Andrew Medvecz, M.D.
M.P.H. Candidate, Epidemiology Track
andrew.j.medvecz.1@vanderbilt.edu

Practicum Site:
U.S. Department of Veterans Affairs, Tennessee Valley Healthcare System
Nashville, TN

Practicum Site Supervisor:
Kyla Terhune, M.D., MBA

Reduction of Waiting Room Times in VA Surgical Clinics: A Quality Improvement Pilot Project

Project Background: Surgical clinic is an important aspect of surgical practice. It is used to identify new patients requiring surgical consultation and an opportunity for resident and student education. Many clinics are run by residents with attending supervision; however, trainee-directed clinics often have inefficiencies. We sought to improve the flow of the resident-run general surgery clinic in a VA clinic through a multidisciplinary quality improvement initiative.

Project Design: The intervention included multiple changes: restructuring the clinic schedule to reflect actual patient evaluation time, reorganizing workspace to accommodate provider documentation needs, incorporating automated patient check-in and patient tracking, and restructuring clinic staff roles reflecting qualifications. The primary outcome measure is patient wait time. Interrupted time-series (ITS) analysis was used to evaluate the impact of the intervention on patient wait times. Secondary measures included patient volume and electronic check-in.

Outcome: Pre-intervention, 40 patients were seen per day (range 38-42); 32.5 patients were seen per day (range 26-40) post-intervention. Mean wait times decreased from 46.1 minutes to 15.0 minutes (P<0.001). The greatest significant reduction in wait times was hour 4 of clinic where they were reduced by 51.2 minutes (68.3 to 17.1 minutes, P<0.001), and the smallest significant reduction was hour 3 (29.3 to 5.7 minutes, P<0.001). ITS analysis demonstrates improvement not only in the initial wait times (28.9 vs 4.4 minutes, P=0.026) but also a decreasing rate of wait time by scheduled time (0.15 vs 0.08 minutes wait per minute, P=0.049).

Lessons Learned: A multidisciplinary quality improvement project can improve patient wait times in an outpatient VA surgical clinic. The project results are limited to a single setting, but its results demonstrate a viable concept that can be expanded to other outpatient clinics. Quality improvement initiatives that focus on the patient experience will become essential for public health systems.