

**Addressing Immunization Gaps: Improving
Rates of Immunization Among Adolescents
for Routine, Recommended Vaccines**
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ECU Health Quality Improvement Symposium

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Background/Introduction



- Estimated 2-3 million lives saved annually by vaccines
- Steadily declining adolescent immunization rates
- Vaccination rates contribute to public health of general population

Collaborative Team Members

- Mary Catherine Turner, MD, ECU APHC
- Nonye Onokalah, M4, LINC Scholar
- Lani True, PharmD, Access East
- Carmen Rodriguez-Pittman, Translator, ECUP Language Services
- Jamie Moore, Nurse Manager
- Drillious Gay, Nursing Administration Clinical Operator



Aim Statement

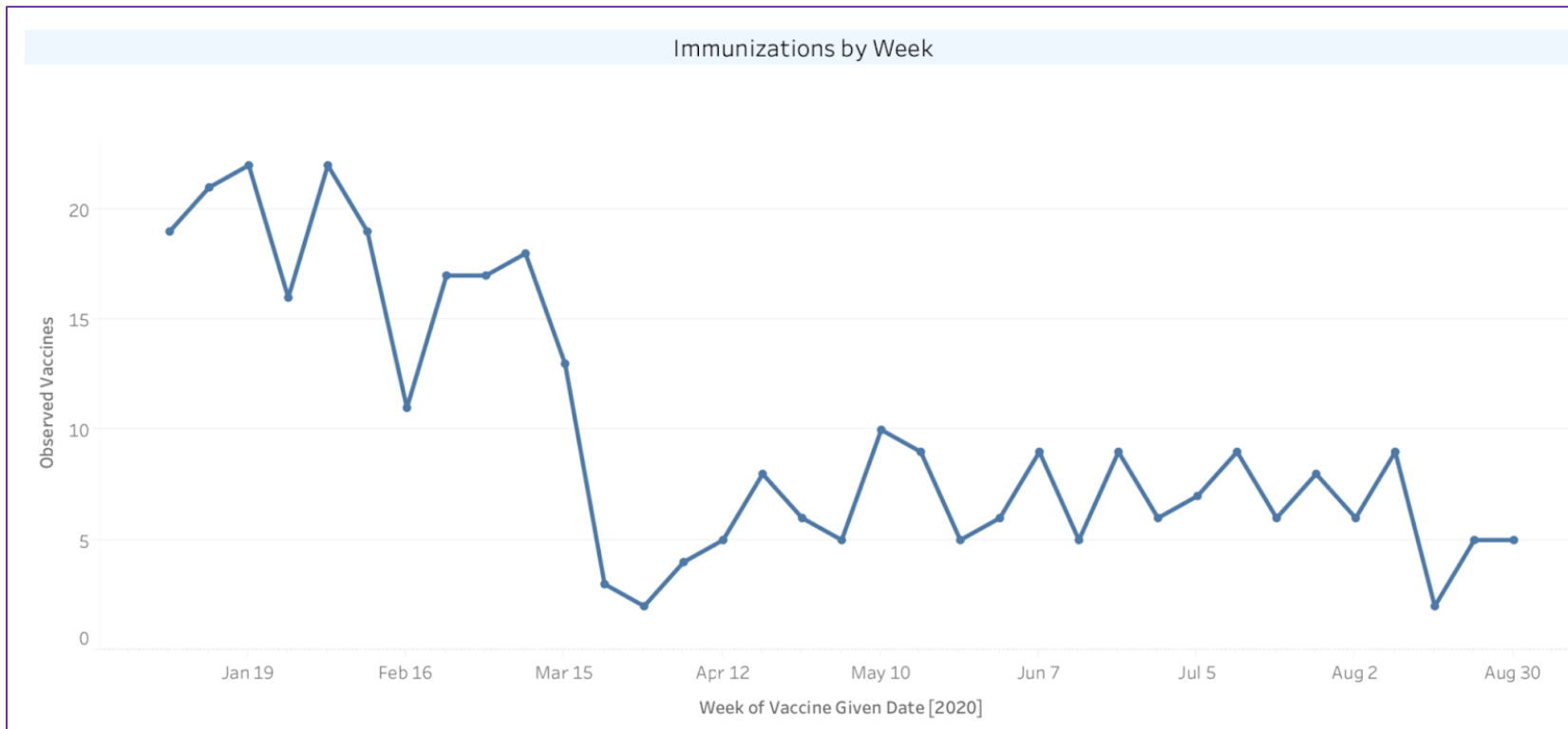
The goal of this study was that by December 2022, 75% of all ECU APHC Medicaid patients ages 11-13 would have received all age-appropriate immunizations against HPV, Tdap, and MCV.

How will we know this change is an improvement?

