

PEDIATRIC ANTIMICROBIAL STEWARDSHIP IN THE RETAIL HEALTH SETTING



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BACKGROUND

Antibiotic resistance is an emerging public health threat in the United States.

The majority of antibiotic expenditures in the U.S. occur in the outpatient setting.

Nearly 1 in 3 antibiotics prescribed by physicians' offices, emergency departments, and hospital specialty clinics are unnecessary.

RESULTS **Online Dashboard - Outpatient Antibiotic Use** Children's Hospit MCJCH Outpatient Antibiotic Prescriptions DX Name Department Select Drug Name (AII) (AII) (AII) (AII)

AIMS

- 1. Identify and disseminate best practice pathways for community acquired pneumonia.
- 2. Gain hands-on skills in the development of an outpatient antibiotic use dashboard, and use this dashboard to identify targets for future antimicrobial stewardship interventions.
- 3. Provide feedback about antibiotic use to providers working in the retail health setting.

METHODS & ACTIVITIES

- Create an online educational module about diagnosis and management of pediatric community acquired pneumonia.
- **Develop an online dashboard for monitoring appropriate pediatric** antibiotic use in outpatient clinics associated with Vanderbilt Children's Hospital.
- Participate in VUMC practice-wide antimicrobial stewardship meetings.
- Provide in-person feedback and education regarding antimicrobial use and communication methods at one of the highest-prescribing Vanderbilt Health Clinic at Walgreens (twice weekly for 2 months).
- Develop and present a lecture on outpatient antimicrobial

		# of Prescriptions	Total Clinical Episodes	
Year Month	Clinic Type			
2018-12	Walk-in Clinic	2,570	6,819	37.7
	Retail Health Clinic	601	2,067	29.1
	Emergency Medicine	682	3,519	19.4
	Primary Care Clinic	772	14,362	5.4
	Surgical Specialty Clinic	205	13,885	1.5
	Medical Specialty Clinic	334	39,898	0.8
2018-11	Walk-in Clinic	1,795	6,042	29.7
	Emergency Medicine	533	3,169	16.8
	Retail Health Clinic	403	2,397	16.8
	Primary Care Clinic	637	16,240	3.9
	Surgical Specialty Clinic	175	14,703	1.2
	Medical Specialty Clinic	356	46,177	0.8

Quarterly Provider Feedback Reports Smith, Joe Provider Feedback for Clinic Type: Retail Health Clinic Last Completed Quarter is Q4 (Oct - Dec) **Provider Name** Last Quarter Antibiotic Rx Rate (Smith, Joe Previous Quarter Antibiotic Rx Rate (9 2018 Year-To-Date Antibiotic Rx Rate (Clinic Type Retail Health Clinic _ast Ouarter Antibiotic Rx Rate (' 30.0-Walk-in Clinic 28.0 Outpatient Antibiotic Prescribing Rate: Abx Rate: (Total # of Antibiotic Rxs)/(Total Clinical Episodes that can result in Rx) *100 26.0 ²⁰ Walgreen's Mean 20.8 November 201

Antibiotic Prescribing Trend Chart

Outpatient Antibiotic Prescribing Rate

Abx Rate: (Total # of Antibiotic Rxs)/(Total Clinical Episodes that can result in Rx) *100



stewardship that applies to a wide variety of practitioners.



https://www.youtube.com/watch?v=fZEN3DBISGA

DISCUSSION & CONCLUSIONS

Lessons Learned:

- Continued audit and feedback is needed to nudge prescribers to optimize their antibiotic prescribing.
- Antibiotic utilization data and stakeholder engagement and buy-in are paramount when designing and implementing antimicrobial stewardship interventions.
- There are effective communication strategies that can help providers avoid unnecessary antibiotic prescribing when they perceive that patients/families desire them.

<u>Next Steps</u>: Using information generated by the online dashboard, we have identified several key target areas to focus when expanding antimicrobial stewardship efforts to the outpatient setting, including walk-in clinics.

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