



## Frequently Asked Questions

### SHM I-PASS Mentored Implementation Program

#### **What is the SHM I-PASS Mentored Implementation Program?**

The SHM I-PASS Mentored Implementation Program will facilitate the implementation of the I-PASS handoff Quality Improvement Bundle across 32 participating hospitals with a primary focus on internal medicine and pediatric residency training programs. Each site will be paired with a team of mentors from outside the institution who are experienced in I-PASS Handoff techniques as well as quality improvement and program implementation strategies generally.

#### **Why should my site participate in the SHM I-PASS Mentored Implementation Program?**

The Office of Inspector General (OIG) reported in November 2010 that 180,000 patients per year die due to medical care with 43 percent of these deaths considered preventable. According to these numbers, harm due to medical care could be the third leading cause of death nationwide. While there are multiple root causes for the high rate of medical errors and adverse events in hospitals, miscommunication has consistently been identified as one of the most important. The Joint Commission has found that communication errors are a contributing cause in approximately two out of every three “sentinel events” – the most serious adverse events in hospitals – and that more than half of these communication errors involved handoff failures. Handoffs in care are becoming ever more common, particularly among residents due to the latest round of duty-hour restrictions. At the same time, the Accreditation Council for Graduate Medical Education (ACGME) now mandates that every teaching hospital have a standardized approach to conducting handoffs throughout the institution, as well as a system for monitoring trainee handoffs.

The intent of the SHM I-PASS Mentored Implementation Program is to improve handoff processes and decrease rates of miscommunication locally at each participating site, using the strategy of the I-PASS Handoff Method that has been demonstrated to reduce adverse events through a recently conducted research study.

#### **If my site is selected to participate, when will we start the program?**

There will be two waves of participation. Sixteen sites will participate in Cohort one which will run approximately from March 2015 to August 2016. Cohort two will run from approximately March 2016 to August 2017.

#### **What is the I-PASS Handoff Bundle?**

The I-PASS Handoff Bundle is an evidence-based handoff improvement program that was associated with an approximately 30 percent reduction in rates of preventable adverse events in a nine-institution multi-site research study. The I-PASS Handoff Bundle includes the following seven elements: (1) the I-PASS mnemonic (I: Illness Severity, P: Patient Summary, A: Action List, S: Situation Awareness and Contingency Plans, S: Synthesis by Receiver) that serves as an anchoring component for verbal and written handoffs and all aspects of the curriculum; (2) a workshop to teach TeamSTEPPS® teamwork and communication skills as well as I-PASS handoff techniques; (3) a role-play and simulation session to practice skills from the workshop; (4) a computer module to allow for independent learning (5) a faculty development program, including the completion of a needs assessment survey prior to implementation; (6) faculty direct-observation tools used to provide feedback to residents; and (7) a process-and culture-change

campaign, which includes materials such as a logo, posters and other mechanisms to ensure adoption and sustainability. Each site will integrate the I-PASS method into verbal handoff processes. As part of implementation, written handoff tools will be enhanced within the electronic medical record or word processing programs to include the I-PASS mnemonic structure. Each site will also maintain an implementation log reviewed regularly with mentors and on conference calls to ensure progress with each bundle component.

**What materials can I review to gain additional understanding about the I-PASS Handoff approach to know if it would be relevant for my institution?**

The following references offer additional insight about the I-PASS Handoff approach:

Starmer AJ, O'Toole JK, Rosenbluth G, Calaman S, Balmer D, West DC, Bale JF, Yu CE, Noble EL, Tse LL, Srivastava R, Landrigan CP, Sectish TC, Spector ND, and members of the I-PASS Study Group. Development, Implementation, and Dissemination of the I-PASS Resident Handoff Curriculum: A Multi-site Educational Intervention to Improve Patient Handoffs. *Academic Medicine* 2014; 89(6): 876-884.

The I-PASS Handoff Study Website: [www.ipasshandoffstudy.com](http://www.ipasshandoffstudy.com)

Starmer AJ, Spector ND, Srivastava R, Allen AD, Landrigan CP, Sectish TC, and the I-PASS Study Group. I-PASS, a Mnemonic to Standardize Verbal Handoffs. *Pediatrics* 2012; 192(2): 201-204.

O'Toole JK, West DC, Starmer AJ, Yu CE, Calaman S, Rosenbluth G, Hepps JH, Lopreiato JO, Landrigan CP, Sectish TC, Spector ND; for the I-PASS Study Education Executive Committee. Placing Faculty Development Front and Center in a Multisite Educational Initiative: Lessons from the I-PASS Handoff Study. *Academic Pediatrics* 2014;14: 221–224.