- Rates of completed **Tdap** immunizations
- Rates of completed **MCV** immunizations
- Rates of completed **HPV** immunizations
- Rates of *initiated* **HPV** immunizations
- Rates of completed **Tdap, MCV, and HPV** immunizations

Baseline Data

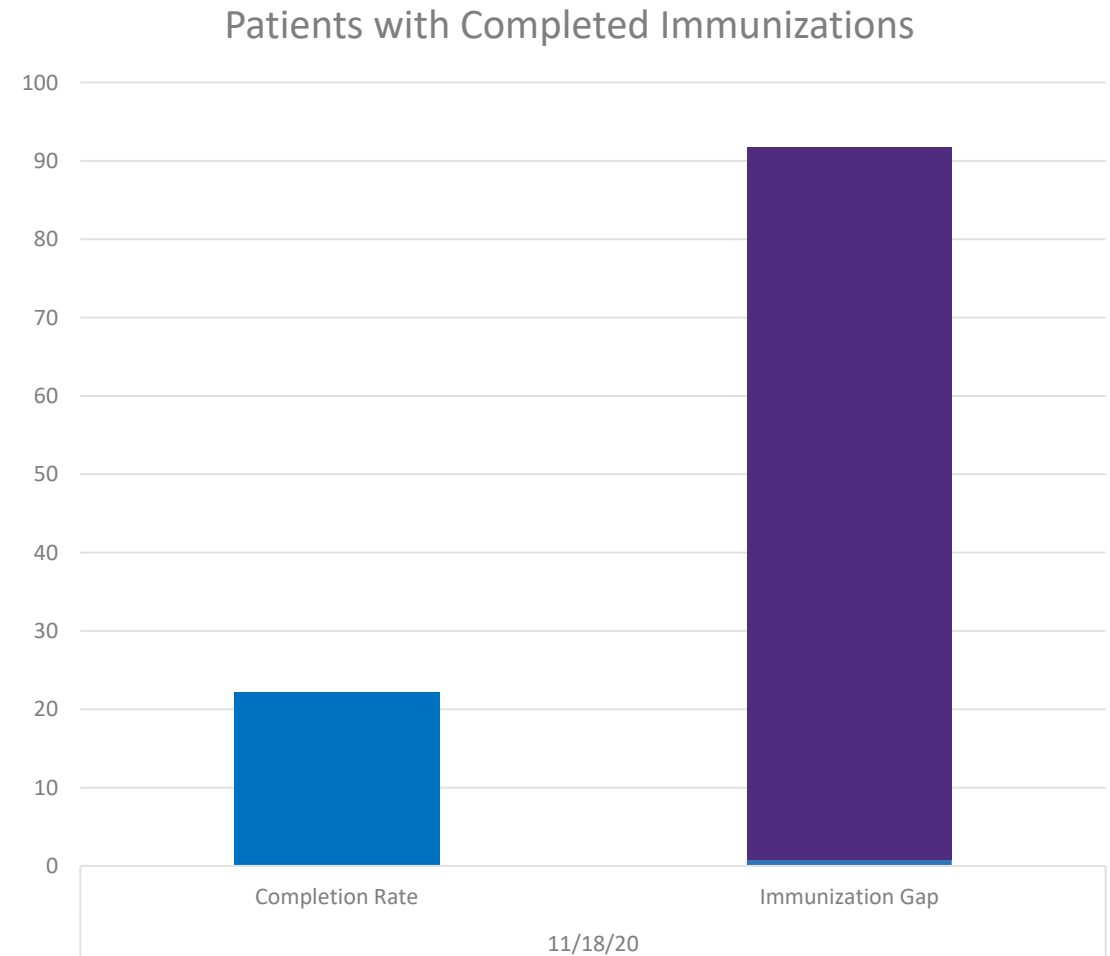
- ❑ Rates of observed immunizations given by week at the ECU Physicians Adult and Pediatric Health Care clinic from January through August of 2020



- ❑ At the onset of the Covid 19 pandemic from January to March of 2020, the East Carolina University Adult and Pediatric Health Care (ECU APHC) clinic witnessed a fall in weekly vaccination rates by approximately 91%

