Facts about the Hand Hygiene Project

An estimated 2 million patients get a hospital-related infection every year and 99,000 die from their infection. – Centers for Disease Control and Prevention

In December 2008, the Joint Commission Center for Transforming Healthcare began work on its first improvement project: addressing failures in hand hygiene. The Hand Hygiene Project focuses on improving and sustaining hand hygiene compliance. Hand hygiene is critically important to safe, high quality patient care. Unfortunately, many infections are transmitted by health care personnel. To sustain improvement and make a difference, a simple slogan or campaign is not enough; demanding that health care workers try harder is not the answer. Comprehensive, systematic and sustainable change is the only solution.

The Targeted Solutions Tool® (TST®) for Hand Hygiene

The hand hygiene solutions provided via the Targeted Solutions Tool® (TST®) are the culmination of the Hand Hygiene project. The TST® is an application that guides health care organizations through a step-by-step process to accurately measure their organization's actual performance, identify their barriers to excellent performance and direct them to proven solutions that are customized to address their particular barriers. The Hand Hygiene TST® provides the foundation and framework of an improvement method that, if implemented well, will improve an organization's hand hygiene compliance and contribute substantially to its efforts to reduce the frequency of health care-associated infections. Together, the eight leading hospitals and health care systems developed hand hygiene solutions that have achieved and continue to show major and sustained gains in hand hygiene. At the start of the project in April 2009, they were surprised to learn that their rate of hand hygiene compliance averaged 47.5 percent. By June 2010 they had reached an average rate of 81 percent that had been sustained for eight months. Many other hospitals across the country – small, medium and large – collaborated with the Center to test the work of the original hospitals and provide guidance on the development of the TST® for Hand Hygiene. These hospitals experienced the same gains as the original eight. Since its launch on September 13, 2010, the TST® has collected over 1,000,000 hand hygiene observations. The TST® data collected demonstrate that health care organizations are significantly improving their hand hygiene compliance rates throughout the U.S. On average, organizations have improved 23 percent over their baseline measurements and are sustaining those results. Additionally, some organizations have linked use of the TST® to a reduction in health care-associated infections.

How targeted solutions are identified

Robust Process Improvement® (RPI®) is a fact-based, systematic, and data-driven problem-solving methodology that incorporates tools and concepts from Lean Six Sigma and change management methodologies. The original participating organizations used RPI® to identify the magnitude of specific problems that increase the risk of this event. They then pinpointed the contributing causes, developed specific solutions that were targeted to each cause and thoroughly tested the solutions in real life situations.

Causes of failure to clean hands

- Ineffective placement of dispensers or sinks
- Hand hygiene compliance data are not collected or reported accurately or frequently
- Lack of accountability and just-in-time coaching
- Safety culture does not stress hand hygiene at all levels
- Ineffective or insufficient education
- Hands full
- Wearing gloves interferes with process
- Perception that hand hygiene is not needed if wearing gloves
- Health care workers forget
- Distractions

Solutions: Effective hand hygiene is in our HANDS

Habit

- Always wash in and wash out upon entering/exiting a patient care area and before and after patient care

- Make washing hands a habit – as automatic as looking both ways when you cross the street or fastening your seat belt when you get in your car

Active feedback

- Coach and intervene to remind staff to wash hands
- Clearly state expectations about when to sanitize hands to all staff members
- Communicate frequently – provide visible reminders and ongoing coaching to reinforce effective hand hygiene expectations
- Engage staff – real time performance feedback
- Tailor education in proper hand hygiene for specific disciplines
- Provide just-in-time training
- Use technology-based reminders and real time feedback
- Celebrate improved hand hygiene

No one excused

- Protect the patient and the environment – everyone must wash in and wash out
- Make it comfortable to wash hands with soap or use waterless hand sanitizer
- Hold everyone accountable and responsible – doctors, nurses, food service staff, housekeepers, chaplains, technicians, therapists
- Apply progressive discipline from the top – managers must hold everyone accountable for proper hand washing
- Commitment of leadership to achieve hand hygiene compliance of 90+ percent
- Identify proper hand hygiene as an organizational priority
- Serve as a role model by practicing proper hand hygiene

Data driven

- Data provides a framework for a systematic approach for improvement
- Utilize a sound measurement system to determine the real score in real time
- Use trained, certified independent observers to monitor appropriateness of hand hygiene
- Scrutinize and question the data
- Measure the specific, high-impact causes of hand hygiene failures in your facility and target solutions to those causes

Systems

- Focus on the system, not just on people
- Make it easy; examine work flow of health care workers to ensure ease of washing hands:
  - Provide easy access of hand hygiene equipment and dispensers
  - Create a place for everything: for example, a health care worker with full hands needs a dedicated space where he or she can place items while washing hands
  - Limit entries and exits from a patient's room – make supplies available in room and eliminate false alarms that require staff to leave room to turn alarm off
- Identify new technologies to make it easy for staff to remember to wash hands, i.e. radio frequency identification, automatic reminders, real time scoring

Project team

Cedars-Sinai Health System, California
Exempla Lutheran Medical Center, Colorado
Froedtert Hospital, Wisconsin
The Johns Hopkins Hospital and Health System, Maryland
Memorial Hermann Health Care System, Texas
Trinity Health, Michigan
Virtua, New Jersey
Wake Forest Baptist Health, North Carolina

For more information about this project, its causes, solutions and the project team, visit the **project detail** page, or the Center **website**.