practice through new and creative solutions (Macy, 2013). If nurses are expected to perform in team-

based practice settings, nursing students must be able to interact with and prepare in these environments during the pre-licensure education stage.

Note: The following section refers to the learning participants in the activities as students for the sake of selecting a consistent, inclusive term. It is not intended to suggest that these activities are only for those individuals who are enrolled in an academic program who are not currently practitioners. These types and examples of IPE programs were chosen because they are educational opportunities beneficial for both future and current health professionals.

PULSE CHECK

Take a few minutes to make a list of the knowledge, skills, and attitudes you want students to gain from an IPE activity. Develop learning objectives from this list and incorporate each aspect into your activity.

This next section includes detailed examples of the four different formats of IPE and CP learning:

1. Didactic 2. Simulation 3. Clinical Observation 4. Clinical Practice

Didactic Exemplar #1:

Activity Exemplar Title: IPE Grand Rounds

- **Type of Activity:**
  Didactic (circled) Simulation Clinical Observation Clinical Practice

- **Purpose of Activity:**
  The purpose of IPE Grand Rounds is to increase student exposure to existing collaborative practice teams. Early exposure to concepts of interprofessional teamwork leads students to seek out new additional opportunities to further their understanding of interprofessional teamwork in clinical settings. This description of Grand Rounds assigns coordinating responsibilities to student leaders as an opportunity to engage students in a meaningful way.

- **Learning Objectives:**
  - Define the roles and expertise of professionals represented on the panel team
  - Identify the benefits of working on an interprofessional collaborative practice team
  - Describe the challenges related to working on an interprofessional collaborative practice team

- **Target Audience and Maximum Number of Participants:**
  Various student professions: Nursing, Bioscience Technologies, Medicine, Occupational Therapy, Pharmacy, Physical Therapy, Radiological Sciences, etc.; also could include non-health-related student professions; maximum number of students should be determined by room size

- **Description of the Activity:**
  With support from the coordinating faculty or staff, a group of interprofessional student leaders hosts the activity. The students recruit a clinical team to be featured panelists in an IPE Grand Rounds. The clinical team should be comprised of various professions. During the activity, the student leaders begin by describing the sequence of events and introducing the members of the practice team. The practice team then presents a patient case. The panelists describe the role their professions played in the case, demonstrating how the patient benefited from each profession's perspective. They also highlight what systems or methods were put in place to facilitate standards of teamwork, such as shared agenda setting, mutual understanding, and consensus making, within the team. The topic of the Grand Rounds could be a particular patient case or it could be a common scenario (e.g., breaking bad news) or one aspect of care (e.g., cultural competency in care). After the case and panel discussion, there is a question-and- answer session with the students, moderated by the student leaders.

- ✓ **Timeline of Activity:**
  - o 5-minute introduction – by student leaders
  - o 10-minute case study – by practice team
  - o 15-minute team presentation – by practice team
  - o 25-minute interactive panel discussion – by practice team and moderated by student leaders
  - o 5-minute post-survey – by students (as needed)

- ✓ **Activity Duration:**

  1 hour

- ✓ **Pre-Work for Students:**

  Students should prepare by completing the pre-reading article pertaining to the profession being featured. The article should be determined by a student leader.

- ✓ **Coordination Needs:**

  Prior to Event:
  - o Determine activity date and reserve room that can accommodate students and a table for panelists
  - o Order A/V equipment, if recording (e.g., projector, microphones)
  - o Recruit the team of student coordinators and recruit a clinical team as your panelists **Done by student coordinators**
  - o Orient panelists to activity and set expectations
  - o Obtain consent from clinical team for videotaping (if seeking to record the event) **This can be helpful for use in future presentations and didactic activities*
  - o Order any food or other supplies for event (as needed)
  - o Advertise the event to students and gather a list of students planning to attend
  - o Student leaders select pre-reading materials and email to student participants
  - o Email students an event reminder with date, time, and location close to event date
  - o Print attendance sheet to track student participation as desired

  During the Event:
  - o Ensure room meets all facility needs
  - o Prepare and disperse attendance sheet (as desired) and evaluations to students
  - o Collect post-surveys

  After the Event:
  - o Email panelists thanking them for their participation
  - o Analyze survey data (as needed)

- ✓ **Facility Needs:**

  Tables, chairs, microphones, projection equipment, audio visual equipment needs for slides and if recording the activity

IPE Grand Rounds: Guidelines for Recruiting Panelists

- IPE programs require support from senior organizational leaders to be sustainable and fully integrated (Brazeau, 2013). Senior leaders may be able to suggest specific clinical teams or facilities to ask and their support may be a motivating factor for practice teams to fit the activity into their busy schedules.

- To supply more motivation for practice teams to participate, describe the potential benefits of the panel experience for the practice team and clearly define the benefits for the students to observe and interact with practitioners in this format. Student learning needs could be described through data from a needs assessment or a description of how the activity fulfills curricular requirements (Dahlstrom, Dorai-Raj, McGill, Owen, Tymms & Watson, 2005).

- In selecting the topic of the Grand Rounds, consider curricular needs of the students and you can consult the practice team to see if they have topic suggestions. If you desire the activity to occur on a regular basis, you might consider variation in types, composition, and practice setting as well.

Didactic Exemplar #2:

Activity Exemplar Title: SBAR Module

✓ **Type of Activity:**
(Didactic) Simulation Clinical Observation Clinical Practice

✓ **Purpose of Activity:**
The purpose of this activity is to learn the value of standardized communication in a clinical setting and gain competency in the SBAR technique for transferring information. Handoffs and communication skills are important for all clinicians to improve patient safety. Different professional cultures and expectations between health professions can cause breakdowns in communication. Communication problems are the primary cause of approximately two thirds of all reported sentinel events (JCAHO, 2002). Standardized communication tools help professionals to better understand each other's concerns and expectations during exchanges. In this session, students will learn one standardized communication tool, SBAR, and practice hand-off communication scenarios.

