# Improving Clinical Workflow in the Ambulatory Setting: A Quality Improvement Proposal

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## Introduction:

Clinical workflow in the ambulatory setting is garnering more attention and is a priority for healthcare organizations due to evidence, at the national level, that increased wait time is resulting in a less than very good experience for cancer patients.

### **Background:**

The National Comprehensive Cancer Network surveyed its members who reported the need for improved efficiency of clinical workflow in the ambulatory setting.

## **Problem:**

The Institute for Healthcare Improvement (IHI) developed the triple aim to improve the performance of health systems. This quality improvement proposal is aligned with two of the three IHI aims:

- Improve the care experience
- Reduce the per capita cost of care

Cancer patients require laboratory services, provider visits and infusion therapy treatment for months and years which contributes to the significance of this clinical workflow problem to improve the care experience for adult cancer patients.

### Purpose:

The aim of this quality improvement proposal is to reduce the time from patient registration to the administration of first drug in the outpatient oncology setting by up to 25% resulting in improvement in the care experience for adult cancer patients. At a national level, this patient population currently reports less than a 'very good' experience with wait times. This process will improve patient satisfaction by 20% over a six-month period.

### **Methods/Objectives:**

- Obtain Voice of the Customer feedback
- Develop process maps for current and future states
- Perform a root cause analysis to address the problems of increased wait time and decreased patient satisfaction
- Initiate implementation plan
- Utilize the PDSA model to perform small tests of change
- Educate the interdisciplinary team on clinical workflow changes
- Data collection plan proposed: EHR data time stamps for patient registration, provider order to treat and the administration of first drug; patient satisfaction survey data pre and post implementation
- Data analysis plan proposed: Descriptive statistics to include the median, Run chart for continuous data and bar graph for patient survey data pre and post implementation.











## **PROPOSED FRAMEWORK: MODEL FOR IMPROVEMENT**

## What are we trying to accomplish?

Reduce time from patient registration to the administration of first drug and improve patient satisfaction over a six-month period.

## How will we know that a change is an improvement?

Decrease minutes from patient registration to the administration of first drug by 25%

• Improve patient satisfaction with wait time by 20%

## What changes can we make that will result in an improvement?

- Implement evidence-based clinical workflow strategies
  - Implement lab testing prior to day of treatment
    - Implement EMR prompt for order to treat
    - Develop pre-mix medication guidelines

Update infusion scheduling templates to reflect new clinical workflow Educate the interdisciplinary team on the new clinical workflow

## PLAN – DO – STUDY – ACT CYCLE



## SCHOOL OF NURSING

VANDERBILT UNIVERSITY

## **PROPOSED RESULTS** Minutes from Patient Registration to the Administration of Median (IQR) First Drug % of patients surveyed reporting a 'very good' experience for wait time

•	Pre-implementation	n (%)
•	Post-implementation	n (%)



## **Implications for Practice:**

- This quality improvement proposal is focused on patient satisfaction; the cost of care should also be evaluated.
- Efficiency initiatives should include maximizing the use of digital tools available to clinicians.
- This proposal does not provide actual results to test the proposed changes.
- Reduced patient length of stay and decreased wait time can improve patient satisfaction per the evidence and should be a priority for healthcare organizations.

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