



# Improving Asthma Action Plan Completion Rates via Utilization of Epic Best Practice Advisory

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## INTRODUCTION

- The goal of written asthma action plans (wAAP) is to improve asthma control
- In patients with initial poor asthma control, wAAP have been shown to improve control
- Parents perceive wAAP to be helpful for home, school and caregiver management of asthma



- Previous QI initiatives improved the percentage of wAAP within the UW Health General Pediatric and Adolescent Medicine (GPAM) group however the group rate has been dropping over time
- The wAAP are typically completed at well visits and not all patients present for well child care

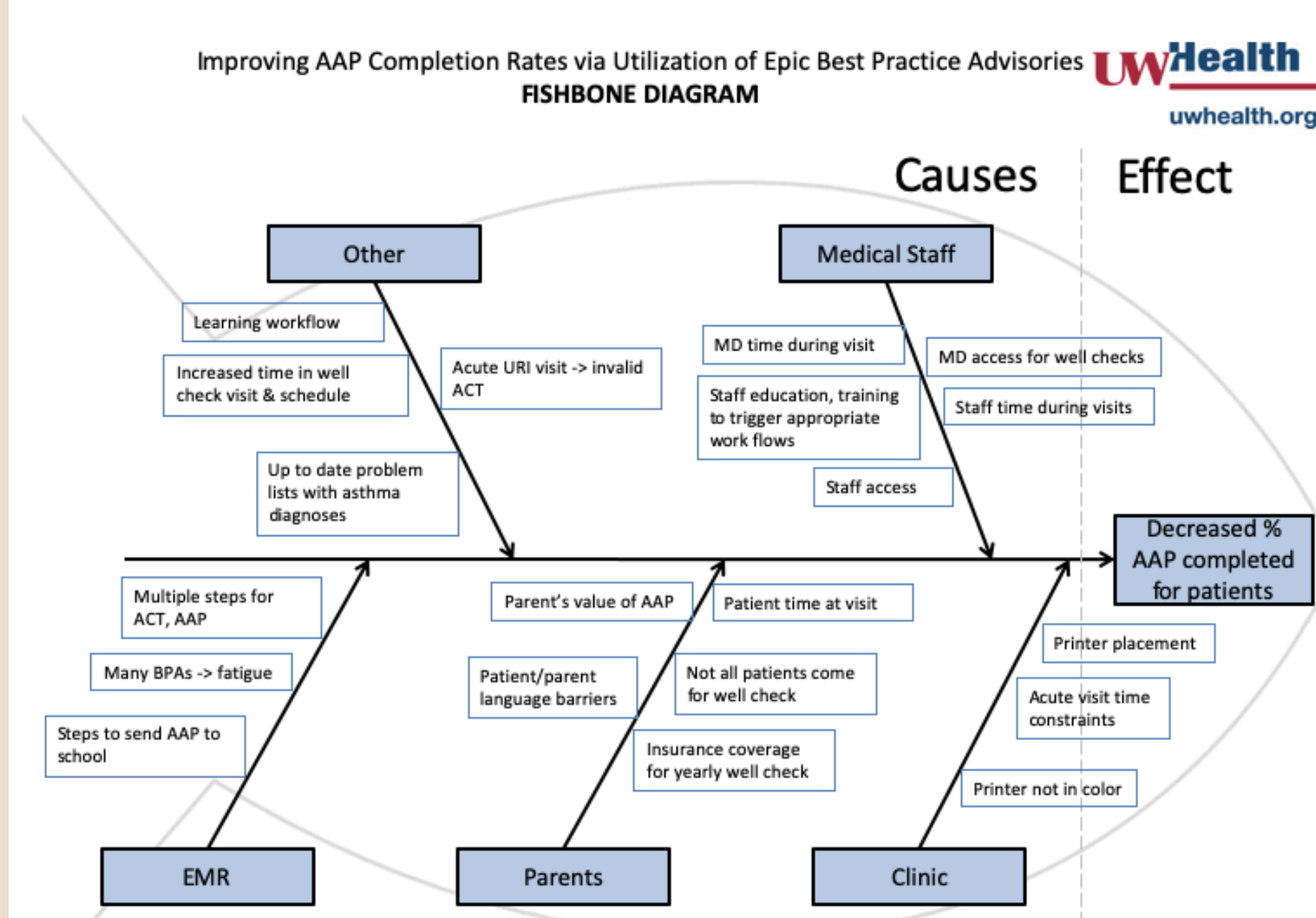
## PURPOSE

- Assess whether the institution of an Epic best practice advisory (BPA) could improve the percentage of UW GPAM patients with an active wAAP
- The specific aim of this quality improvement project is to increase the percentage of active written asthma action plans from 67% to 70% over the course of six months