✓ **Learning Objectives:**
- Identify the benefits of standardized communication among different health professions
- Recognize opportunities to utilize the SBAR method in patient care
- Apply the SBAR method in hand-off communication scenarios

> **What's SBAR?** SBAR is a communication tool that creates a shared mental model for effective information transfer by providing a standardized structure of concise, factual communications among clinicians. SBAR stands for:
>
> **S** – Situation: *What is happening at the present time?*
>
> **B** – Background: *What are the circumstances leading up to this situation?*
>
> **A** – Assessment: *What do you think the problem is?*
>
> **R** – Recommendation: *What should we do to correct the problem?*

✓ **Target Audience and Maximum Number of Participants:**
Various student professions: Nursing, Bioscience Technologies, Medicine, Occupational Therapy, Pharmacy, Physical Therapy, Radiological Sciences, etc.; maximum number of students will be determined by room size

✓ **Preparation for the Activity:**
Presentation: Develop a PowerPoint presentation giving a brief background of communication breakdowns as a root cause of medical errors, specifically highlighting the Joint Commission's several national patient safety reports on communication. Explain "hand-off" communication and nursing standards for the exchange of information, such as change of shift report or patient transfer. Define SBAR and its evidence-based background in high-risk industries. Find a short video demonstration of SBAR in practice; many examples can be found online.

Handout: A handout on SBAR could be a useful tool for students to reference during the activity. You can create or adapt one from online resources.

Case Scenarios: Create case scenarios of patients in need of some kind of intervention, briefly describing relevant medical background as well as the patient's current health status including vital signs. Designate roles for two participants in each scenario, one person who needs to relay the patient situation and the other who needs to receive the patient information to continue or initiate a treatment. Depending upon the audience, the scenarios should relate directly to hand-off situations between the health professionals in the audience.

Group Assignments: Once the student attendance list is finalized, divide students into small groups. Ensure each small group is diverse in the health professions represented.

✓ **Description of the Activity:**
This session includes a PowerPoint presentation with background studies on communication and safety, an overview of SBAR, a depiction of SBAR in practice, a small group session to practice the SBAR technique, and a large group final discussion.

- *Presentation:*

Show the PowerPoint presentation on the importance of strong communication in health care and the meaning of SBAR. Following the presentation, show a video demonstration of SBAR being utilized in a practice setting

- *Small Group:*

Students break into small groups to role-play various scenarios. Advise students that they should take turns being the speaker and the listener and they can add information to the scenario if needed. Students can refer to the SBAR handout as a guide. They should begin all communications with two identifiers, such as "This report is about Bob Henry, DOB 2/25/60." They should end all communications with "What questions do you have for me?" and "I am here until (insert time). If you have any questions later, call (phone number) and ask for me (insert name)." Before the scenarios begin, the instructors should role-play a scenario to model what is expected of the students.

- *Large Group Discussion:*

<u>Example Questions for Large Group Discussion:</u>
– *What was the process using the SBAR technique like?*
– *What did you learn about interprofessional collaboration?*
– *Ask students to share a personal example of interprofessional communication that could have been positive or negative. Relate the positive and negative examples to SBAR and improved communication techniques and the potential effect on patient safety.*
– *What are the barriers and facilitators to effective communication that you have experienced or perceive?*

✓ **Timeline of Activity:**

- 20-minute presentation – by faculty facilitators
- 15-minute small group – by students
- 20-minute large group discussion – by faculty facilitators and students
- 5-minute post-survey – by students (as needed)

- ✓ **Activity Duration:**
  1 hour

- ✓ **Pre-Work for Students:**
  The students should prepare by reviewing the PowerPoint presentation.

- ✓ **Coordination Needs:**
  Prior to Event:
    - Determine event date with faculty coordinators and reserve an appropriate room for desired number of participants
    - Recruit faculty instructors to deliver the presentation and facilitate the role plays
    - Collaborate with the faculty instructors to complete the preparatory work
    - Advertise the event to students and gather a list of students planning to attend
    - Order any food or other supplies for the event, including A/V (as needed)
    - Email students an event reminder with date, time, and location close to the event date
    - Print SBAR handouts for students and an attendance sheet to track student participation, as well as an evaluation for the activity

  During the Event:
    - Ensure room has A/V equipment set up for the presentation
    - Disperse SBAR handouts and any evaluations or other materials to students and assign group numbers
    - Collect post-surveys (as needed)

  After the Event:
    - Email faculty instructors thanking them for their participation
    - Analyze survey data (as needed)

- ✓ **Facility Needs:**
  A/V equipment for PowerPoint presentation, chairs

SBAR Module: Resources for SBAR Presentation Development

- Arizona Patient Safety Initiative toolkit developed by the Arizona Hospital and Healthcare Association
- The didactic learning resources on the Jefferson Center for Interprofessional Education

Simulation Exemplar #1:

Activity Exemplar Title: Teamwork Skills Simulation

✓ **Type of Activity:**

Didactic Simulation (circled) Clinical Observation Clinical Practice

✓ **Purpose of Activity:**

The purpose of this simulation-based learning activity is for students to learn critical components of collaborative practice and patient-centered care using the TeamSTEPPS® framework, developed by the Agency for Healthcare Research and Quality (AHRQ), and practice applying those components in simulated scenarios (AHRQ, 2015b). AHRQ developed an "evidence-based teamwork system" aimed at improving communication and teamwork skills to prevent medical errors and enhance patient safety. The key principles and communication tools (accessible on the online TeamSTEPPS 2.0 Essentials Course) pertain to communicating critical information, mutual support among team members, effective leadership of and within the team, and situation monitoring, with an overall goal of patient safety. By facilitating a safe environment where students can practice these skills, this simulation activity helps reinforce the tools and helps students maintain the skills in their own practice.

