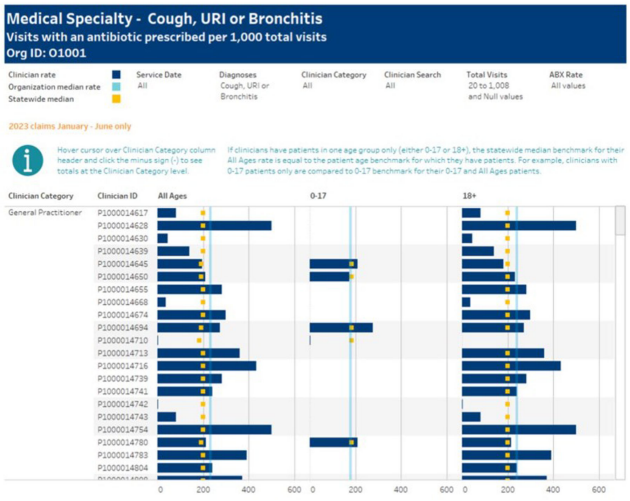
Table 2. Antibiotic visit rates for visits with the diagnoses of cough, URI, and bronchitis

Year	Antibiotic Visit Rate	Antibiotic Visits	Total Visits	Clinicians
2018	274	99,522	362,734	8,918
2019	242	91,864	379,885	9,175
2020	173	46,899	270,388	8,932
2021	146	43,449	296,844	8,629
2022	141	32,451	229,429	7,170
2023	167	17,524	105,043	6,204
Total	**202**	**331,709**	**1,644,323**	**13,350**
Clinician categories				
General Practitioner	194	94,211	485,895	4,059
NP or PA	229	144,016	628,458	4,222
Pediatrics	185	47,353	256,074	798
Emergency Medicine	187	29,303	156,959	961
Specialty Medicine	80	4,019	50,229	1,706
Surgical Specialty	328	5,564	16,978	921
Trainee	146	7,243	49,730	683
Total	**202**	**331,709**	**1,644,323**	**13,350**
Place of Service				
Emergency Department	194	51,540	265,088	6,396
Office/Clinic	203	251,549	1,239,315	12,637
Urgent Care	205	28,620	139,920	3,339
Total	**202**	**331,709**	**1,644,323**	**13,350**

Figure 1. Prescriber-level antibiotic prescribing rate for RTI compared to statewide and organizational benchmarks with AU Dashboard



clinicians from 57 organizations. Statewide benchmarks were developed for all diagnoses and RTI antibiotic visit rates (Tables 1 and 2). Visits by surgeons and advanced practitioners had the highest rates of antibiotic prescribing for tier 3 RTIs; rates were similar across places of service. Rates per individual prescriber were visually compared to the statewide and organization benchmarks within dashboards (Figure 1). **Conclusion:** All-payers' claims data provides a statewide data source to develop antibiotic visit rates, including a quality measure for visits associated with RTI. Overlying statewide and organizational medians provides a benchmark to identify outliers for further stewardship interventions. Piloting these dashboards will help improve access to AU data.

Antimicrobial Stewardship & Healthcare Epidemiology 2025;5(Suppl. S2):s45–s46
doi:10.1017/ash.2025.246

Presentation Type:
Poster Presentation
Subject Category: Antibiotic Stewardship

Lower Clinician Confidence is Associated with Longer Intended Treatment Duration for Outpatient Men with Urinary Tract Infections

Tyler Brehm[1], Larissa Grigoryan[2], Laura Dillon[3], Trenton Haltom[4] and Barbara Trautner[5]
[1]Baylor College of Medicine; [2]Baylor College of Medicine; [3]MEDVAMC; [4]Baylor College of Medicine and [5]Baylor College of Medicine

Background: There is limited evidence to guide the diagnosis and treatment of urinary tract infections (UTIs) in men. We hypothesized that lower clinician confidence in ability to correctly diagnose or treat UTIs in men would be associated with increased antibiotic treatment duration. **Methods:** We surveyed clinicians' knowledge and confidence in diagnosing and treating UTIs in outpatient men as well as their intention to prescribe a specific duration of antibiotics. We distributed the survey to outpatient primary care and emergency medicine providers, urologists, and internal medicine residents. We collected demographics on professional role (physician-attending, physician-trainee, advanced practice professionals [APPs]), specialty, and years in practice. Surveys were distributed on paper and electronically. Analysis involved t-test and ANOVA for continuous variables and Chi-squared for categorical variables as appropriate. Multiple logistic regression analyses were performed using the outcome variable of antibiotic treatment duration, categorized as appropriate (5-7 days) or inappropriate (> 7 days). **Results:** 186 of 363 distributed surveys were completed (51% response rate). Fifteen surveys were excluded due to the respondent specialty (e.g., dermatology, neurology, etc.), leaving 171 surveys for analysis. Of these, 60% were from trainees, 26% attendings, and 14% APPs (Figure 1). Most physicians (Figure 2) were internal medicine trained (81%), with a smaller proportion of family medicine (8%), urology (6%), and emergency medicine (5%). 14% of respondents reported an intention to treat UTIs in men for longer than 7

