



Antibiotic Stewardship: A State and Health Plan Perspective

June 3, 2025



Agenda

WELCOME AND OVERVIEW

HEDIS ANTIBIOTICS MEASURES OVERVIEW

COMMUNITY FIRST HEALTH PLANS

WASHINGTON DEPARTMENT OF HEALTH

Q&A

A photograph of a female doctor with dark hair, wearing a white lab coat and a teal stethoscope, looking down at a tablet computer. She is standing next to a male patient who is lying down, wearing a blue patterned hospital gown. The background is a bright, out-of-focus window. A semi-transparent blue horizontal band is overlaid across the middle of the image, containing the title text.

HEDIS Antibiotics Measures Overview

Jen Strohmeyer, MPH

Background

HEDIS Antibiotic Measures



Respiratory conditions are a major driver of antibiotic prescribing



HEDIS has four health plan antibiotic measures:

- *Antibiotic Utilization for Respiratory Conditions (AXR)*
- *Appropriate Testing for Pharyngitis (CWP)*
- *Appropriate Treatment for Upper Respiratory Infection (URI)*
- *Avoidance of Antibiotic Treatment for Acute Bronchitis/Bronchiolitis (AAB)*



Tracking **appropriate and inappropriate prescribing** of respiratory conditions together may offer a tool for understanding opportunities for improvement

HEDIS Antibiotic Measures Set

3 measures assess appropriate antibiotic prescribing for key respiratory conditions

**Acute
Bronchitis/
Bronchiolitis**

Pharyngitis

**Upper
Respiratory
Infection**

Domain
Effectiveness of Care

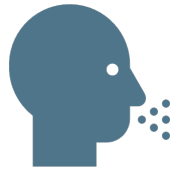
1 measure describes prescribing across all respiratory conditions

**Respiratory
Conditions**

Domain
Utilization

Example

How to Use HEDIS Antibiotic Measures for Stewardship



Patient has bronchitis, but is coded as having sinusitis and dispensed an antibiotic



Performance on bronchitis measure looks good (higher is better)



By focusing only on appropriate use, we are not aware that overall utilization may be too high



Tracking overall prescribing across all respiratory conditions in conjunction with the inappropriate prescribing measures can illuminate areas to focus on



Health Plan Best Practices for Improving Antibiotic Stewardship

COMMUNITY FIRST
HEALTH PLANS

Stephanie Younts, PharmD, MPH, BCPS, LSSBB
Director, Medical Management & Pharmacy
Services

Disclosures

- No relevant financial interests with commercial interests to disclose.

Community First Health Plans is committed to promoting appropriate antibiotic use with particular focus on HEDIS antibiotic measures.

**Avoidance of Antibiotic Treatment for Acute Bronchitis/Bronchiolitis (AAB)
Appropriate Treatment for Upper Respiratory Infection (URI)
Appropriate Testing for Pharyngitis (CWP)
Antibiotic Utilization for Acute Respiratory Conditions (AXR)**

Serving our community for 30 years!

- Community First Health Plans was established in 1995 by University Health specifically to begin providing health care coverage to the citizens of Bexar and its seven surrounding counties.
- Community First is proud to offer high quality health care coverage for individuals and families, currently serving over 170K members.
 - We believe that everyone deserves access to services and supports needed to live a healthier life.
 - As the only locally-owned and -managed non-profit health plan in the area, our commitment to our Members is to provide great health care benefits backed by outstanding service, delivered by people who live right here in South Texas.
 - Our goal is to help San Antonio and surrounding areas achieve more successful health outcomes by putting community first.

6 key health plan strategies contributing to high performance in Antibiotic Related HEDIS measures

- Sharing Measure Results
- Member and Provider Education
- Collaborative Monthly Meetings
- Quality Related Alternative Payment Models
- Denominator Management
- Tracking Progress and Adjusting Strategies



- **Strategy 1: Sharing Measure Results**
- **Strategy:** Started sharing results of URI fallout with our top 10 PCP provider groups in 2016.
- **Outcome:** This initiative led to significant improvement in provider coding and appropriate use of antibiotics.
- **Continuous Improvement:** Ongoing engagement has sustained improvements through 2025.

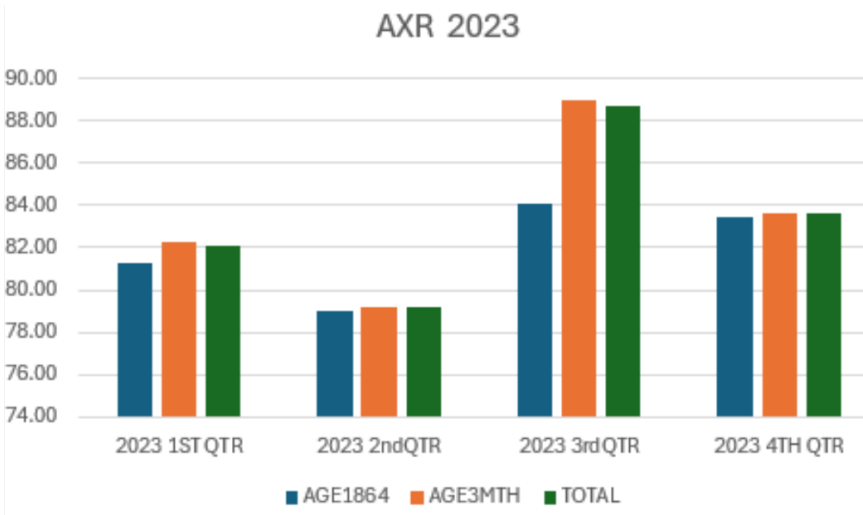


Strategy 1: Sharing Measure Results

- Example of URI measure fallout data shared at individual provider level

MEMBER ID	Mem_DOB	Mem_Name	Drug_Name	Presc_Name	REND_TIN	DISPENSED	Plan_Paid
7XXXXXXXXX	9/24/XXXX	MEMBER 1	AZITHROMYCIN	PROVIDER A	7109XXXXX	9/4/2018	8.67
8XXXXXXXXX	4/29/XXXX	MEMBER 2	CEFDINIR	PROVIDER A	7109XXXXX	7/26/2018	22.89

- Example AXR trend data shared at PCP group level



Strategy 2: Member and Provider Education



- **Member Education on Appropriate Antibiotic Use:**
 - Targeted social media posts with links to additional information from reputable sources

Strategy 2: Member and Provider Education

CONQUERING COLD AND FLU SEASON

Staying Healthy and Avoiding Antibiotics

LET'S TALK ABOUT OUR LEAST-FAVORITE SEASON

As the weather cools down and cold and flu season officially arrives, it's important to protect yourself and your family from getting sick with things like common chest and throat infections. Here are some simple ways to stay healthy, straight from the Centers for Disease Control and Prevention (CDC).

KEEP THOSE HANDS CLEAN

- **Use Soap and Water:** Wash your hands often with soap and water *for at least 20 seconds*. This helps get rid of germs that can make you sick.
- **Use Hand Sanitizer:** If you can't wash your hands, use hand sanitizer with at least 60% alcohol.
- **Don't Touch Your Face:** Try not to touch your eyes, nose, or mouth, especially when your hands aren't clean.

STRENGTHEN YOUR BODY

- **Exercise:** Being active helps keep your body strong and healthy.
- **Eat Healthy Foods:** Eat lots of fruits, vegetables, and whole grains to keep your immune system strong.
- **Get Enough Sleep:** Aim for 7–9 hours of sleep each night.
- **Drink Water:** Staying hydrated is important for your health.

ROLL UP YOUR SLEEVES AND GET VACCINATED

- **Get Your Flu Shot:** The flu vaccine is the best way to protect yourself from the flu. Make sure to get one every year.
- **Get an Updated COVID Shot:** Getting vaccinated prevents severe illness and potentially lowers your chances of developing Long COVID.
- **Get Your Respiratory Syncytial Virus (RSV) Shot:** To prevent severe RSV disease, the CDC recommends either pregnant mothers or adults who are 60 and above get vaccinated.

STOP THE SPREAD OF GERMS

- **Get Tested:** If you're not feeling well, get tested for common chest or throat infections like COVID-19, RSV, Flu (Influenza), and Strep to get appropriate treatment from a doctor.
- **Stay Home if You're Sick:** If you're not feeling well, it's best to stay home so you don't spread germs to others.
- **Stay Away From Sick People:** Try to avoid close contact with people who are sick.
- **Wear a Mask:** Wearing a mask can help block germs, helping you breathe in fewer germs and spread fewer germs to others.

SANITIZE YOUR LIVING SPACE

- **Disinfect Surfaces:** Kill germs by wiping down things that you touch a lot, like doorknobs and light switches.

WHY YOU SHOULDN'T ASK FOR ANTIBIOTICS

If you have a bacterial infection—like strep throat—your doctor might prescribe antibiotics. But for colds and the flu, they won't help. Antibiotics don't work on viruses, only on bacteria. Here's why you shouldn't ask for antibiotics if you have a cold or the flu:

- **Antibiotic Resistance:** If you use antibiotics too much, the medicine might stop working against bacteria. This makes it harder to treat bacterial infections in the future.
- **Side Effects:** Taking antibiotics when you don't need them can cause problems like an upset stomach or allergic reactions.

