# IMPLEMENTING ELECTRONIC HAND HYGIENE COMPLIANCE MONITORING

Hanover Hospital's IP Gives an Account of How Electronically Measuring Hand Hygiene has Doubled Compliance Rates

### The Hand Hygiene Problem

Hanover Hospital In 2014, Hanover Hospital's Infection Prevention team knew they needed to change how their hospital thought about hand hygiene. The team was using direct

observation to collect and report hand hygiene compliance rates and routinely received rates as high as 90-100%. Jennifer Laughman, BS, MT(ASCP), CIC, Supervisor, Infection Preventionist, Quality Improvement at Hanover Hospital, knew that these percentages did not represent the hospital's real hand hygiene performance.

At the time, Hanover was seeing an increase in C-Difficile and other infections throughout the hospital. Although they worked on isolation precautions, Laughman knew that their hand hygiene practices were not sufficient in preventing such infections. She recognized the need for a plan that would include monitoring hand hygiene 24/7 in order to provide a more accurate number that would bring awareness to the problem.

"I could not get an improvement, partly because no one thought hand hygiene was an issue."

"I tried many campaigns including GloGerm, product demonstrations and education, but nothing seemed to get people to change their behavior when they were caring for patients," said Laughman.

## **The Solution**

Hanover formed a "Do No Harm" team geared toward reducing patient harm. The team consists of nursing staff from every unit as well as staff from all ancillary departments, who meet to discuss possible improvements that could be implemented to increase patient safety. Laughman and her colleagues researched electronic monitoring systems as a potential tool to help monitor hand hygiene. After attending the National APIC Conference year after year, Laughman understood that other hospitals were having success with these monitoring tools and identified the potential in helping their hand hygiene rates as well.

Hanover selected the GOJO<sup>®</sup> SMARTLINK<sup>™</sup> Activity Monitoring System (AMS) because group monitoring was the best solution for the Hanover culture. The management team did not want this to become a punitive system. Instead, Hanover wanted the message to be about helping to make hand hygiene a habit – for everyone!

## **The Journey**

Initially, Hanover installed AMS in one unit as a trial, they wanted to get a better understanding of their hand hygiene performance and raise awareness. "The baseline for the one unit started at about 27%, which was better than what I expected," said Laughman. "At that time, with the leadership of our CEO, we set our goal to 40%, which was about a 50% increase over baseline."

HANOVERHospital

Hanover Hospital is a 93-bed not-for-profit hospital located in Hanover, PA. Jennifer Laughman, BS, MT(ASCP), CIC, Supervisor, Infection Preventionist, Quality Improvement, has worked at

Hanover for 17 years in both the Microbiology Lab and in Infection Prevention.



In the beginning, the unit saw a significant increase to around 35%. However, the unit plateaued once the awareness of the system wore off. It took about 18 to 24 months to get the staff to believe the data. A turning point for Hanover in their overall hand hygiene initiatives occurred when the 'Do No Harm' team went out on the unit floors to covertly observe hand hygiene. Each member was given 20 minutes to observe and count how many people entered and exited rooms and how many people cleaned their hands for 20 minutes.

Success is when the staff is excited about their achievements. They see their work and how it has benefited their unit. That makes them want to keep getting better!"

"Every department was between 20-35%," said Laughman. "It was an A-ha moment... everyone realized we really aren't as good as we think we are. And these numbers were in line with the AMS numbers." After this, Hanover expanded the AMS system into other nursing units and has plans to implement the system hospital-wide.

The data and reports built from the SMARTLINK Software and the SMARTLINK™ Clinician-based Support service get distributed to the Hanover 'Do No Harm team' weekly. In addition, each unit has a Feedback Monitor that displays the performance numbers in real-time, so staff can know how they are performing. The numbers are owned by all the departments, not just the nursing unit staff, which fosters a culture of hand hygiene accountability. Everyone plays a part in the number and Hanover

reinforces that through the 'Do No Harm' team.

## **The Results**

Today, the first two units that were installed have increased their hand hygiene rates to between 50-55%. An additional unit is between 45-50%, and a fourth unit is in its baseline phase. Each unit is taking accountability for each other and for other ancillary departments, physicians, even visitors. The staff are becoming more comfortable speaking about hand hygiene to others. "That's something that would never have happened without the awareness that this system has brought," said Laughman. "The staff are also making the connection between their actions like hand hygiene, and hospital-acquired infections and patient harm. They are realizing that hand hygiene helps reduce the risk of patient harm."

The staff now takes full responsibility for the data and their performance. Some units have started their own campaigns using educational signs and hand hygiene 'sheriffs'.

## Laughman's Advice for Other Infection Preventionists

- ECM Systems are extremely beneficial. They provide data that you cannot get on your own. They bring intense awareness of hand hygiene to the entire organization.
- Give your team the test. Ask them to perform the 20-minute Hand Hygiene observation challenge.
- Senior level engagement is essential. Get alignment with the top of your organization to help drive change.
- Be patient. It takes time. This kind of change is hard work and takes time for people to accept.



