



M-PIRRE

Michigan Perioperative Initiative
To Reduce Readmissions & ED Visits



Phase 1

- ◆ **LITERATURE REVIEW** of interventions aimed at reducing preventable ED visits
- ◆ **CONDUCT** survey within all sites on current practices involved in reduction of preventable ED visits
- ◆ **ANALYZE** survey results for trends



Phase 2

- ◆ **CREATE** patient ED questionnaire to evaluate underlying causes of ED visits
- ◆ **PILOT** patient ED questionnaire at select sites
- ◆ **COLLECT** feedback on questionnaire from pilot sites
- ◆ **REVISE** the patient ED visit questionnaire and **RE-PILOT**



Phase 3

- ◆ **ROLL OUT** patient ED questionnaire collaborative wide
- ◆ **ANALYZE** patient questionnaire data for each site to identify underlying causes



Phase 4

- ◆ **DESIGN** site specific intervention plans in partnership with each site
- ◆ Sites **IMPLEMENT** interventions
- ◆ **MEASURE** changes in ED visit rates among sites and MBSC as a whole
- ◆ **REVIEW** interventions and facilitate collaboration among sites



Results

- ◆ **CREATE** universal toolkit based on successful evaluations of underlying causes and interventions to eliminate them
- ◆ **REDUCE** ED visit rates among sites and MBSC as a whole



Michigan Perioperative Initiative to Reduce Readmissions and ED Visits (M-PIRRE)

Executive Summary

Since the inception of the Michigan Bariatric Surgery Collaborative (MBSC), unplanned readmissions have decreased slightly, while unplanned emergency department (ED) visits significantly increased. The gap between readmissions and ED visits has continued to widen between 2012-2015, with rates of 4% and 8%, respectively. This nearly two-fold difference suggests that approximately half of all ED visits are avoidable, presenting an opportunity for improvement.

The unplanned ED visit and readmission rates also vary greatly by site, ranging from 0% - 14%, and 0% - 9%, respectively. Reported reasons for ED visits were highly varied among patients, but a majority of patients had “symptoms without diagnosis”, which offers little information on the causes, or strategies to address them. This supports our hypothesis that a catch all approach to decreasing ED visits would be ineffective.

M-PIRRE therefore aims to conduct process analyses for each site to identify and address the underlying causes of avoidable ED visits, then design and implement site-specific, evidence based interventions to reduce them. The proposed product of M-PIRRE is thus a customizable toolkit that can be tailored and implemented by a wide range of diverse bariatric surgery practices across Michigan.

Phase 1 (completed) of the initiative was a comprehensive, literature review that examined interventions intended to reduce preventable ED visits. MBSC then surveyed all sites on their adherence to those strategies. As expected, there were no strategies identified as a “silver bullet” to easily decrease ED visits.

Phase 2 involves development of a patient questionnaire/interview guide which sites will use to abstract chart data and interview patients who have unplanned ED visits. We have piloted the questionnaire among select high and low performing sites across the Collaborative. The results of the first pilot were evaluated and used to revise the questionnaire for greater effectiveness. A second and final pilot is currently taking place using the revised questionnaire.

Phase 3 will see the revised questionnaire and case selection protocol rolled out to all MBSC sites. Once clinically rich, site specific patient ED visit data is collected; MBSC will study those results in partnership with the sites to understand themes and patterns that may explain excess ED visit utilization. MBSC will also use registry data, in conjunction with the patient interview results, to identify associations that may contribute to unplanned ED visits. MBSC, with site involvement, will determine targetable practice patterns for improvement.

Phase 4 will include one-on-one collaboration with sites to determine evidence-based methods to address their underlying causes. Site specific plans will be implemented and subsequently evaluated for changes in ED visit rates. This will allow sites to determine if the selected interventions are viable and effective. MBSC will use those outcomes to lead discussions among sites on successful strategies and areas of improvement, and to create an ED visit reduction toolkit.

M-PIRRE aims to work in partnership with every MBSC site to determine their specific underlying causes of unplanned ED visits, and develop evidence based approaches to address them. Through MBSC’s facilitated collaboration among sites, intervention methods can be shared and discussed. This will lead to a decrease in unplanned and unnecessary ED visits among participating sites. Through the achievements of M-PIRRE, MBSC has the potential to become a national leader in reducing preventable ED visits.