Starmer AJ, Sectish TC, Simon DW, Keohane C, McSweeney M, Chung EY, Yoon CS, Lipsitz SR, Wassner AJ, Harper MB, Landrigan CP. Rates of Medical Errors and Preventable Adverse Events Among Hospitalized Children Following Implementation of a Resident Handoff Bundle. *JAMA* 2013; 310(21): 2262-2270.

**Is there cost to our institution? Are there any funds available to those who participate?**

The SHM I-PASS Mentored Implementation Program is sponsored by the Agency for Healthcare Research and Quality and will operate in collaboration with the I-PASS Institute and the SHM. While there is no cost to participate, it is expected that participating sites will secure dedicated time from the members of the QI team (especially the mentee/site leader), project management support, and the time of faculty to serve the role of I-PASS implementation champions. Additionally, support to make necessary modifications to existing computerized handoff tools (integrated into the electronic medical record where possible) will need to be provided by each institution. Each site will be provided with approximately \$500 upon achievement of key implementation and adoption milestones which can be used to support the production of materials to enhance sustainability and uptake such as posters, pocket cards and other visual reinforcement tools.

**What curricular resources will be available to us?**

All of the I-PASS Handoff Curriculum materials will be available free of charge to each participating site. This will include a comprehensive overview and personalized instruction on all existing I-PASS materials as well as access to materials that are being adapted by members of the I-PASS team to facilitate handoffs and implementation in additional settings and for other provider types that are not currently available through existing publications.

**Can provider types other than residents have access to the curricular materials?**

Yes, the materials that will be shared will be available for use and adaptation in participating institutions.

**What type of data will be collected? Will we be required to share sensitive safety data?**

Two main types of data will be collected by participating sites (1) faculty observation data for resident physician verbal and written handoffs and (2) survey data assessing resident and faculty perceptions of the handoff process, including perceptions as to the frequency of medical errors and miscommunications.

A key component of the I-PASS Handoff Bundle includes having faculty members conduct observations of the verbal and written handoff process. Locally, faculty observers will track on a monthly basis key data elements, such as the percentage of handoff observations that include all five I-PASS mnemonic elements, or the percentage of observations that include omissions of important information. These elements will be plotted on a standard run chart that will be provided to each site following analysis at Boston Children's Hospital / the SHM on at least a monthly interval. Additionally, each site will keep a copy of the handoff observation forms locally to support the process of documentation of assessment of handoff competence that is required by the ACGME.

An additional key component of the I-PASS Handoff Bundle includes surveying residents and faculty working on the implementation unit regarding their perceptions of the handoff process as well as their perceptions of the frequency of handoff communication errors and quality of observations and training. Resident physicians will be surveyed monthly at the end of each rotation on the implementation unit and faculty will be surveyed at baseline as well as at approximately six months into the implementation process. Results from the survey will be used to generate standard run charts which will track things such as frequency of excellent teamwork and high-quality handoffs, frequency of handoff problems, the frequency of consequences of handoff problems including perceptions of rates of error and miscommunication, as well as perceptions of quality of handoff supervision and teamwork training.

**If my institution does not have internal medicine or pediatric residents, can we participate?**

While preference will be given to sites with internal medicine or pediatric residency programs, we will consider the participation of highly qualified institutions without these programs, such as hospitals who are interested in improving handoffs among faculty or with training programs for other specialty types.

**How will sites be selected to participate? What are characteristics of sites that will be selected?**

An intake survey is available [here](#) to facilitate the application process. A total of 32 sites will be selected to participate (approximately half pediatric residency training programs and half internal medicine programs). We will be seeking sites that are heterogeneous for a range of factors (institution size, academic vs. community hospital focus, prior handoff program implementation experience, and degree of institutional buy in). We are seeking energetic, highly activated teams of individuals who bring a range of talents to the program including quality improvement expertise, research experience, curriculum implementation and years of experience.

**Is IRB approval required?**

Implementation of the I-PASS Handoff Bundle at each individual participating site is a quality improvement effort and therefore should not require a full IRB approval at each site. The intent of this work is to improve handoff processes and decrease rates of miscommunication locally at each participating site, using the strategy of the I-PASS Handoff Method which has been demonstrated to be highly effective through a previous rigorous research study. Each site will be provided with documentation to explain the reasons why the program at each local participating site is a quality improvement activity, which each site will be required to review and confirm exemption by each site's IRB or other designated official. The overall conduct of the study, including centralized collection of de-identified data, has been approved by Children's Hospital of Boston's IRB.