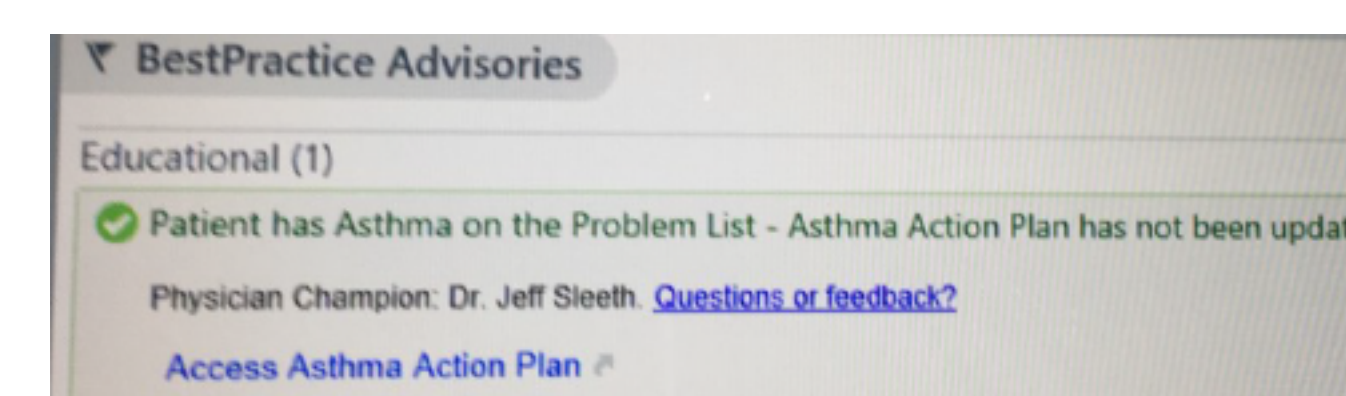
GO	Use these daily controller medicines:		
You have all of these: • Breathing is good • No cough or wheeze • Sleep through the night • Can work & play	MEDICINE	HOW MUCH	HOW OFTEN/WHEN
CAUTION	Continue with green zone medicine and add:		
	MEDICINE	HOW MUCH	HOW OFTEN/WHEN
DANGER	Take these medicines and call your doctor now.		
	MEDICINE	HOW MUCH	HOW OFTEN/WHEN

GET HELP FROM A DOCTOR NOW! Your doctor will want to see you right away. It's important! If you cannot contact your doctor, go directly to the emergency room. DO NOT WAIT.