Respiratory Virus Guidance Snapshot

Core Prevention Strategies

- Immunizations
- Hygiene
- Steps for Cleaner Air
- Treatment
- Stay Home and Prevent Spread*

Additional Prevention Strategies

- Masks
- Distancing
- Tests

***Stay home and away from others until,**

- and
- Your symptoms are getting better
- and
- You are fever-free (without meds) for 24 hrs

Then take added precaution for the next 5 days

Layering prevention strategies can be especially helpful when:

- ✓ Respiratory viruses are causing a lot of illness in your community.
- ✓ You or those around you have risk factors for severe illness.
- ✓ You or those around you were recently exposed, are sick, or are recovering.

WHEN YOU SHOULD SEE A DOCTOR

If you come down with a chest or throat infection, rest, drink water, and use over-the-counter medicine. But if you have trouble breathing, chest pain, or a high fever that won't go away, see a doctor right away.

By following these tips, you can stay healthy, beat the cold and flu season, and avoid taking antibiotics. This way, antibiotics will work when they're really needed.

This information is based on advice from the Centers for Disease Control and Prevention (CDC) and research on how to prevent common chest or throat infections, and when antibiotics are needed.

1. CDC updates and simplifies respiratory virus recommendations (2024) Centers for Disease Control and Prevention. Available at: [CDC.gov/Media/Releases/2024/p0301-Respiratory-Virus.html](https://www.cdc.gov/media/releases/2024/p0301-respiratory-virus.html) (Accessed: 30 Aug 2024).

2. Respiratory virus guidance (2024) Centers for Disease Control and Prevention. Available at: [CDC.gov/Respiratory-Viruses/Guidance/index.html](https://www.cdc.gov/respiratory-viruses/guidance/index.html) (Accessed: 30 Aug 2024).

Community HealthCARE | Winter 2024 37

- Member Education on Appropriate Antibiotic Use:
 - Newsletter articles:
 - How to Stay Healthy During Cold and Flu Season
 - Why You Shouldn't Ask for Antibiotics

Strategy 2: Member and Provider Education

- **Provider Education:** In 2016, a clinical tip sheet was created by our pharmacy team to provide CDC-recommended guidelines for antibiotic use in bacterial infections, including strep throat and acute bacterial rhinosinusitis.
- **Distribution:** Over the years, tip sheet was revised for pediatric and adult populations. In 2023 alone, approximately 100 tip sheets were distributed to our PCP network.
- **Impact:** This resource has been key in reinforcing best practices in antibiotic prescribing.



Provider Tip Sheet: Upper Respiratory Infections

Review our latest Provider Tip Sheets summarizing the most recent recommendations from the CDC for appropriate antibiotic prescribing for adults and pediatrics seeking care in an outpatient setting for common upper respiratory infections and other illnesses. Antibiotic prescribing guidelines establish standards of care and focus quality improvement efforts.

[Learn More](#)



Pediatric Outpatient Treatment Recommendations

Common Upper Respiratory Infections & Other Illnesses Antibiotic Prescribing and Use

Antibiotic prescribing guidelines establish standards of care, focus quality improvement efforts, and improve patient outcomes. The table below summarizes the most recent principles of appropriate antibiotic prescribing for children obtaining care in an outpatient setting for the following six diagnoses: acute rhinosinusitis, acute otitis media, bronchiolitis, pharyngitis, common cold, and urinary tract infection.

Condition	Epidemiology	Diagnosis	Management
Acute sinusitis ^{1,2}	Sinusitis may be caused by viruses or bacteria, and antibiotics are not guaranteed to help even if the causative agent is bacterial.	<p>Halitosis, fatigue, headache, decreased appetite, but most physical exam findings are non-specific and do not distinguish bacterial from viral causes. A bacterial diagnosis may be established based on the presence of one of the following criteria:</p> <ul style="list-style-type: none"> Persistent symptoms without improvement: nasal discharge or daytime cough >10 days. Worsening symptoms: worsening or new onset fever, daytime cough, or nasal discharge after initial improvement of a viral URI. Severe symptoms: fever $\geq 39^{\circ}\text{C}$, purulent nasal discharge for at least 3 consecutive days. <p>Imaging tests are no longer recommended for uncomplicated cases.</p>	<p>If a bacterial infection is established:</p> <ul style="list-style-type: none"> Watchful waiting for up to 3 days may be offered for children with acute bacterial sinusitis with persistent symptoms. Antibiotic therapy should be prescribed for children with acute bacterial sinusitis with severe or worsening disease. Amoxicillin or amoxicillin/clavulanate remain first-line therapy. Recommendations for treatment of children with a history of type I hypersensitivity to penicillin vary. In children who are vomiting or who cannot tolerate oral medication, a single dose of ceftriaxone can be used and then can be switched to oral antibiotics if improving. For further recommendations on alternative antibiotic regimens, consult the American Academy of Pediatrics or the Infectious Diseases Society of America guidelines.

Condition	Epidemiology	Diagnosis	Management
Pharyngitis ^{4,6}	<ul style="list-style-type: none"> Recent guidelines aim to minimize unnecessary antibiotic exposure by emphasizing appropriate use of rapid antigen detection test (RADT) testing and subsequent treatment During the winter and spring, up to 20% of asymptomatic children can be colonized with group A beta-hemolytic streptococci (GAS), leading to more false positives from RADT-testing and increases in unnecessary antibiotic exposure. Streptococcal pharyngitis is primarily a disease of children 5-15 years old and is rare in children <3 years. 	<ul style="list-style-type: none"> Clinical features alone do not distinguish between GAS and viral pharyngitis. Children with sore throat plus 2 or more of the following features should undergo a RADT test: <ul style="list-style-type: none"> absence of cough presence of tonsillar exudates or swelling history of fever presence of swollen and tender anterior cervical lymph nodes age < 15 years Testing should generally not be performed in children < 3 years in whom GAS rarely causes pharyngitis and rheumatic fever is uncommon. In children and adolescents, negative RADT tests should be backed up by a throat culture; positive RADTs do not require a back-up culture. 	<ul style="list-style-type: none"> Amoxicillin and penicillin remain first-line therapy. For children with a non-type I hypersensitivity to penicillin: cephalexin, cefadroxil, clindamycin, clarithromycin, or azithromycin are recommended. For children with an immediate type I hypersensitivity to penicillin: clindamycin, clarithromycin, or azithromycin are recommended. GAS antibiotic resistance to azithromycin and clindamycin are increasingly common. Recommended treatment course for all oral beta-lactams is 10 days. For specific treatment recommendations and dosing, visit the Pharyngitis (Strep Throat) page for clinicians.
Common cold or non-specific upper respiratory tract infection (URI) ⁴⁷	<ul style="list-style-type: none"> The course of most uncomplicated viral URIs is 5 – 7 days. Colds usually last around 10 days. At least 200 viruses can cause the common cold. 	<ul style="list-style-type: none"> Viral URIs are often characterized by nasal discharge and congestion or cough. Usually nasal discharge begins as clear and changes throughout the course of the illness. Fever, if present, occurs early in the illness. 	<ul style="list-style-type: none"> Management of the common cold, nonspecific URI, and acute cough illness should focus on symptomatic relief. Antibiotics should not be prescribed for these conditions. There is potential for harm and no proven benefit from over-the-counter cough and cold medications in children < 6 years. These substances are among the top 20 substances leading to death in children <5 years. Low-dose inhaled corticosteroids and oral prednisolone do not improve outcomes in children without asthma.

Adapted from CDC Antibiotic Prescribing and Use. Accessed at [Outpatient Clinical Care for Pediatric Populations | Antibiotic Prescribing and Use | CDC](#)

Strategy 2: Member and Provider Education

Appropriate Testing for Pharyngitis (CWP) & Avoidance of Antibiotic Treatment for Acute Bronchitis/Bronchiolitis (AAB)

Community First is dedicated to improving the quality of care for our Members by providing essential information about two important Healthcare Effectiveness Data and Information Set (HEDIS®) measures: the avoidance of antibiotic treatment for acute bronchitis and acute bronchiolitis, and appropriate testing for pharyngitis.

AVOIDANCE OF ANTIBIOTIC TREATMENT FOR ACUTE BRONCHITIS/BRONCHIOLITIS (AAB)

Our goal is to ensure safer antibiotic use to reduce the incidence of antibiotic resistance. Current guidelines recommend against antibiotic treatment for acute bronchitis in adults who are otherwise healthy, while also recognizing antibiotics may be necessary in certain Members with an appropriate diagnosis to support antibiotic use.

HEDIS® MEASURE DESCRIPTION

The percentage of episodes for Members ages three months and older with a diagnosis of acute bronchitis/bronchiolitis that did not result in an antibiotic dispensing event.