✓ **Learning Objectives:**

- Describe critical components of collaborative practice, person-centered care, and patient safety
- Recognize opportunities to apply TeamSTEPPS strategies and tools in patient care
- Apply the principles essential for effective teamwork in simulated scenarios

✓ **Target Audience and Maximum Number of Participants:**

Various student professions: Nursing, Bioscience Technologies, Medicine, Occupational Therapy, Pharmacy, Physical Therapy, Radiological Sciences, etc.; maximum student number determined by number of simulation facilitators and room size

✓ **Preparation for the Activity:**

Case Scenarios: For this activity, develop clinical patient scenarios requiring students to evaluate each patient's condition and how to begin treatment. The overall purpose of the scenarios is to supply the students with a safe, facilitated environment in which they can practice teamwork skills rather than solve a complex medical case. For this reason, the cases should be more rudimentary and one-dimensional so attention can be given to the teamwork skills. These scenarios can also be customized to the different professions represented by the participants. For instance, if the group has many nursing or medical students, the case could involve an asthma attack. If the group has many occupational therapy students, the case could involve a fall and injury.

Supplies: Secure the proper materials and tools for the different cases, such as a nebulizer or inhaler, O2, Peak Expiratory Flow meter, BP cuff, and stethoscope for an asthma attack case.

Handouts: Glossary of Terms for TeamSTEPPS skills (enough copies for each student), slide sets, case scenarios (three copies of each, for the facilitator, the volunteer patient, and the student group)

Simulation Group Division: Once you have the final list of students who enrolled in the activity, divide them into small groups of 4-5 participants, ideally with an interprofessional mix in each. This is for the simulation portion of the activity.

✓ **Description of the Activity:**

- *Didactic Presentation:*

Students should be given the handouts beforehand so they can familiarize themselves with the language. To begin, an instructor will present the TeamSTEPPS framework via PowerPoint and video demonstration. It is recommended to have multiple interprofessional instructors and facilitators to model the interprofessional collaboration you are teaching. Resources for the PowerPoint and video demonstrations can be accessed on the AHRQ's website, There are also many engaging videos online (e.g., KLM Crash of the Century, Captain Sully Sullinberger landing a plane on the Hudson River, Steve Martin's "The Tale of Two Brains") that can be used to further engage students.

Here are some examples of TeamSTEPPS communication tools and leadership skills:
– Hand Off, the transfer of information during transitions in care with an opportunity to ask questions, clarify, and confirm
– Check-Back, using closed-loop communication to ensure information is received as it was intended by the sender
– Debriefing, a way to review team performance, the informal information exchange session with reflection on lessons learned and reinforcement of positive behavior

- *Simulations:*

After the presentation, the students should split up into the simulation groups you assigned them. Students will be able to interact with each other to assist in the care of a simulated patient. There should be one facilitator per group and one case per facilitator. The facilitators have separate rooms. The small student groups will spend a total of 15 minutes in each room and then rotate between the rooms role-playing each scenario. In each scenario, one student is designated the patient. The facilitator prepares the student patients by describing their symptoms and behaviors and how they should react to the various treatment methods that the students may attempt. The rest of the student group makes up the care team, each representing a professional from their own profession. While the facilitator is prepping the patient, members of the care team should review the case and coordinate with each other, designating roles and assigning tasks. The care team should also review the Glossary of Terms considering which teamwork strategies would be helpful in this case.

The facilitators should have gathered before the event to review the timing of these small group scenarios so that each group starts and ends at the same time for Simulation #1. The facilitator will signal for the simulation to start, the patient will enter exhibiting his/her symptoms, and the care team will begin assessing and treating the patient using the supplies provided. The facilitators will monitor student interactions and, if need be, guide students in applying teamwork strategies in practice. Allow the scenario to play out for approximately 3-5 minutes and then have a short small group debriefing for the remainder of the 15-minute block of time. Once the first 15- minute block is over, all students groups will rotate to the next room to begin Simulation #2. Facilitators will conduct this second round of the scenario the same way it was conducted with the first student group. Students will rotate once more for Simulation #3. If, because of larger student numbers, there are more than three scenarios, it is okay if students only

experience three of the cases in the interest of time.

Example Discussion Questions for Small Group Debriefing:
– *What worked well here? What didn't work so well?*
– *Which TeamSTEPPS skills did you utilize in this scenario? How did it go?*
– *How did it feel working in a team? Was it hard to coordinate?*
– *Did you see other opportunities to use TeamSTEPPS skills that didn't occur?*
– *Did anyone in the group do a particularly nice job utilizing the skills? How so?*

- *Final Reflection:*

Once students complete their last case role play, a final full group debriefing will enable participants to reflect on the activity and the efficacy of using TeamSTEPPS in clinical practice together. Students may have questions about certain strategies and facilitators should be ready to role-play them for clarification.

Example Discussion Questions for Final Reflection:
– *Now that you have completed the role plays, how do you see TeamSTEPPS skills coming in handy in your future practice?*
– *Do you believe there is a need for these skills in your practice?*
– *Are there any skills in particular that you intend to use after today? Why?*
– *What are potential barriers to strong communication in the clinical setting?*

Timeline of Activity:

- 5-minute introduction – by instructor(s)
- 30-minute TeamSTEPPS orientation & video demos – by instructor(s)
- 15-minute simulation #1 & small group debriefing (2-min prep, 5-min scenario, 8-min debriefing) – by group facilitators
- 15-minute simulation #2 & small group debriefing – by group facilitators
- 15-minute simulation #3 & small group debriefing – by group facilitators
- 20-minute large group debriefing – by instructor and group facilitators
- 5-minute post-survey – by students (as needed)

✓ **Activity Duration:**
2 hours

✓ **Pre-work for Students:**
Students will prepare by reviewing the Glossary of Terms and PowerPoint presentation.