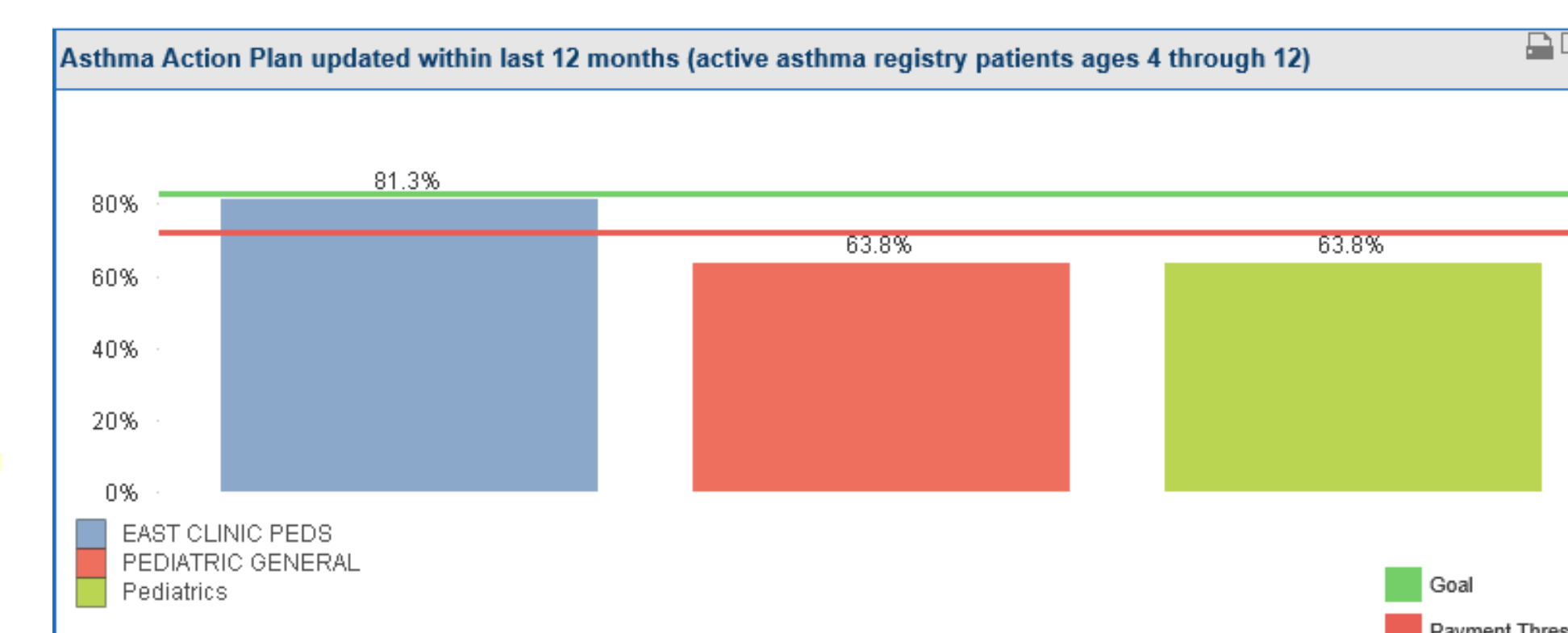
## METHODS



- A fish-bone diagram was utilized to assess the current barriers to wAAP completion
- An A3 was completed
- The idea of using a electronic health record best practice advisory (BPA) was identified to target acute visits and identify all patients due for wAAP