BEST PRACTICES

At least 90% of acute bronchitis episodes are viral, hence antibiotics may be unnecessary and result in adverse effects and contribute to antimicrobial resistance. A prospective observational study showed no difference in outcomes when antibiotics were prescribed to patients with green or yellow sputum, indicating that this is not a useful indicator of bacterial infection.¹ Multiple Cochrane reviews showed no benefit to using antibiotics

Applicable codes	
Description	Codes
Acute Bronchitis	J20.3-J20.9, J21.0, J21.1, J21.8, J21.9
Pharyngitis	J02.0, J02.8, J02.9, J03.00, J03.01, J03.80, J03.81, J03.90, J03.91

for acute bronchitis in otherwise healthy individuals and those with delayed or no antibiotic treatment.^{2,3}

Strategies to assist can include^{4,5}:

- Address patient concerns in a compassionate manner.
- Discuss expected course of illness and cough duration (2 to 3 weeks).
- Describe the infection as a viral illness rather than bacterial or a "chest cold".
- Explain that antibiotics do not improve symptoms and can lead to adverse effects and antibiotic resistance.
- Discuss the treatment plan and supportive therapy like over-the-counter medications.

1. Butler, C.C. et al. (2011) "Antibiotic prescribing for discoloured sputum in acute cough/lower respiratory tract infection," *European Respiratory Journal*, 38(1), pp. 119–125. doi:10.1183/09031936.00139110.

2. Smith, S.M. et al. (2014) "Antibiotics for acute bronchitis," *Cochrane Database of Systematic Reviews* [Preprint]. doi:10.1002/14651858.cd000245.pub3.

3. Spurling, G.K. et al. (2013) "Delayed antibiotics for respiratory infections," *Cochrane Database of Systematic Reviews* [Preprint]. doi:10.1002/14651858.cd004417.pub4.

4. Kinkade S. et al. (2016) "Acute bronchitis," *Am Fam Physician*, 94(7), pp. 560–565. PMID: 27929206.

5. Albert I.H. (2010) "Diagnosis and treatment of acute bronchitis," *Am Fam Physician*, 82(11), pp. 1345–50. PMID: 21121518.

APPROPRIATE TESTING FOR PHARYNGITIS (CWP)

Our goal is to ensure proper testing and treatment of pharyngitis to prevent the

spread of sickness, while reducing the unnecessary use of antibiotics that can lead to adverse clinical outcomes such as *Clostridium difficile* infections and antibiotic resistance.

HEDIS® MEASURE DESCRIPTION

The percentage of episodes for Members three years and older where the Member was diagnosed with pharyngitis, dispensed an antibiotic, and received a group A streptococcus (strep) test for the episode.

BEST PRACTICES

The most common bacterial cause of acute pharyngitis is Group A streptococcal (GAS), which is responsible for 5–15% of sore throat visits in adults and 20–30% in children. Therefore, accurate diagnostic testing via rapid antigen detection test (RADT) and/or culture should be performed since most clinical features do not discriminate between GAS and viral pharyngitis. Common respiratory virus causes include adenovirus, rhinovirus, and respiratory syncytial virus. Appropriate antimicrobial therapy is imperative as well to prevent the progression to more severe complications and transmission to close contacts of the patient.

1. Shulman, S.T. et al. (2012) "Clinical practice guideline for the diagnosis and management of Group A streptococcal pharyngitis: 2012 update by the Infectious Diseases Society of America," *Clinical Infectious Diseases*, 55(10), doi:10.1093/cid/cir629.

2. Clinical guidance for Group A streptococcal pharyngitis (2022) Centers for Disease Control and Prevention. Available at: <https://www.cdc.gov/group-a-strep/hcp/clinical-guidance/strep-throat.html> (Accessed: 30 August 2024).

Applicable codes	
Description	Codes
CPT: Group A Strep Test	87070, 87071, 87081, 87430, 87650-87652, 87880

- Provider Education on CWP and AAB metrics:
 - Winter 2024 newsletter article

Strategy 3: Collaborative Monthly Meetings

- **Proactive Communication:** We regularly share our progress on antibiotic stewardship during quarterly collaborative meetings with internal teams and high-volume PCP groups. Led by our Medical Directors.
 - Present data on measure performance and benchmarking
 - Share best practices for specific measures, including coding and strategies for patient management
 - Include PharmDs as subject matter experts on antibiotic use
 - Discuss any identified barriers or challenges
- **Engagement and Buy-In:** These meetings help garner buy-in from our providers, enabling the continued success of our stewardship strategies.

Strategy 4: Quality-Related APMs

- **Alternative Payment Models:**
 - Alignment with state Pay for Quality (P4Q) Measures when applicable.
 - **Provider Incentive Plan:** Providers can earn extra revenue for meeting quality measures related to antibiotic use.
 - e.g., Providers disincentivized if they have even one episode of a URI fallout, motivating them to maintain appropriate prescribing practices.
 - **Value-Based Total Cost of Care (TCOC)** arrangements incorporating targeted quality metrics.
 - Our high-volume PCP groups are in TCOC contracts.
 - Approximately 40% of total membership.
- **Outcome:** This system promotes accountability and incentivizes sustained improvement.

Strategy 4: Quality Related APM's

Minimum Panel Size 100		2023 Level II APM - PCP					
METRIC	Baseline Performance CY 2022	ELIGIBILITY CRITERIA		IMPROVEMENT OVER SELF + COMPARED TO BENCHMARK = POINTS EARNED IF ELIGIBILITY CRITERIA MET			
				PCP Group Improvement over Self	Provider Rate Achieved Compared to Benchmarks		
	POINTS AVAILABLE		1/2 point	1 point	2 point	3 points (GOAL)	Loss of 1/2 point
URI - Appropriate treatment for Upper Respiratory Infection (URI). Percent of Members (3 mos.-18 years of age) diagnosed with upper respiratory infection and were NOT dispensed an antibiotic on DOS or on any day within 3 days after episode. Calculations based on each quarter performance.	N/A	*	N/A	N/A	N/A	N/A	Less than 100% compliance
Rewards in PMPM: >= 1 pt = \$1.00, >= 2 pt = \$1.25, >= 3 pt = \$1.50, >= 4 pt = \$1.75, >= 5 pt = \$2.00, >= 6 pt = \$2.25, >= 7 pt = \$2.50, >= 8 pt = \$2.75, >= 9 pt = \$3.00							
Provider Rate Compared to Benchmarks: 2 Points - 2021 Final State HEDIS Rates, 3 Points - 2021 Quality Compass (NCQA) National HEDIS Rates							

Strategy 5: Denominator Management as a Best Practice

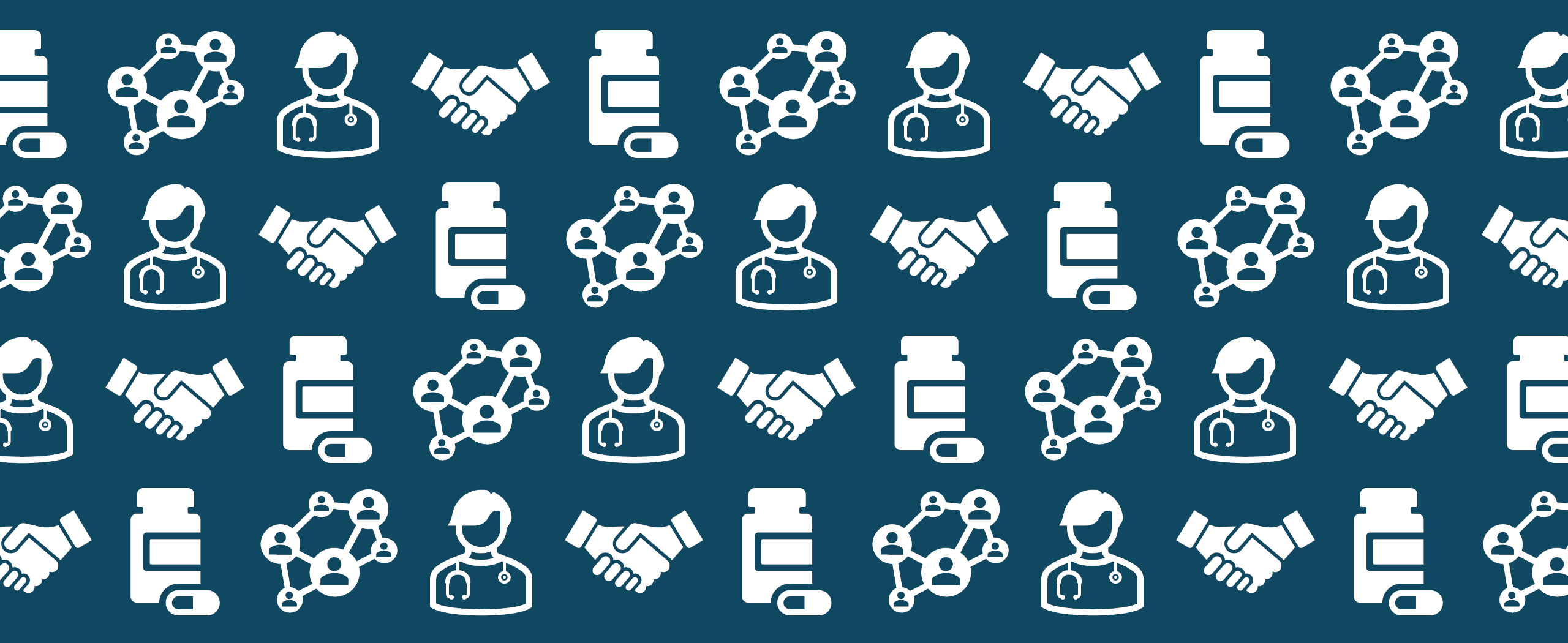
- **Denominator Management:** A critical element of our strategy is effective management of the denominator in HEDIS measures.
- **Exclusion Review:** We review instances where exclusions may apply (e.g., comorbidities, past medical history) to ensure that the denominator reflects accurate eligible populations for the measure.
- **Best Practice:** This process improves the precision of performance calculations and helps us focus on members where improvement in care is most needed.