Figure 1. Professional Roles of Survey Respondents (*N*=171)

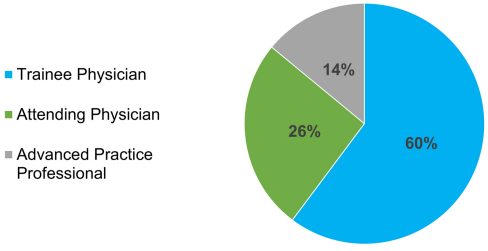
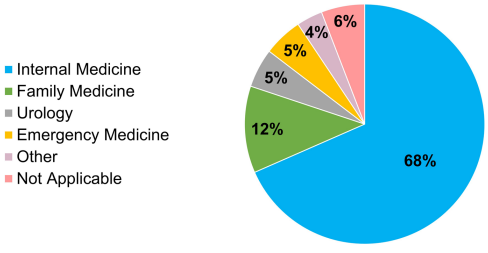
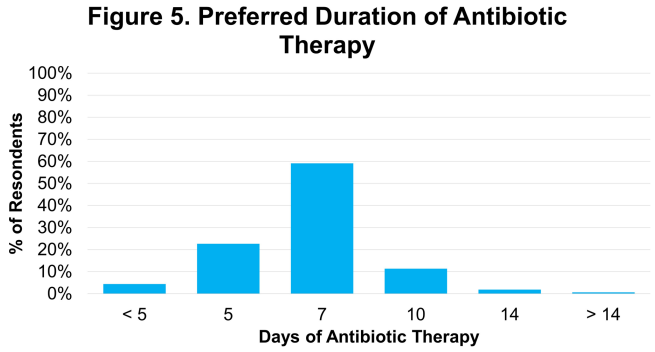
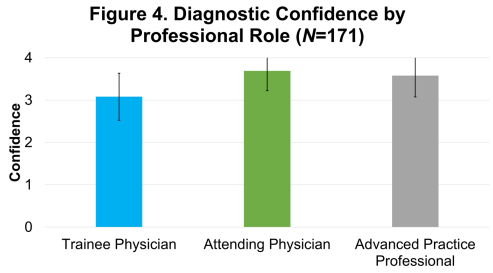


Figure 2. Specialty of Physician Survey Respondents (*N*=171)







days (Figure 3). Lower clinician confidence in ability to correctly diagnose male UTI was associated with longer intended antibiotic treatment durations (Odds Ratio [OR] 0.42, Confidence Interval [CI] 0.19-0.91, p = 0.03). This association was independent of professional role, specialty, and years in practice. Lower clinician confidence in ability to correctly treat male UTI was not significantly associated with longer intended treatment durations (OR 0.46, CI 0.21-1.03, p = 0.06) on univariate analysis but was significantly associated when adjusted for years since graduation (OR 0.40, CI 0.17-0.96, p = 0.04). Confidence in diagnosis (Figure 4) was significantly different between professional roles, with trainees significantly less confident (median ± standard deviation = 3.1 ± 0.56) than attendings (3.7 ± 0.47, p) **Conclusions:** Lower confidence among clinicians in either diagnosis or treatment of UTIs in men was associated with intention to prescribe longer antibiotic courses. Future studies that address the evidence gaps in diagnosis and management of UTI in men may improve clinician confidence and thus reduce unnecessarily long durations of antibiotics.