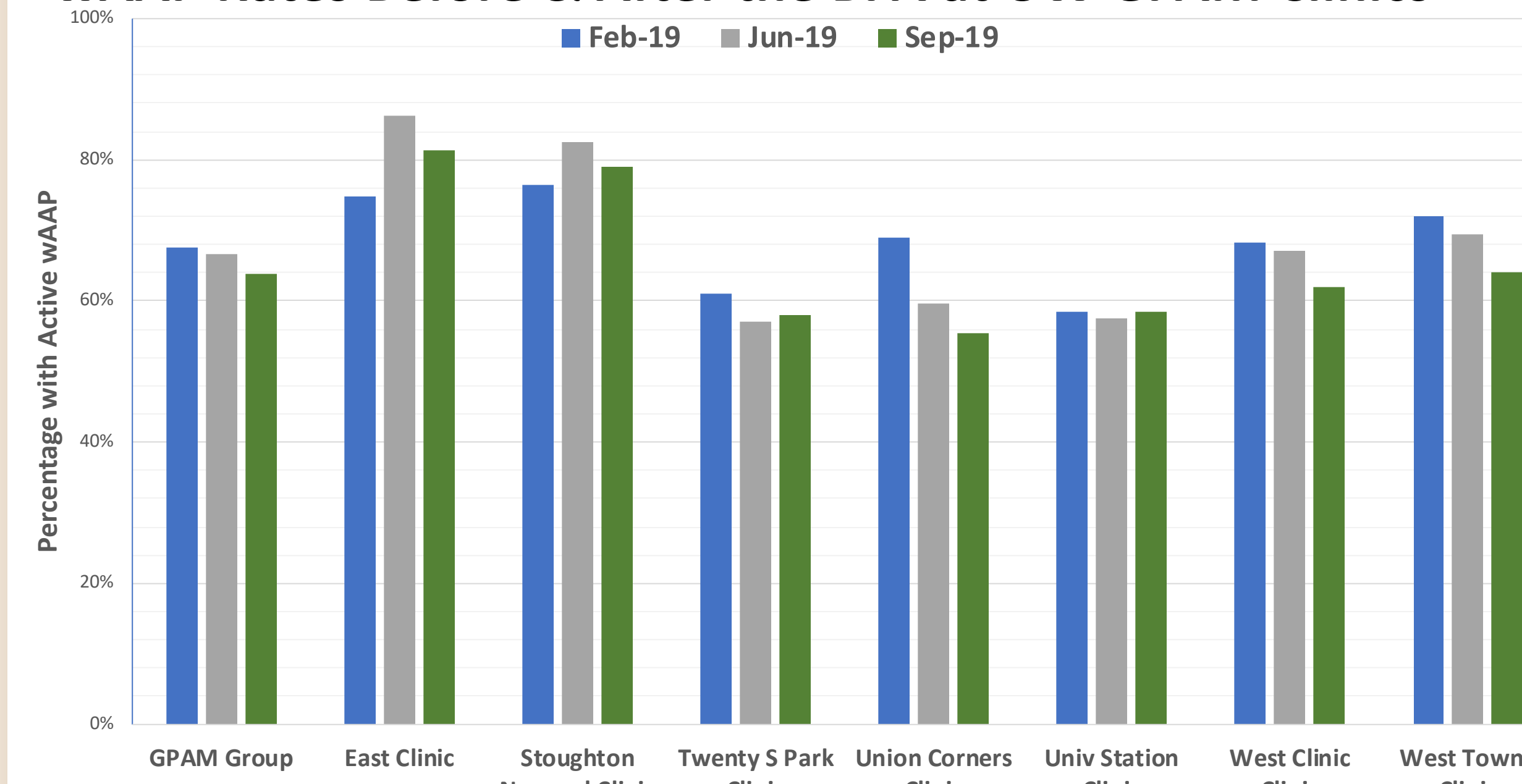
- A BPA was designed and implemented in the UW GPAM clinics. The BPA was triggered if a wAAP was >1 year old for any clinic visit



- Rates of aggregate and clinic specific wAAP completion prior to the intervention and at 3 and 6 months post-intervention were compared using the Qlikview program

## RESULTS

wAAP Rates Before & After the BPA at UW GPAM Clinics



- The group rate of wAAP completion prior to the BPA was 67.6%, which declined to 66.5% then 63.8% at 3 and 6 mo
- Improvements in wAAP % were seen at the East Clinic (74.9% to 81.4%) and Stoughton Clinic (76.4% to 78.9%)
- All other GPAM clinics had a decline in their wAAP completion percentages

Clinic	Feb-19	Jun-19	Sep-19
GPAM Group	67.6%	66.5%	63.8%
East Clinic	74.9%	86.1%	81.4%
Stoughton Nygaard Clinic	76.4%	82.6%	79.0%
Twenty S Park Clinic	61.0%	57.1%	58.0%
Union Corners Clinic	68.9%	59.7%	55.4%
Univ Station Clinic	58.4%	57.5%	58.4%
West Clinic Clinic	68.3%	67.1%	62.0%
West Towne Clinic	72.1%	69.5%	64.0%

## CONCLUSIONS

- Following the initiation of the BPA, there was an overall decrease in the percentage of UW GPAM patients with an active wAAP.
- Most clinic wAAP rates decreased although there was an increase at East and Stoughton Clinics
- The decrease in wAAP rates at other clinics could be secondary to some degree of "BPA fatigue" where too many of these messages are displayed, or other factors, such as physician changes and ancillary staff levels and turnover which may also have an effect on the efficacy of this intervention

## FUTURE DIRECTIONS

- Explore GPAM providers' views for barriers and recommendations for improvements for active wAAPs
- Consideration of use of asthma telemedicine visits during and after the Covid era

## ACKNOWLEDGEMENTS

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## CONTACT INFORMATION

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