✓ **Coordination Needs:**
Prior to Event:

- Develop team training PowerPoint. If using TeamSTEPPS materials, it is suggested that you and faculty instructors complete TeamSTEPPS Master Training, either in person or online.
- Develop a Glossary of Terms as a reference tool for students
- Determine event date with faculty coordinators and reserve rooms
- Recruit faculty instructors to deliver the presentation and facilitate the simulations
- Work with the faculty instructors to develop the simulation scenarios, taking interprofessional objectives into consideration
- Gather materials needed for the simulations; faculty may be able to assist as well as any simulation support staff at your institution
- Advertise the event to students and gather a list of students planning to attend
- Order any food or other supplies for event (as needed)

- Email students an event reminder with date, time, and location close to event date
- Print Glossary of Terms for students and attendance sheet to track student participation

During the Event:

- Ensure main room meets all presentation and simulation #1 needs, including medical materials
- Ensure other rooms meet needs for other simulations, including medical materials
- Disperse Glossary of Terms to students
- Collect post-surveys (as needed)

After the Event:

- Email faculty instructors thanking them for their participation
- Analyze survey data (as needed)

✓ **Facility Needs:** Rooms for presentation and multiple simulation scenarios, projection screen, chairs, medical supplies for case scenarios

Simulation Exemplar #2:

Activity Exemplar Title: Emergency Training

✓ **Type of Activity:**

Didactic ~~(Simulation)~~ Clinical Observation Clinical Practice

✓ **Purpose of Activity:**

The purpose of this activity is to provide students an opportunity to practice patient-centered and team-based care in a simulated emergency environment. Students apply selected skills and cope with multiple stressors while learning how to manage emergency situations.

✓ **Learning Objectives:**

- Discuss the importance of emergency preparedness
- Identify the roles of different health professionals and lay people in dealing with an emergency situation
- Recognize opportunities to utilize emergency preparedness skills in emergency situations
- Apply emergency preparedness skills to deliver high quality patient care

✓ **Target Audience and Maximum Number of Participants:**

Various student professions, both health related and non-health related; maximum student number determined by room size and the simulation capacity.

✓ **Preparation for the Activity:**

Training Presentation: This activity involves an element of surprise as the students are brought to the activity under the pretense of training or a meeting, unaware that they are about to do an emergency simulation. The first step is to determine the skill or knowledge you want the students to put into practice during the activity. Specific examples include general emergency management training, teamwork skills, such as conflict management, or a protocol for wound care or heart failure. Develop a training presentation on the topic.

Emergency Environment: Then, determine the emergency environment. The idea is for the students to have to immediately put the skill or protocol into practice following the didactic presentation during an emergency simulation. The environment can be as complex or simple as you desire. An example of a complex environment is an explosion at a public event or shopping mall with many injured patients and limited medical supplies on hand. A simpler example is a patient in an exam room experiencing cardiac arrest. *If your institution doesn't have access to resources to create an emergency environment, consider doing role-play without a simulated environment following the training presentation.*

Simulation Materials: Determine if you want to use manikins or live actors to play the simulated patients. Based on the emergency scenario you select, gather the supplies needed. Supplies could include theatrical elements, such as artificial blood, a fog

machine, or debris, and medical supplies such as a stethoscope, sling, ice packs, inhaler, and medications.

Simulated Patient Scenarios: Develop patient scenarios for the emergency environment requiring students to evaluate each patient's condition and how to treat him/her. The patient scenarios should be customized to the different professions represented among the participants and to the number of participants. Also, if your institution does not have access to students of multiple health-related professions, this activity is an opportunity to partner with non-health-related professions for general disaster preparedness skills. Example patient conditions include a twisted ankle, a fractured forearm, hypoglycemia in a diabetic, and asthma attack in a known asthmatic. Incorporate elements that beg for the skill or protocol to be utilized to ensure students are focusing on it, in addition to handling any other simulation factors.

✓ **Description of the Activity:**
As is evident from the learning objectives, this activity can be versatile for various learning needs. For the sake of conciseness, this activity description uses teamwork skills and an explosion in a shopping mall as the example skill and example emergency location.

- *Training Presentation:*

A facilitator presents the training to the students. Simultaneously, the simulation environment is being set up in a different room that is hidden from the students' view to maintain the element of surprise. Toward the end of the presentation, an actor enters the room to alert the students of the simulated emergency and set the scene. The actor could play the role of a firefighter who enters and says, "We need your help! You are now in a shopping mall and there has been an explosion and there are injured people in the room next door who need medical attention! For your safety, you will not be able to leave the room. Also, there are no medical supplies beyond what is present in the room. Please follow me and disperse yourselves among the injured."

- *Simulation:*

The students then file into the simulation room, which has been furnished to look like a disaster (use of fog machine, ceiling debris on the ground). There are simulated patients on gurneys with various injuries or ailments around the room and medical supplies in the room are visible. The students will look around the room and divide themselves among the patients. Ideally, If there are enough faculty members, each patient will be accompanied by a faculty facilitator who is there to observe and offer guidance to the students that he/she deems necessary. The students should take stock of each other's professions and start working together to treat the patients. Team roles may be determined, such as team lead, assistant who gathers the necessary medical supplies, etc. Some students may wander between patients observing and trying to determine where their skills are best utilized. Once the simulations are under way, a simulated paramedic announces that one ambulance has arrived and that the students need to determine which patients are in the most acute condition. At this point, the students should begin the shared decision-making process and begin communicating across the room about each patient's condition. A patient is taken away in an ambulance once the group has reached consensus. The simulations finish once all patients are treated.