Strategy 6: Tracking Progress and Adjusting Strategies

- **Monitoring:** We continuously track progress on all interventions and adapt when needed.
 - **HEDIS monthly project** – proactive approach; analyze trends
 - Analysis of fallouts revealed that some inappropriate antibiotic use was attributed to urgent care centers
- **Flexibility:** If a particular strategy shows limited success, we pivot and implement alternative approaches to ensure we meet performance targets.
 - Considering APM with in-network urgent care centers
 - Reward excellence in antibiotic stewardship
 - Distinction for urgent care centers that comply with the CDC's Core Elements for Outpatient Antibiotic Stewardship
 - Promoting telehealth options and evening and weekend availability at PCP offices to reduce utilization of higher levels of care

Key Takeaways

- **Summary:** Community First Health Plans has implemented a multi-faceted approach to improve antibiotic prescribing practices, with a proven track record of success in HEDIS antibiotic measures.
 - Sharing performance
 - Measure Education
 - Collaboration with providers
 - APMs
 - Denominator Management
 - Agility
- **Future State:** Continue evolving our strategies and further enhance collaboration with our providers to sustain high performance.
 - Timely actionable data sharing
 - Additional provider groups in TCOC contracts with quality expectations
 - Comprehensive provider dashboards



PROMOTING OUTPATIENT ANTIBIOTIC STEWARDSHIP WITH HEDIS MEASURES

STATE HEALTH DEPT INSIGHTS FROM THE PAAARC PROJECT

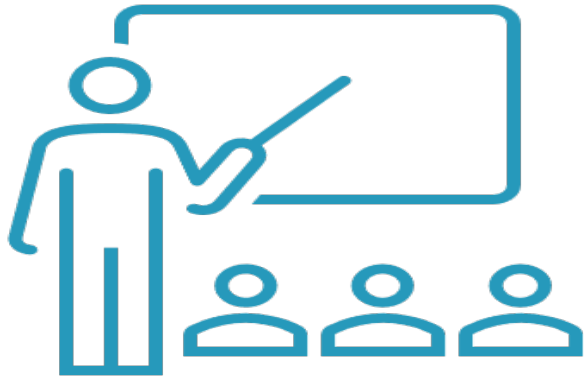
Erica Stohs, MD, MPH

Lead Antimicrobial Stewardship Policy Advisor

Disclosures

- I received funding support from Merck and bioMérieux for investigator-initiated studies based at the University of Nebraska Medical Center (former employer).

Outline



Antimicrobial
Stewardship Expertise
& Education



Partnerships



Progress

Stewardship Expertise & Education



WA DOH Antimicrobial Stewardship Team



Jessica Zering
AMS/ID Pharmacist



Erica Stohs
AMS/ID Physician

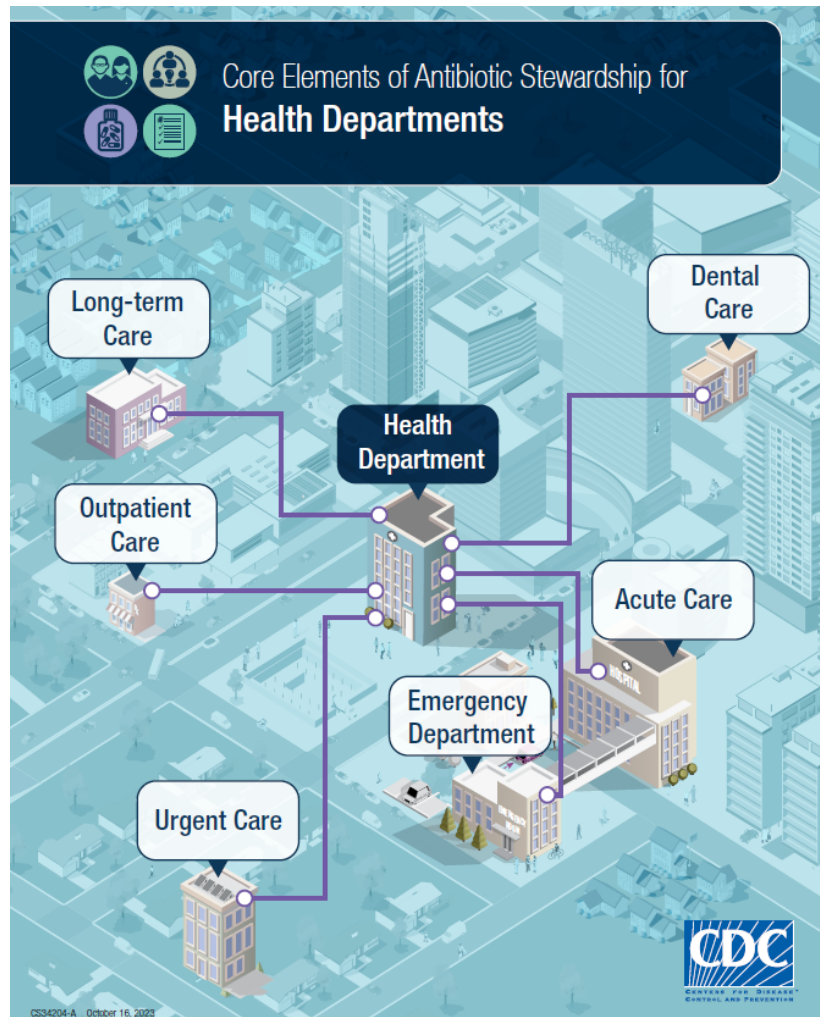


Katarina Kamenar
AMS Epidemiologist



Marisa D'Angeli
Medical
Epidemiologist

Antimicrobial Stewardship Staff in State, Local & Territorial Health Departments



- Support available in many jurisdictions
 - Analytical support
 - Education & guidance
 - Organizational partnerships
- Many of us are CDC grant-funded
- As of July 2023:
 - **382** unique persons working on stewardship
 - **Range: 1-24**
 - **Average: 6.4** persons per jurisdiction

Sources: CDC Staff directory as of July 2023

Core Elements of Antibiotic Stewardship for Health Departments |

Antibiotic Prescribing and Use | CDC

State Health's Stewardship Task

Incentivize implementation of a toolkit to track and report NCQA HEDIS measure for antimicrobial utilization for respiratory conditions

Provide funding to support two healthcare organizations to implement

Measure with peer comparison

Provide feedback to providers

Toolkit

WASHINGTON STATE DEPARTMENT OF HEALTH

Prescribing Appropriate Antibiotics for Acute Respiratory Conditions (PAAARC)

Toolkit

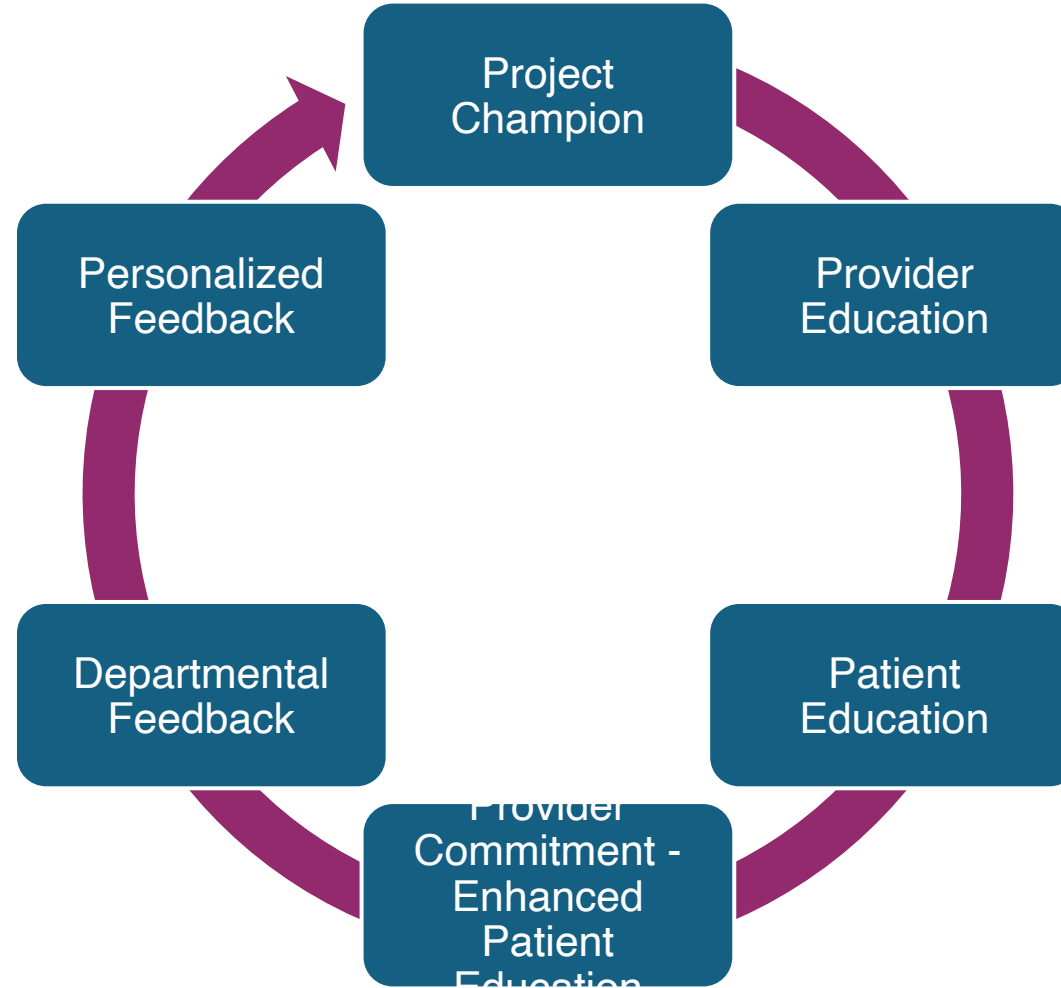
This toolkit was adapted from the CDC MITIGATE antimicrobial stewardship toolkit: a guide for practical implementation in adult and pediatric emergency department and urgent care settings.¹