Baseline Data

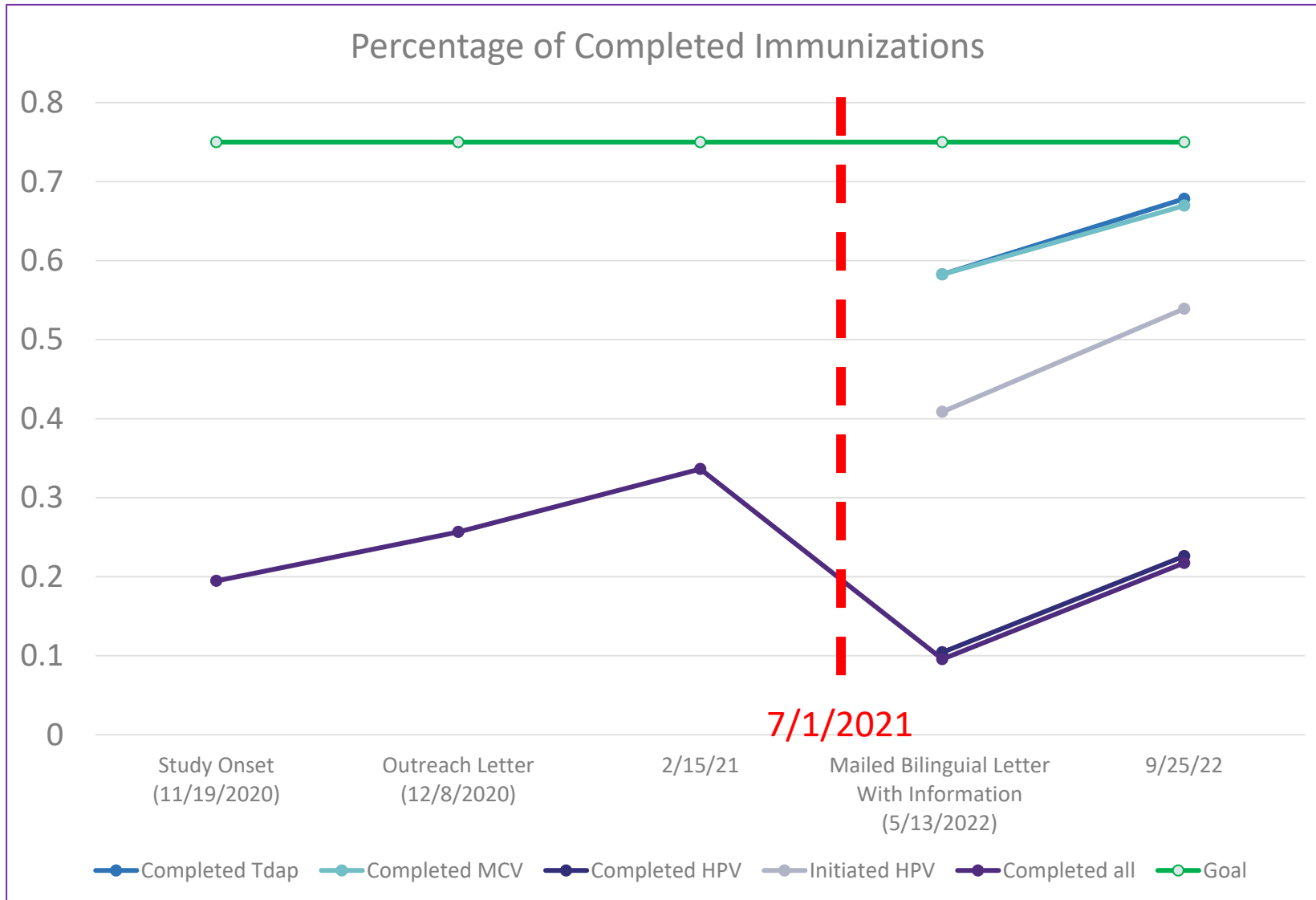
- ❑ Study onset (9/18/2020):
 - ❑ 113 patients on Medicaid attributed to ECU APHC between the ages of 11 and 13 years old
 - ❑ 22 (19.5%) had completed their Tdap, MCV, and HPV immunizations
 - ❑ 91 (80.5%) needed one or more of the vaccines
- ❑ The original round of outreach letters were assembled and mailed out to patient families on 11/19/2020



Improvement Strategies Employed

- ❑ 11/13/202: patient outreach through electronic health record
- ❑ 11/19/2020: outreach letters mailed to homes of patient families
- ❑ 7/12/2021: created information sheets on the three target vaccines of the study
- ❑ 7/18/2021: outreach letters and vaccine information sheets translated into Spanish
- ❑ 5/13/2022: bilingual outreach letters and vaccine information sheets mailed to patient family homes

Outcomes



Goal: 75%

Tdap: 67.8%

MCV: 66.9%

Initiated HPV: 53.9%

Completed HPV: 22.6%

Completed all: 21.7%

NC Medicaid Restructure

Challenges Encountered in QI Process

North Carolina Medicaid Managed Care

- July 2021
- Manual chart review
- Project sustainability

Lessons Learned

- Method of contacting adolescent patient families
- Education on rationale behind healthcare vaccine recommendations
- Addressing language barriers
- Reliable data collection for project sustainability
- Unique approach for HPV immunization
- Vaccination rates affect public health of general population

Next Steps

- ❑ Understanding parent perspectives regarding adolescent immunizations
- ❑ Nuanced approach to HPV immunization recommendations
- ❑ Automated generation of study data

Questions?

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