- *Small Group Debriefing:*

A facilitator then calls for the simulation to end and all students should stop treating patients. Students should remain at their patient stations and debrief initial reactions to the simulation experience with their facilitator. If the simulated patients are live actors, they can also contribute to the conversation by discussing their satisfaction with or observations about the team dynamics and problem-solving abilities of the students who treated them.

- *Large Group Debriefing:*

All of the students then gather as a large group, perhaps in the original training room, for a more thorough debriefing and reflection with faculty facilitators.

Sample Discussion Questions for Students:

- How did you address issues around communication and safety during the scenario?

- How did your team work together? Did you feel mutual support? Was there a team leader?

- What communication or teamwork skills did you use to communicate with one another?

- To the team leaders: Can you walk us through the thought process around the medical management of your patient?

- What might you do differently next time?

What are two to three main takeaways from this scenario?

✓ **Timeline of Activity:**
- 60-minute training presentation – by facilitators
- 30-minute emergency simulation – by simulated patients and facilitators
- 5-minute small group debriefing – by facilitators
- 20 minute large group debrief – by facilitators

✓ **Activity Duration:**

2 hours

✓ **Pre-Work for Students:**

Variable based on the training presentation, could include readings or reviewing a PowerPoint presentation for the didactic portion of the program.

✓ **Coordination Needs:**

Prior to Event:
- Recruit faculty members to be facilitators and simulation specialists to help construct the emergency situation.
- Determine event date and reserve two rooms, for the training and the simulation.
- Develop training presentation, emergency environment, and simulated patient scenarios.
- Gather materials needed for the simulation; faculty as well as simulation support staff at your institution may be able to assist.
- Advertise the event to students and gather a list of students planning to attend
- Order any food or other supplies for event (as needed)
- Email students an event reminder with date, time, and location close to event date. In your communication with students prior to the event, leave out information about the emergency simulation to maintain the element of surprise.
- Print any handouts for students and attendance sheet to track student participation (as needed)

During the Event:

- Ensure training room meets all presentation needs, including appropriate A/V equipment
- Set up the simulation environment and place out all materials and medical supplies.
- At the appropriate time, signal the simulated firefighter to enter the room and make his announcement to begin the simulation.
- Assist students as necessary.

After the Event:

- Break down the simulation room.
- Email all faculty facilitators and simulation support staff thanking them for their participation.

✓ **Facility Needs:**

Set-up materials for training room and simulation room

Clinical Observation Exemplar #1:

Activity Exemplar Title: Dispo Dilemma

- **Type of Activity:**
  Didactic Simulation Clinical Observation (circled) Clinical Practice

- **Purpose of Activity:**
  The purpose of this clinical observation is to increase student exposure to real patient discharge cases and explore the challenges, behaviors, and team-based solutions that improve the quality and safety of patient-centered care.

- **Learning Objectives:**
  - Describe the roles and expertise of different health professionals on a rehabilitation medicine team
  - Identify the benefits of and challenges related to working on an interprofessional collaborative practice team
  - Analyze different options for patient discharge and the role each profession plays in determining patient discharge location

- **Target Audience and Maximum Number of Participants:**
  Various student professions: Nursing, Bioscience Technologies, Medicine, Occupational Therapy, Pharmacy, Physical Therapy, Radiological Sciences, etc.; maximum student number determined by pedagogy and room size

- **Description of the Activity:**
  Discussion facilitators will present a brief history of the present illness (HPI) to familiarize participants with the patient. The members of the clinical team will then discuss an unfolding case study involving a patient in need of rehabilitation treatment. Each profession describes their role in the case from the time the patient begins treatment until the patient is discharged with a rehabilitation plan. During the discussion, the facilitators periodically ask questions of the student participants about diagnoses, treatment plans, etc. Students witness and evaluate firsthand the potential dilemmas and solutions related to the case under the direction of the appropriate practitioners.

- **Timeline of Activity**
  - 5-minute introduction – by facilitators
  - 10-minute case introduction – by facilitators
  - 40-minute case discussion – by practice team (with student input and questions)
  - 5-minute post-survey – by students (as needed)

- **Activity Duration:**
  1 hour

- **Pre-work for Students:**
  Students should prepare by reading the HPI, familiarize themselves with the key words, and prepare questions regarding the case. Coordinating staff should email the HPI and key terms to the students attending beforehand.

- ✓ **Coordination Needs:**

  Prior to Event:
  - Determine date with faculty coordinators
  - Recruit rehabilitation practice team
  - Reserve room that can accommodate 20-30 students plus the practice team members, preferably within the practice team's department
  - Orient practice team to activity and ensure 1-2 team members are designated as discussion facilitators
  - Order any food or other supplies for event (as needed basis)
  - Advertise the event to students and gather a list of students planning to attend
  - Practice team selects patient case
  - Email HPI of patient to students
  - Email students an event reminder with date, time, and location close to event date
  - Print attendance sheet to track student participation

  During the Event:
  - Ensure room meets all facility needs
  - Collect post-surveys (as needed)

  After the Event:
  - Email practice team thanking them for their participation
  - Analyze survey data (as needed)

- ✓ **Facility Needs:**

  Tables, chairs

Clinical Observation Exemplar #2:

Activity Exemplar Title: Shadowing a Health Care Professional

- ✓ **Type of Activity:**

  Didactic Simulation Clinical Observation (circled) Clinical Practice

- ✓ **Purpose of Activity:**

  The purpose of this learning activity is for students to have the opportunity to observe a health care provider from a profession other than their own to develop an increased understanding of the role and expertise that each profession brings to achieving a patient/client's health care goals. The shadowing experience may provide students with an opportunity to see how this health provider interacts with other team members and utilizes effective communication skills and tools for collaborative practice.