[Prescribing Appropriate Antibiotics for Acute Respiratory Conditions Toolkit](#)

TABLE OF CONTENTS

Background	3
Antimicrobial Stewardship	3
What Are HEDIS Measures?	4
Overview of the Toolkit	5
Project Process/Timeline	6
Project Preparation	8
Identify a Project Champion	8
Baseline Data Extraction	8
Select Your Educational Materials	8
Provider Commitment Planning	10
Announce the Program to Your Team	13
Implementation	14
Provider Education	14
Clinician Commitment	15
Patient Education	15
Provider Feedback	15
How to Disseminate Feedback	16
Sample Provider Letters	17
References	19

Implementation Process



Project Champion

Organizational or
clinic leader
enthusiastic about
quality
improvement

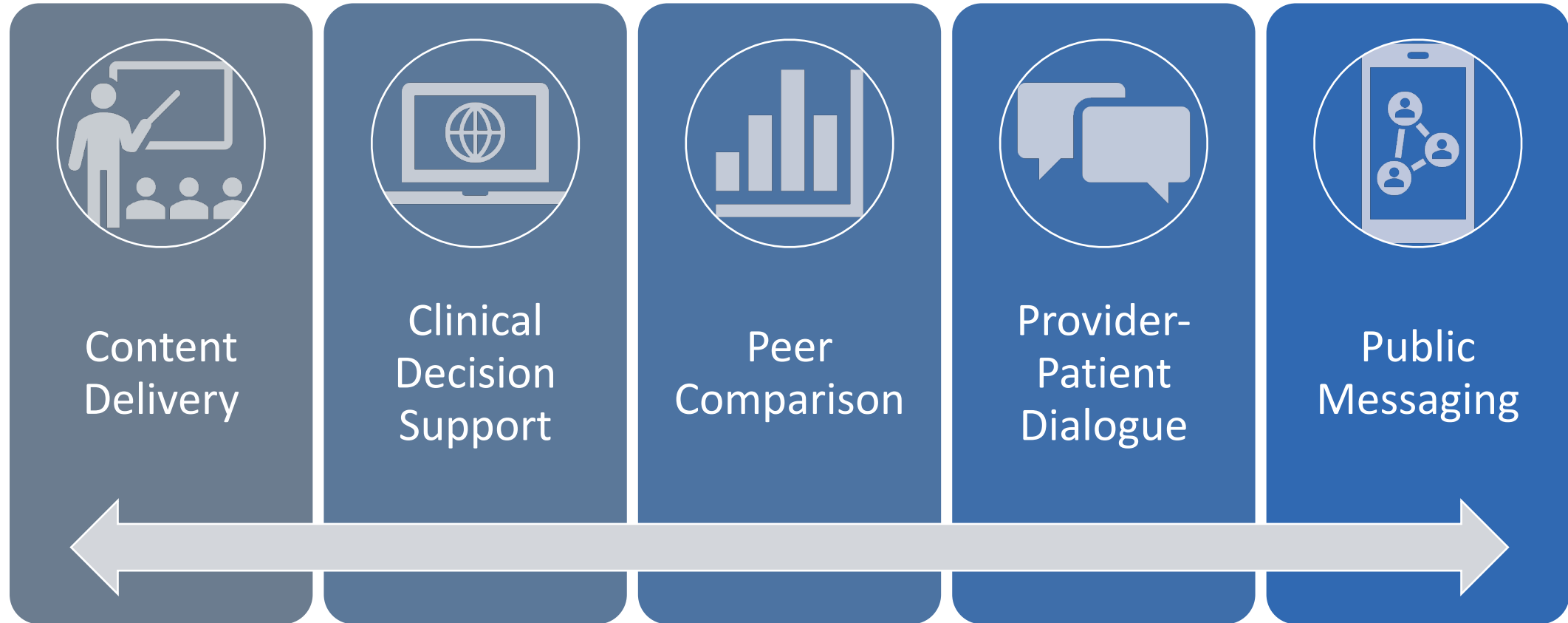
Respected by
colleagues

Motivated to
collaborate with
stakeholders

Implements project

Tracks workload
process measures

Educational Delivery Options



Provider Education

“Nudging” Randomized Control Trial (RCT): ABX prescribing for inappropriate ARI diagnoses

5 primary care clinics, 14 clinicians, 954 patients

Intervention:
Displaying poster-sized commitment letters x 12 weeks

Results: reduced ABX prescribing by 19%

- Control: 43.5% → 52.7%,
- Posters: 42.8% → 33.7%

Meeker et al. JAMA 2014;174(3):425-31.



I care about your health.
That's why I'm committed to prescribing **antibiotics only when you need them.**

I won't prescribe antibiotics when they are unlikely to work.
Antibiotics can cure a lot of infections... but antibiotics don't work against viruses that cause the common cold, most coughs, and most sore throats.

I will consider how an antibiotic may harm you.

- Taking antibiotics increase the risk of antibiotic resistant bacteria (superbugs).
- You could experience side effects like harder-to-treat infection, skin rashes, allergic reaction, upset stomach, or diarrhea (which can be life-threatening).

How can you help?

- If you get an antibiotic, take it as prescribed.
- Don't save antibiotics or give them to someone else.

If you have questions about why you are not getting an antibiotic, ask me, your nurse, or your pharmacist.

For more information about appropriate use of antibiotics visit www.cdc.gov.



Clinic Name Here



Provider Feedback

Peer comparison improves antibiotic prescribing for ARIs

- RCT of 248 clinicians in 49 primary care clinics from 3 health systems¹
- Pre- & post-analysis of 73 VA PCPs in 7 clinics²
- Pre- & post-analysis of 165 Pediatric PCPs in 22 clinics³
- RCT of 3500 Canadian PCPs in Ontario⁴

¹Meeker et al. JAMA 2016;315(6):562-70. ²Shively et al. AAC 2019;64(1)10-1128. ³Clegg et al. Ped Qual & Safety 2019;4(4):e195. ⁴Schwartz et al. JAMA Intern Med 2021;181(9):1165-73.

Sample Clinic & Provider Level Feedback Templates

Dear Providers:

As part of our participation with the Washington State Department of Health's Prescribing Appropriate Antibiotics for Acute Respiratory Conditions (PAAARC) project, we are providing monthly reports for our clinic. For the month of _____, our clinic evaluated ## eligible patients with acute respiratory conditions. Of these, XX.X% received an antibiotic prescription by one of our providers. Our goal is __%.

Thank you for supporting our antibiotic stewardship efforts.

Dear Provider:

Our data indicates that ____ % of your visits for acute, uncomplicated bronchitis resulted in an antibiotic prescription.

Professional organizations recommend against antibiotic treatment for this condition. Guidance for the management of this illness in adults can be found here:

[CDC: Adult Outpatient Treatment Recommendations](#)

The top performer threshold was ##% for this period. Based on this, you are not a top performer.

We appreciate your partnership in this effort.

Patient Education



Viruses or Bacteria What's got you sick?

Antibiotics are often prescribed when they are not needed for respiratory infections. Antibiotics are only needed for treating certain infections caused by bacteria. Viral illnesses cannot be treated with antibiotics. When an antibiotic is not prescribed, ask your healthcare professional for tips on how to relieve symptoms.

