Interdisciplinary QI Initiative: Lab Nursing Steering Committee

Jessica Weber, BSN, RN-BC; Lisa Bigelow-Downing, BSN, RN-BC
jessica.weber@aurora.org; lisa.bigelow-downing@aurora.org
Aurora St. Luke’s Medical Center

Background
- The Safety Advocate Committee is made up of clinical nurses from each inpatient, outpatient, and procedural area with the support of nursing leadership and interdisciplinary ad hoc members.
- The Safety Advocate Committee reviewed incident reporting data from 2016 and discovered that diagnostic-lab was the category with the largest opportunity for improvement.
- The Safety Advocate Committee chairperson met with hospital leaders including the Director of Laboratory Services to collaborate on a solution, which led to the creation of the Lab Nursing Steering Committee.
- Nursing and physician satisfaction of laboratory services is a quality indicator, making measuring and improving satisfaction critical (Koh et al., 2014, p.380).

Methods

Purpose
- Address the root causes of diagnostic lab incident reports.
- Improve interdisciplinary collaboration and satisfaction regarding laboratory services.

- Tertiary hospital, inpatient setting.
- Stakeholders were chosen by interdisciplinary overlap with laboratory services.
  - Floor Nurses, Nursing Managers, Clinical Nurse Specialists, Directors of Nursing, Director of Laboratory Services, Laboratory Supervisors, Physicians, Patient Safety, Performance Advisory Manager, Hospital Administration.
  - Committee priorities identified through the review of incident reports, and organizing like-incidents into categories.
  - Laboratory Services Metrics
  - Signs on Doors
  - Lab Mislabels
  - Critical Results
  - Order Entry
  - Rejected Specimens
  - Categories then made into subcommittees, that are responsible for providing updates regarding progress on deliverables.
  - Mapped out the process from when a lab order is placed into EHR to the lab result.

Results
- Improvement in decreasing the percentage of diagnostic lab incident reports compared to the total number of incident reports for the site.
  - See Figure 1
  - *Important to consider with adopting HRO principles, more incident reports have been generated.
- Decrease in number of diagnostic lab incident reports.
- Improvement in the number of diagnostic lab incident reports decreasing from Q1 2017 to Q2 2019.
  - See Figure 2
- Improvement in laboratory draw times from Q1 2017 to Q2 2019
  - AM Completion + 16%
  - Timed STAT + 24%
  - STAT + 50%
- Improvement in the interdisciplinary relationship between laboratory services and nursing.

Discussion
- Improved interdisciplinary relationships among all parties involved in workgroup.
- More frequent meetings during the initial formation of the committee allowed for the establishment of a high level of accountability. Meetings were every 2 weeks, to 3 weeks, and now monthly.
- Overall fewer Diagnostic-Lab incident reports reported.
- Lessons learned on implementing a site wide intervention regarding mislabeled specimens. Challenges include timeliness of reported fallouts, follow up with team members, and size of organization.
- Accomplishments of subcommittees allowed for those subcommittees to close, and focus to change on newer challenges. Committee is ongoing.

Implications for Practice
- Creating interprofessional teams can be an effective process when addressing complex, multi-disciplinary issues.
- Potential for modeling a system interdisciplinary Laboratory Nursing Steering Committee in the future.
- Making front line team members stakeholders for projects related to their workflow provide unique perspective and input.
- Next steps include continuing to evaluate incident reporting trends.

References

Figure 1. All diagnostic lab incident reports from Q1 2017 to Q2 2019.

Figure 2. Diagnostic lab incident reports compared to the total number of incident reports each quarter from Q1 2017 to Q2 2019.

Figure 3. Mapped process of all the functions from placing a laboratory specimen order in Epic to the lab result.
Introduction: At the end of 2016, the St. Luke’s Medical Center Safety Advocate Committee reviewed incident report data and discovered that diagnostic testing-lab was the category with the largest opportunity for improvement. “Collaboration among healthcare providers is considered an essential attribute of the work environment and a core competent of the patient safety culture” (Ma, Park, & Shang, 2018, p.1).

Purpose/Objective: An inter-professional team formed to identify and address the root causes of lab-nursing incident reports, thus improving process and patient outcomes.

Method/Evaluation: The team utilized process mapping and PDSA quality improvement methodology to describe the lab draw process and address priority issues. Changes to the lab draw process included communication tools between lab and nursing, utilization of a swarm process to draw labs in a timely fashion, and staffing changes in phlebotomy to support timely completion. Lab shift supervisors implemented daily huddles to improve responsiveness and impact the timeliness of lab draws.

Results/Findings: Incident reports involving the lab draw process reduced from 2,307 in 2016 to 1,424 in 2018 with sustained improvement into 2019. Decrease in total number of lab incident reports along with lab incident reports making up a much smaller percentage of total incident reports. Morning lab completion time, STAT lab time, and timed draw efficiency all outperformed their targets.

Discussion/Conclusion: The committee has improved on all identified objectives including incident reports and draw time metrics. For the first time, all draw time goals were met in May, 2019.

Implications for Practice: Collaboration among disciplines propels patient outcomes forward by removing interprofessional barriers. Formation of a lab-nursing collaborative has improved communication, compliance with practice standards, and outcomes for patients.

References