- ✓ **Learning Objectives:**
  - Describe the unique role, responsibilities, and expertise of a health profession other than your own
  - Recognize factors that contribute to successful teamwork in practice settings
  - Identify 2-3 ways that the observed health care provider works to collaboratively assess, plan, and/or provide treatment for his/her patients/clients

- ✓ **Target Audience and Maximum Number of Participants:**

  Various student professions: Nursing, Bioscience Technologies, Medicine, Occupational Therapy, Pharmacy, Physical Therapy, Radiological Sciences, etc.; maximum student number determined by number of health providers participating, but the ratio should be one-to-one during each shadowing session.

- ✓ **Description of the Activity:**

  Each participating student is matched with a health care provider from another profession for a shadowing session. Students should observe the role/responsibilities, person-centeredness, communication skills, and team interaction of this provider during the clinical experience. Student should spend a few minutes debriefing with the provider and/or their preceptor after the session.

- ✓ **Timeline of Activity:**
  - 2-3 hours shadowing – by students (of provider)
  - 20 to 30-minute debriefing – by provider or preceptor with students

- ✓ **Activity Duration:**

  Approximately 2½ to 3½ hours

- ✓ **Pre-Work for Students:**

  The students should prepare by reading an article related to shadowing clinical providers. One example of an appropriate article is:

  Wright, A., Hawkes, G., Baker, B., et al. (2012) Reflections and unprompted observations by healthcare students of an interprofessional shadowing visit. *Journal of Interprofessional Care, 26*, 305-311.

- ✓ **Coordination Needs:**

  Prior to Event:
  - Coordinate with a clinical facility to find health care providers willing to have students shadow them for a portion of a day, ensuring the providers are not of the same profession as the students
  - Select a pre-reading article pertaining to shadowing clinical providers
  - Determine specific meeting locations and times that are convenient for the providers. This can be done directly by the students with their providers to save work on the part of any coordinators.

  During the Event:
  - Direction given by the providers

  After the Event:
  - Thank the providers for their participation via email

- ✓ **Facility Needs:**

  Partner facilities willing to have student observers

Clinical Practice Exemplar #1:

Activity Exemplar Title: Interprofessional Clinical Rounding

- ✓ **Type of Activity:**

  Didactic Simulation Clinical Observation Clinical Practice

- ✓ **Purpose of Activity:**
  The purpose of this learning activity is to provide a real-time, collaborative practice learning experience for health professions students and to expose them to how individual plans of care are impacted by patient-centered collaborative practice.

- ✓ **Learning Objectives:**
  - Recognize how a patient's plan of care is determined through collaboration among team members during interprofessional clinical rounds
  - Formulate a patient presentation and a recommended plan of care as members of an interprofessional team
  - Present patient assessments (e.g., collect vital signs and social and health factors) and, as members of an interprofessional team, report on patients' status

- ✓ **Target Audience and Maximum Number of Participants:**
  Various student professions: Nursing and medical students with participation from other professions, such as Bioscience Technologies, Occupational Therapy, Pharmacy, Physical Therapy, Radiologic Sciences, etc., based on the clinical team or unit participating; maximum of 5-10 students to avoid disrupting workflow

- ✓ **Description of the Activity:**
  Engage with a clinical unit where students from multiple professions regularly participate in clinical rotations, or with a team/service that is willing to partner with different professions. To begin, students conduct pre-rounds on the patients, under the direction of their preceptors/clinical instructors. During pre-rounds, the nursing students should interact with the patients, take vital signs, and check in with the nursing staff for any overnight updates. The interprofessional students then meet together in person, prior to the team rounds, to review patients' current plans of care, study results, anticipated discharge dates, and interprofessional plans for discharge. The students collaborate to create patient presentations and then join the practice team for rounding, under the direction of their preceptors/clinical instructors. Multiple student professions can be included in the rounding and should correlate with the professions that are involved in patient care within the specific team/unit. With proper security in place, there may be opportunities for some student professions to participate virtually through Skype or Google Docs if they are unable to leave their regular duties during the rounding event.

- ✓ **Timeline of Activity:**
  - 60-minutes pre-rounds and student meeting – by students, with assistance from nursing and medical clinical instructors/preceptors
  - 60-minutes clinical rounding (timing will vary based on number of patients) – by practice team and students
  - 5-minute feedback and reflection (if possible) – by preceptors/clinical instructors with students

- ✓ **Activity Duration:**
  Approximately 2 hours, depending on the number of patients

  Pre-work for Students:
  Students should prepare by meeting prior to rounds to conduct pre-rounds and review and discuss patients' current plans of care, study results, anticipated discharge dates, and interprofessional plans of care for discharge

- ✓ **Coordination Needs:**
  Prior to Event:
  - Obtain permission from a clinical team or unit to have students participate in interprofessional clinical rounding
  - Secure a point of contact from each profession with whom you can coordinate
  - Determine a date and specific location for the rounding to take place with the practice team
  - Seek out a nursing faculty member to assist in connecting the nursing students with the nurse practitioner on the unit floor for patient assignment on the day of the event
  - Coordinate with nursing clinical instructors and preceptors/medical residents for students to complete pre-rounds, conduct a meeting, and join the team on their rounds

  During the Event:
  - Direction given by the team leaders, e.g., the nurse practitioner or attending physician

  After the Event:
  - Email practice team thanking them for their participation
  - Survey the students on their satisfaction with the event and/or the ability of the activity to meet its objectives (as needed)

- ✓ **Facility Needs:**
  Determined by clinical instructors/preceptors

Clinical Rounding: Recruiting Clinical Teams for Clinical Rounding

- **Identify interprofessional clinical teams that round on their patients and have students from your academic institution already participating in clinical rotations**. These departments are ideal because a group of students is already present to participate and it will be easier to coordinate with the preceptors/clinical instructors assigned to that unit.
- When meeting with practice teams to ask them to host students during their rounds, be prepared to give **a brief presentation (1-3 minutes)** introducing the importance of IPE initiatives for students, as the clinical team may not be aware of local initiatives. Emphasize the vital importance of linking education and practice because engaging in interprofessional collaboration in real-world patient settings allows students to fully understand and retain teamwork and communication skills (Hall & Zierler, 2015).
- **Secure a point of contact**, such as one of the attending physicians, who can assist with selecting the date and exact location and can help (or designate someone else to) coordinate students when they are on the unit for rounding.