Common Respiratory Infections	Common Cause			Are Antibiotics Needed?*
	Virus	Virus or Bacteria	Bacteria	
Common cold/runny nose	✓			No
Sore throat (except strep)	✓			No
COVID-19	✓			No
Flu	✓			No
Bronchitis/chest cold (in otherwise healthy children and adults)		✓		No**
Middle ear infection		✓		Maybe
Sinus infection		✓		Maybe
Strep throat			✓	Yes
Whooping cough			✓	Yes

*Antiviral drugs are available for some viral infections, such as COVID-19 or flu.

**Studies show that in otherwise healthy children and adults, antibiotics for bronchitis won't help patients feel better.

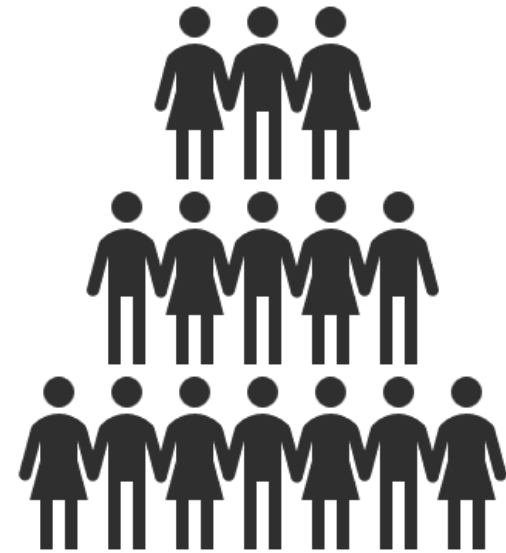


To learn more about antibiotic prescribing and use, visit www.cdc.gov/antibiotic-use.



CS328461-A

Partnerships



Advertising & Recruitment

To Qualify, A Healthcare Organization Must Have:

- ❑ 2+ primary care or urgent care clinics within their network
- ❑ Electronic medical record system with report extraction capability

Required Activities:

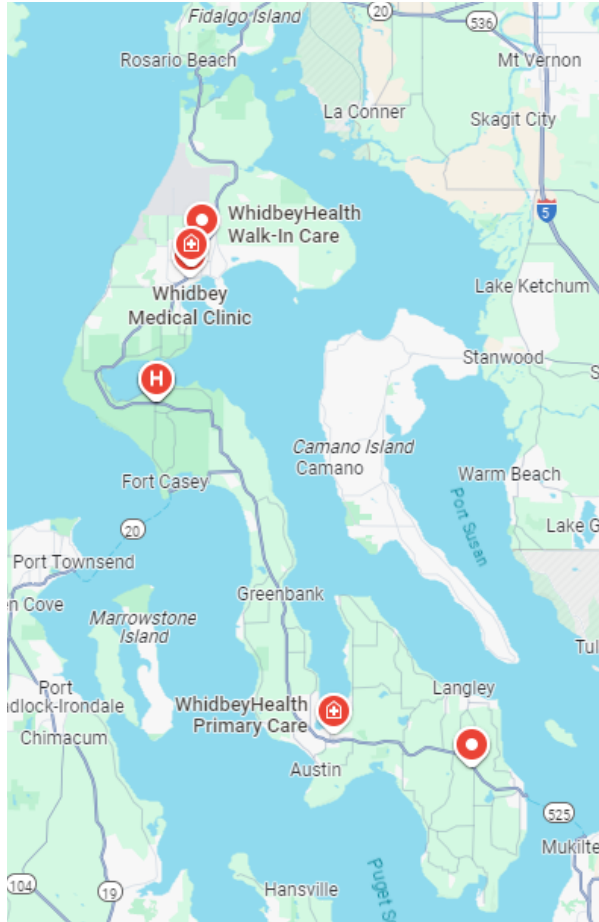
- Identify an organizational project champion
- Create audit & feedback report of selected HEDIS measure (modified AXR) for prescribers
- Provide education on appropriateness of antibiotics for acute respiratory conditions for providers and patients



Information/Materials:

- [Application link](#) (closed April 2024)
- [Recruitment Packet](#)
- [PAAARC Toolkit](#)
- Contact us: ams@doh.wa.gov

Two Organizations Selected



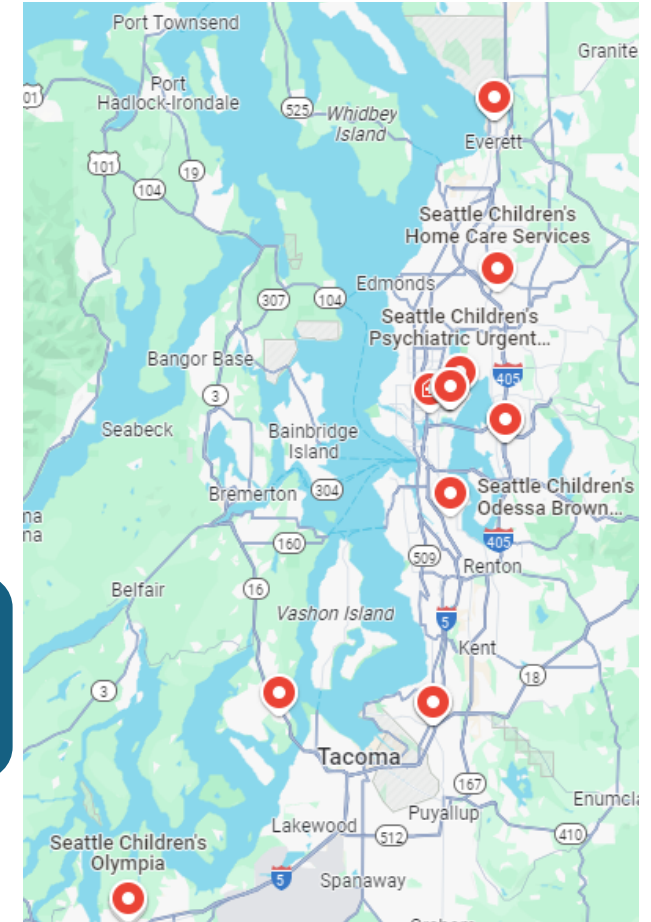
Primary
clinics:
4

Urgent
care: 2

Patients
served:
9,000

Urgent care: 4

Patients
served:
60,000



Pilot Activities

Quarterly Reports

- Educational inventory
- De-identified (modified) AXR measure data
- Expertise, skills needed to implement
- Time spent for project & implementation
- If manual chart review required

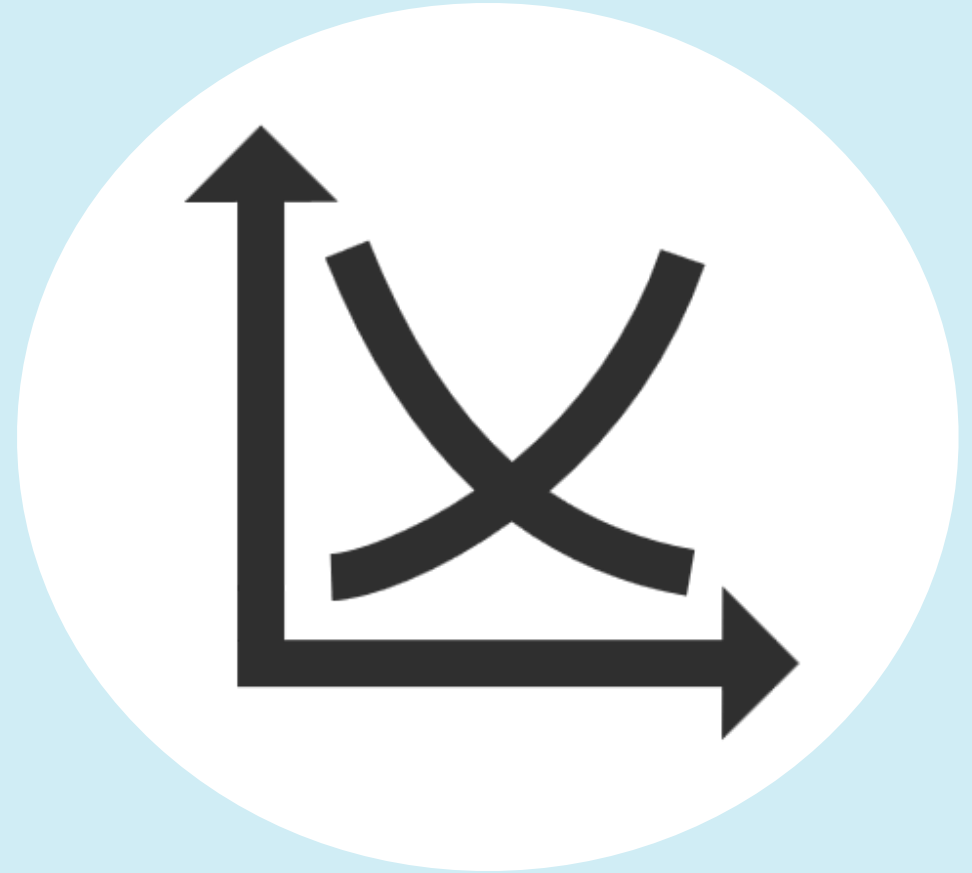
Educational Inventory

- Staff presentations
- Commitment posters
- Flyers
- Emails to providers

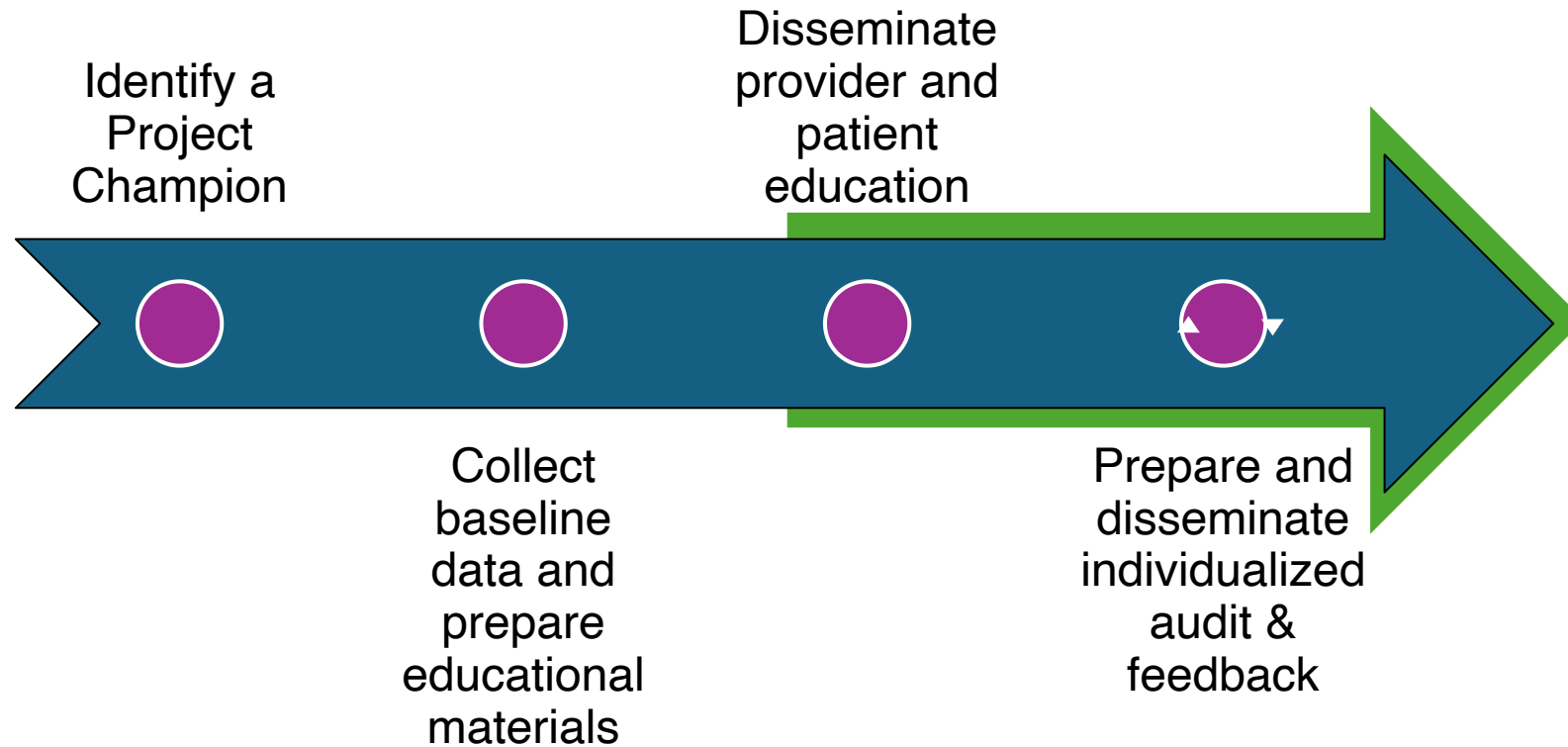
Performance Measures

- # Eligible providers
- # Receiving audit & feedback report
- AXR Score
 - Mean, median, range, quartiles

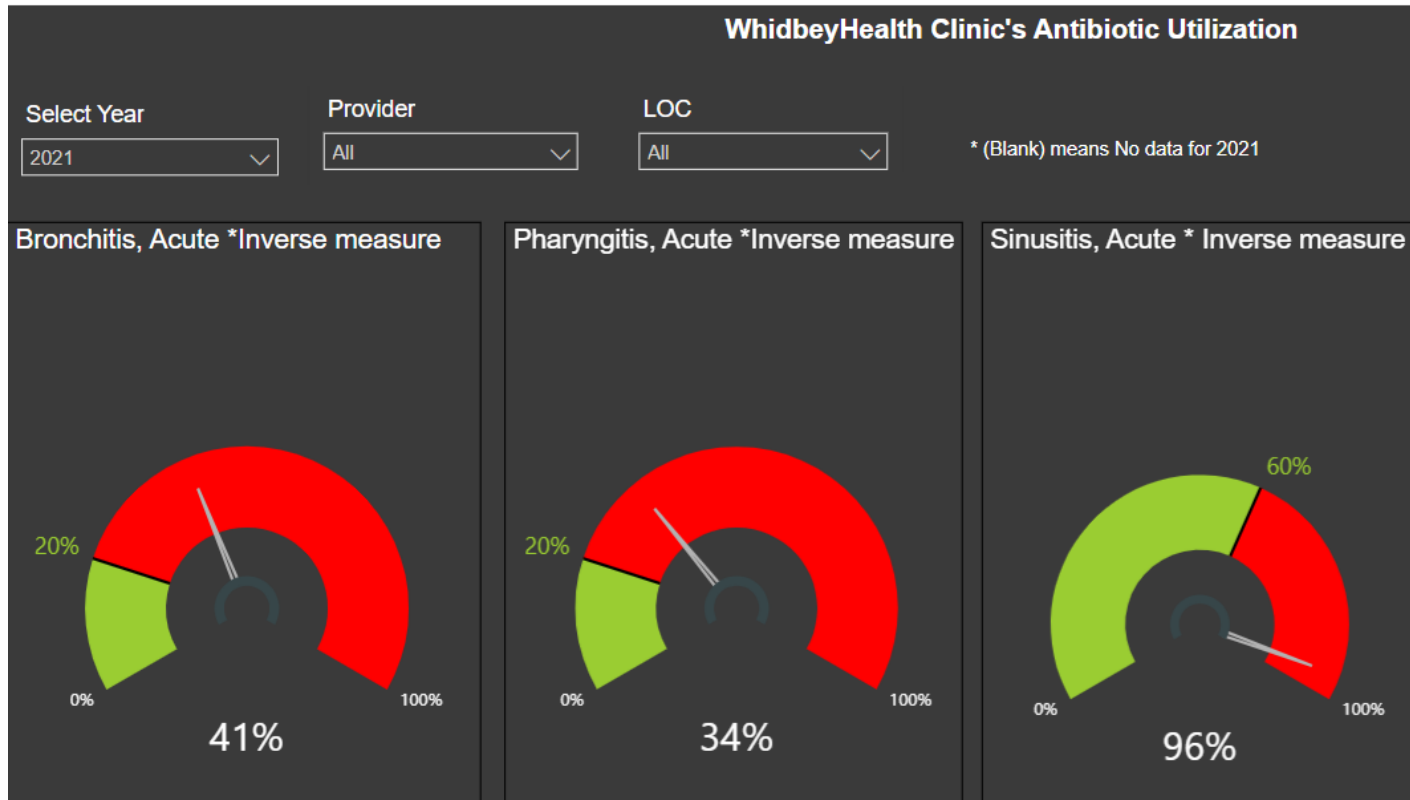
Progress



Progress



WhidbeyHealth



Dashboard demonstrating utilization of modified HEDIS measures and goals.

WhidbeyHealth

WhidbeyHealth Primary Care-Clinton
11245 State Route 525
Clinton, WA 98236
(360) 341-5252 (360) 341-8727

December 20, 2019
Page 1

Patient Information

For : PORTAL BUNNYTEST

Watchful Waiting

Your healthcare professional believes your illness may resolve on its own.

You should watch and wait. If not improved in a few days or have new symptoms or other concerns please call the office for a recheck.