Clinical Practice Exemplar #2:

Activity Exemplar Title: Teach-Back

- ✓ **Type of Activity:**

  Didactic Simulation Clinical Observation Clinical Practice (circled)

- ✓ **Purpose of Activity:**

  The purpose of this learning activity is for nursing and pharmacy students to collaborate together on patient education using the Teach-Back method. The Teach-Back method combines health literacy principles of plain language and using Teach-Back to confirm understanding, which involves explaining information clearly to a patient and then asking the patient or family member to explain, in his/her own words, what they need to know. This is completed in a compassionate, patient-centered fashion to close the communication loop and promote adherence, quality, and patient safety. There are many online training resources on Teach-Back, such as www.teachbacktraining.com (recommended as helpful website by the Institute for Healthcare Improvement).

- ✓ **Learning Objectives:**
  - Describe the roles of interprofessional team members in a clinical setting
  - Develop a patient-centered plan of care to participate as a member of an interprofessional team
  - Discuss how to apply patient-centered interprofessional principles during a team-based clinical experience
  - Discuss the challenges presented by low health literacy

- ✓ **Target Audience and Maximum Number of Participants:**

  Nursing and Pharmacy students, 2-4 students so as to avoid disrupting workflow

- ✓ **Description of the Activity:**

  To begin the activity, the students meet with the clinical instructor/preceptor on the unit floor to gather and discuss the health assessment data and review the Teach-Back method. They then review the data in a team huddle. After the huddle, the student team conducts an oral health history with the selected patient, assessing the patient's health history, health literacy, and learning needs. The team then debriefs with the clinical instructors/preceptors to identify the appropriate medication(s) for the subsequent education session and for any additional Teach-Back coaching before gathering the appropriate teaching materials. At the scheduled time following the debriefing and collection of appropriate educational materials, the nursing and pharmacy students meet with the patient a second time. During this second interaction, they apply the Teach-Back method, working to employ appropriate strategies for effective patient-provider communication and education to ensure the patient understands the treatment plan and medication(s) fully.

- ✓ **Timeline of Activity:**
  - 20-minute Teach-Back coaching and student huddle – by clinical instructors/preceptors with students
  - 20-minute patient assessment and check-in – by students, clinical instructors/preceptors
  - 20 minute patient Teach-Back session – by students

- ✓ **Activity Duration:**
  1 hour

- ✓ **Pre-Work for Students:**
  None

- ✓ **Coordination Needs:**
  Prior to Event:
  - Determine a date and clinical location with the nursing and pharmacy clinical instructors or preceptors. A Teach-Back is most feasible when the clinical instructors/preceptors who supervise students on clinical rotations can participate. They can help select a location and a patient who would be willing and eligible to be involved.

  During the Event:
  - Check in with clinical instructors/preceptors to see if assistance is needed

  After the Event:
  - Thank the clinical instructors/preceptors for their participation and ask for any feedback they have for future sessions

- ✓ **Facility Needs:**
  Determined by clinical instructors/preceptors

PULSE CHECK

Take a few minutes to consider if any of these activities are feasible. Which seems like the best starter activity? Are any not feasible? Why, and is there anything you can do to make them feasible?

General Guidelines for IPE Activities

General Facilitation Guidelines for Practice Team Facilitators

- **Be aware of your audience**, in terms of where they are in their curricula, accreditation requirements, etc., to ensure you present appropriately for their level.

- **The purpose of this activity is to enhance learner outcomes** (D'amour & Oandasan, 2005). Your team was chosen because it demonstrates teamwork among different professions providing high quality patient-centered care. Consider your attitudes toward collaboration with team members when presenting the case and during your interactions with team members in the discussion. The case discussion should reflect shared decision-making and respect for the contributions of each profession (Hall & Zierler, 2015). Be transparent, if possible, about challenges your team encounters and how you mediate them.

- **Review IPE literature**, such as the IPEC (2011) core competencies in team-based care developed by an expert panel. The activity, when implemented successfully, illustrates all four of the core competencies.

- When working with students, **take time to introduce the activity** by describing the context, reviewing the agenda, making the objectives explicit, and explaining the format of the activity.

- **Create an expectation of active participation**: periodically check for questions or comments and regularly pose questions to the students.
  Sample Questions for Students**:**
  – *Based on these factors, what do you think the diagnosis is*?
  – *What should the treatment plan be for this patient?*
  – *If you were in my position, what would you have done?*
  – *Is there anything we missed?*
  – *What would you have done differently?*

- **Leave time for reflection**. **Can be done by practice team or faculty or IPE staff** Coupled with experiential learning, a reflection activity allows for continued consideration of the principles of interprofessional practice and for faculty members to summarize and frame the activity within the context of those principles (Hall & Zierler, 2015). The more participants self-reflect on the content of a presentation, the more they will engage in a discussion of how this fits into their behaviors (Sinclair, Lowe, Paulenko, & Walczak, 2007).

- If a visual presentation is used, **limit the amount of text on slides**. Use diagrams to demonstrate the relationships between team members and methods used to facilitate teamwork, such as the agenda for weekly meetings.

General Guidelines for Coordinating Activities with Panelists

- It is recommended that Speaker Guidelines be given to members of the practice team to ensure they are aware of your expectations for participation. For instance, you may expect the team to introduce and define their specialty, such as palliative care, which is an emerging, often misunderstood, discipline; however, the team may not be aware of that and fail to supply the students with the proper context before beginning their case discussion.

- To ensure communication is strong prior to the event, let the practice team know who their administrative contact is if they have any questions.

- Let the practice team know who their audience is (professions and level of training), pointing out any potential knowledge gaps of the students.

- Be explicit about whether the team's presentation should be more practical, with instructions, or more experiential, with narrative. Decide which type of experience would most benefit the students.

SECTION 4: Evaluation and Change Management

To ensure that nursing students gain the competencies needed to provide team-based patient-centered care and improve patient outcomes, institutions should regularly evaluate the effectiveness of their IPE programs (IOM, 2011). A 2002 position statement from the NLN supports this approach: "The teaching of nursing must be evidence-based, with research informing what is taught, how learning is facilitated and evaluated, and how curricula/programs are designed" (p. 3). Additionally, with the IOM's 2020 goal that 90 percent of clinical decisions be evidence-based, there is a need to build faculty capacity to use evidence-based teaching practices and prepare nursing students. at all degree levels, to effectively make clinical decisions that are based on evidence (Kalb, O'Conner-Von, Brockway, Rierson, & Sendelbach 2015).

In the IPE sphere, while interprofessional learning is widely regarded as a valuable addition to health professions education, IPE educators are challenged to provide reliable evidence to support its value. In 2015, the IOM and the *National Center for Interprofessional Practice and Education* both released reports responding to the lack of well-designed studies that chart the correlation between IPE interventions and improved patient and health system outcomes. While there are many evaluation tools in circulation, the wide variation in environments where IPE occurs complicates the formulation of broadly applicable ways to measure the effectiveness of IPE. Every setting has unique measurement needs and, even within a setting, these needs may change at different times with different groups for different purposes.

When creating an evaluation tool, whether you customize an existing tool for your purposes or choose one from an array of options, consider these suggestions:

- Define the purpose of your evaluation and identify what indicators of success would look like. The tool should encapsulate all of the important questions and ideas at play
- Assessments that only have outcomes related to attitudes, perceptions, beliefs, or feelings of students or the program participants are not informative about changes in behaviors, systems, or system outcomes. IPE's overall purpose is to improve team-based, patient-centered health care; always consider this when measuring impact
- A study about an interprofessional activity can be compromised if the respondent group is not also interprofessional. Different professions can have vastly different experiences of the same activity. It is important to capture feedback from all represented professions

- Multiple methods of evaluation are recommended to capture the complexities of an environment or an educational experience (IOM, 2015; Schmitz & Cullen, 2015).

For all evaluation needs, consider consulting evaluation professionals to determine best steps moving forward. One example of a versatile tool currently in use is the Jefferson Teamwork Observation Guide (JTOG), a validated tool mapped to IPE core competencies. The JTOG is designed to help learners observe and assess the behaviors of collaborative practice teams and help students understand team behavior. Clinical instructors can also assess student performance on teams using the individual version of the JTOG. To access the JTOG and other evaluation tools, refer to the National Center for Interprofessional Practice and Education's online resource exchange, which includes a Measurement Needs collection representing popular submissions. See also the 2015 IOM report.

PULSE CHECK

Take a few minutes to evaluate your current assessment tools. Do they align with the suggestions on the previous page? Can they be adjusted to fit the needs of an IPE assessment?

SECTION 5: Interprofessional Education Sustainability

The challenges of developing and sustaining IPE programs in higher education settings should not be downplayed. It can be hard to make progress within an institutional structure that has traditionally perpetuated discipline-specific structures and decision-making processes and is historically very slow to change (Lewin, 1996). It is not feasible to rely on a few individuals or department champions to sustain an entire IPE program. Continued support from the institution through the allocation of resources and participation from faculty, practitioners, hospital executives, and others is crucial to your success.

Simply put, for an IPE intervention to be sustained, here are the critical factors:

1. **IPE infrastructure** to continue engaging students. IPE competencies must be created that are customized for your local environment's needs and are aligned with current nursing accreditation requirements. These competencies must then be weaved into the curricula of all participating programs to guarantee that IPE is prioritized in courses and activities for students (IPEC, 2011).
2. **Commitment of time and effort from individuals and entities across the learning spectrum**, senior leaders, faculty, staff, practitioners, and students. Leaders within each category need to commit to championing interprofessional education in their local contexts (WHO, 2010).
3. **Financial model and reliable funding sources to cover costs** associated with interprofessional education. The commitment of internal and external resources ensures supplies for programming can be acquired, faculty development can be supported, and IPE personnel are compensated for their work (Thommes, 2004).
4. **Program revision process with reliable evaluation tools** for measuring program effectiveness. Once the data are collected and analyzed, there should be a willingness and ability to implement changes (Schmitz & Cullen, 2015).
5. **Faculty development so faculty can effectively design and deliver IPE programming**. This way, faculty can adequately coach students through collaborative team practice using standardized, high quality methods (Hall & Zierler, 2015)
6. **Centralized group for the coordination of IPE programming** to facilitate collaborative efforts involving separate professional departments. A staff dedicated to IPE can develop the program, from one characterized by occasional isolated activities to an established, regulated curriculum (Brashers et al., 2015).

7. **Diverse array of authentic IPE programs that respond to local environmental needs** utilizing different learning formats, such as didactic, simulation, clinical observation, and clinical practice for different IPE proficiency levels (Loversidge & Demb, 2015).
8. **Ongoing coaching for participants after training when they initially enter or return to practice environments**. Coaches model correct behavior, provide feedback, and champion patient-centered team-based care in their environment (AHRQ, 2014a).

The National League for Nursing hopes this toolkit will serve as a valuable resource for you, wherever you currently are in your interprofessional education endeavors. As we work together to shape the future of nursing education and advance the health of our nation, we wish you the best of luck.

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