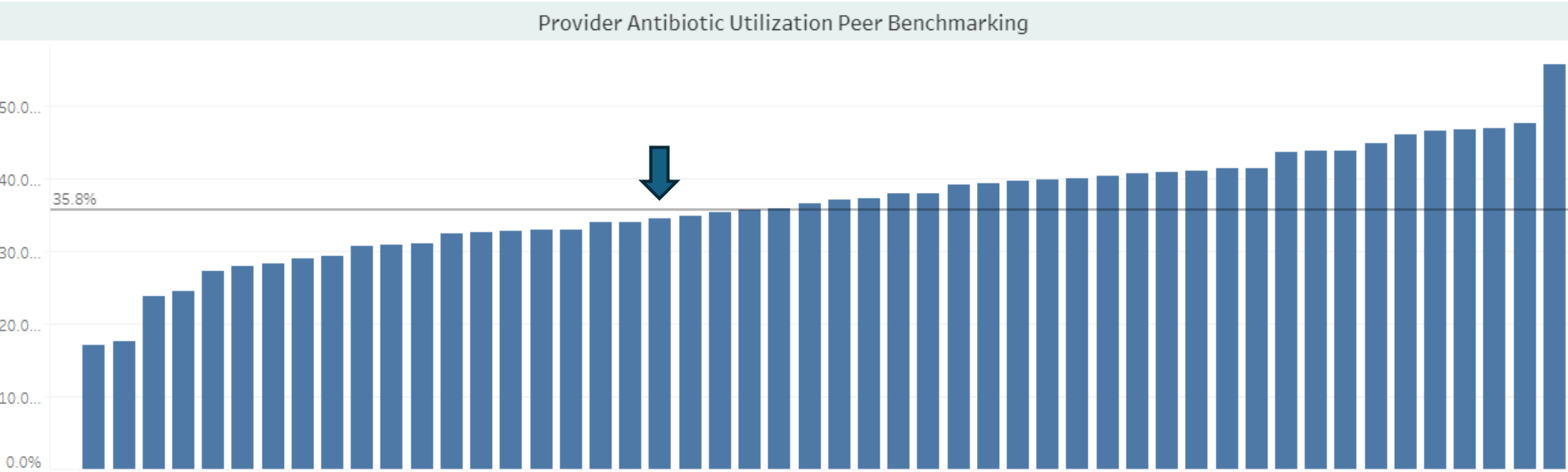
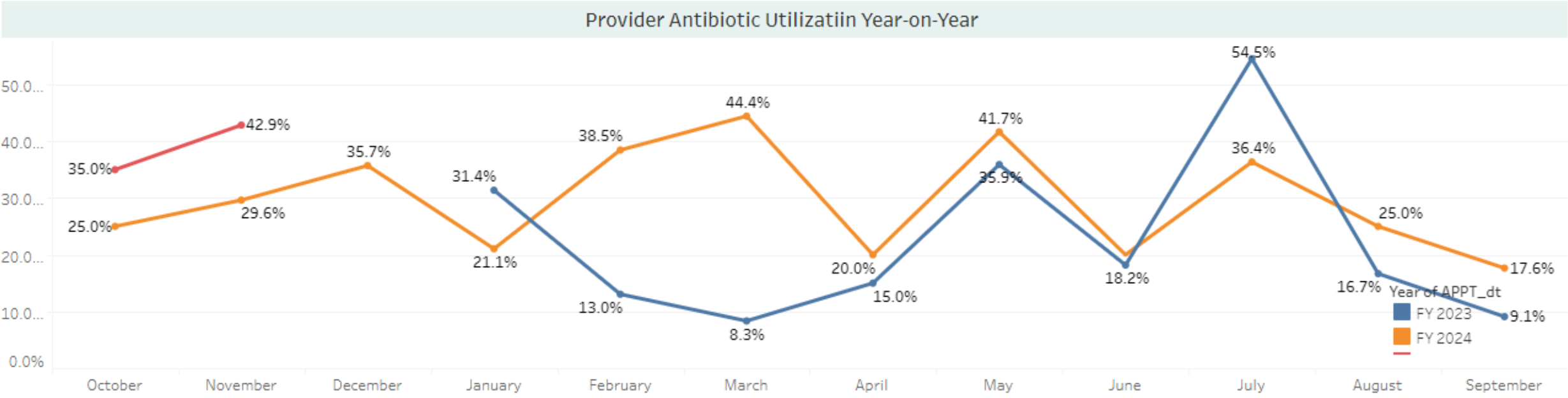
In the meantime, follow your healthcare professional's recommendations to help you feel better and continue to monitor your own symptoms over the next few days.

- ☐ Rest.
- ☐ Drink extra water and fluids.
- ☐ Use a cool mist vaporizer or saline nasal spray to relieve congestion.
- ☐ For sore throats in adults and older children, try ice chips, sore throat spray, or lozenges.
- ☐ Use honey to relieve cough. Don not give honey to an infant younger than 1.

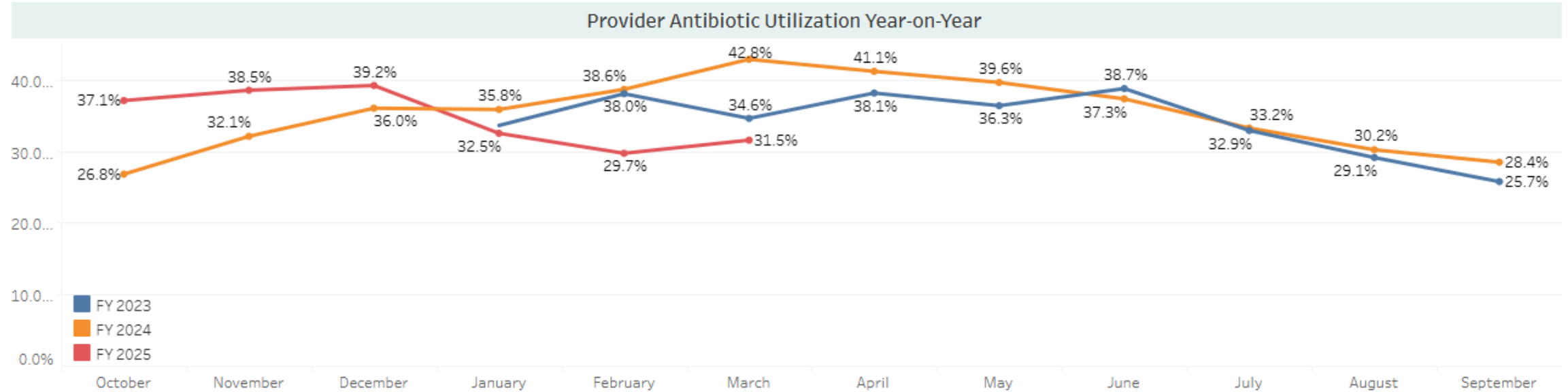
If you feel better, no further action is necessary. You don't need antibiotics. If you do not feel better, experience new symptom, or have other concerns, call your healthcare professional to discuss whether you need a recheck.

Andria L. Heggenes, EMR Test

Individualized Report Example



Seattle Children's



Challenges

- Organizational priorities (leadership & IT)
- Staff turnover
- Launching in the holiday season
- New EHR system
- IT Analytic support: >60 hours
- Time performing audit & feedback: 92 hours (manual chart review) vs 20 hours
- Providers ignore emails (50% read receipts)
- Providers get defensive
- AXR does not assess clinical appropriateness

Opportunities

Provider & data transparency

- Identified to peers

Leadership buy-in → greater incentives

- Tied it to providers' bonus

EHR integration

- Discharge instructions for ARI led to ones for ASB vs UTI also
- Dashboard linkage for sustainability

Recognition of high achievers → providers reach out about reports, how to improve

Expand to other settings (ED)

To expand the pilot, consider partnership with payers, data sources

Takeaways

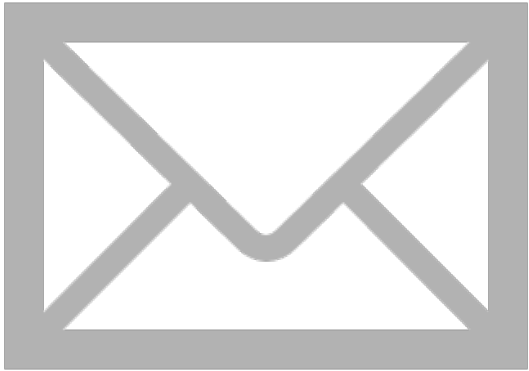
Feasible in
variety of
environments but
not one-size-fits-
all

Need IT analytic
support!

Be creative with
resources & how
to provide
feedback

Adapt as you go:
benchmarks &
feedback

Provider
incentivization is
important



Questions?



Reach our team at ams@doh.wa.gov

Erica Stohs, MD, MPH

Antimicrobial Stewardship Physician

Cell: 564-233-8711

erica.stohs@doh.wa.gov



To request this document in another format, call
1-800-525-0127. Deaf or hard of hearing
customers, please call 711 (Washington Relay) or
email doh.information@doh.wa.gov.



Questions



Steps to claim continuing education credits

1. Register for your course

Navigate to education.ncqa.org

Select Login with NCQA Account

Select “Create Account” if you do not have an existing account, complete the requested information to complete the form and to gain access to the account. If you have an existing account, log in using those same credentials.

Once you have logged on, click the course link to register: <http://bit.ly/44CyNeb>

2. Complete your course and download your certificate

Complete the Evaluation and Attestation to gain access to your certificate.

Click on your name at the top right to select your profile.

On profile, please be sure you have entered your Name and Credential(s) as they should appear on your certificate by clicking “edit” → “info” → “save”

Select Awards on the left to retrieve the certificate and download the PDF file

If you are a pharmacist completing a course offering CPE credits, please notify NCQA through ncqa.org within 14 calendar days that you have completed a CPE course. You must provide the title of the course, your NABP identification number and your DOB (month/date) within the notification to NCQA. We also recommend you update your education.ncqa.org profile with your NABP identification number