Antimicrobial Stewardship & Healthcare Epidemiology 2025;5(Suppl. S2):s46–s47
doi:10.1017/ash.2025.247

Presentation Type:
Poster Presentation
Subject Category: Antibiotic Stewardship
Less is more: Optimizing antimicrobial prophylaxis in urological surgery

Peter Oakes[1], Amy Mathers[2], Lindsay Donohue[3], Stacy Park[4], Heather Cox[5], Jacqueline Zillioux[6], Nicolas Ortiz[6] and Alexander Henry[7]
[1]Infectious Disease Fellow; [2]University of Virginia; [3]UVA Health; [4]University of Virginia Health System; [5]University of Virginia Health; [6]University of Virginia and [7]University of Virginia

Background: The selection of agent for antimicrobial prophylaxis for urological procedures is guided by the results of urine cultures taken prior to the day of surgery, which can lead to variability. National society guidance recommends single-dose antimicrobial prophylaxis immediately before urologic surgery; however, significant heterogeneity remains among practicing urologists with regards to pre-treating (or post-treating) bacteriuria identified on preoperative urine culture as well as choice of antimicrobial administered. As part of an institutional quality improvement initiative, we endeavored to optimize antimicrobial selection and duration of therapy through the use of a dedicated preoperative urine culture paired with recommendations. **Method:** This was a single-center, prospective study of urological surgeries. A dedicated preoperative urine culture was created in partnership with our institution's microbiology lab and antimicrobial stewardship program intended solely for the selection of preoperative prophylaxis. Antibiotic stewardship program members reviewed these urine cultures and provided recommendations to urologic surgeons. Primary outcome was postoperative infectious complication within 90 days, with sub-analyses performed for stone and prosthetic cases, which carry higher infectious complication risks. **Result:** The preoperative urine culture was ordered prior to 381 urology cases from 9/27/23-4/15/24. There were 41 (10.8%) infectious postoperative complications. 64/381 (16.8%) patients received pretreatment for asymptomatic bacteriuria at the surgeon's discretion, deviating from protocol recommendations for single-dose prophylaxis. Similarly, 44/381 (11.5%) patients received postoperative antimicrobials off-protocol per surgeon discretion. There was no statistically significant difference in infectious postoperative complication rates among patients who received pretreatment (15.6%, n=10/64) versus those who did not (9.8%, n=31/317 [p=0.18]), nor in those who received postoperative antimicrobials (13.6% (n=6/44) versus not (10.4%, n=35/337 [p=0.44]). Subgroup analyses of patients with nephrolithiasis or prosthetic material showed no benefit with supplemental antimicrobials. There were 294 total days of therapy in cases with guidance-based prophylaxis (n=294), and 611 days for pre- and/or post-treated cases (n=87), representing an excess of 524 days of antimicrobial therapy. **Conclusion:** We implemented a specific antimicrobial stewardship initiative linking a urine culture ordering process to succinct evidence-based advice. Deviation from advice did not result in improved outcomes but did result in excess antimicrobial days. Subgroup analysis also suggested single-dose prophylaxis is appropriate for patients considered higher risk for infectious complications. These findings support the recommendation from the American Urological Association that a single dose of antimicrobial prophylaxis is sufficient for the majority of urologic cases and demonstrate a multidisciplinary approach to ability to safely implement such practice.

Antimicrobial Stewardship & Healthcare Epidemiology 2025;5(Suppl. S2):s47
doi:10.1017/ash.2025.248

Presentation Type:
Poster Presentation
Subject Category: Antibiotic Stewardship
Prolonged Decrease in Fluoroquinolone Utilization and Associated Reversal to High Level Sensitivity of P. aeruginosa and A. baumannii

Andrew Dysangco[1], Tamra Pierce[2] and Dawn Bravata
[1]Joseph Maxwell Cleland Atlanta Veterans Affairs Medical Center and [2]Update

Background: Our antibiotic stewardship program (ASP) has decreased in-patient fluoroquinolone (FQ) consumption using a prior-authorization process and physician-led audit and feedback. The objective of this project was to examine if the decrement in FQ use was associated with improvement in the FQ sensitivity rate of selected gram-negative organisms. **Method:** Quarterly days of therapy standardized to 1000 care-days (DOT/1000 CD) for ciprofloxacin, moxifloxacin, and levofloxacin were calculated as the measure of inpatient FQ consumption starting from quarter three of fiscal year 2012 to the end of fiscal year 2022. To evaluate resistance patterns, facility-level sensitivity rates for ciprofloxacin and levofloxacin against Escherichia coli, Klebsiella pneumoniae, Pseudomonas aeruginosa, and Acinetobacter baumannii were collected from the antibiogram published from calendar year 2012-2022. FQ sensitivities for the first half of the study period (2012-2016) were compared to the second half (2017-2022) using Chi-square tests. **Results:** Inpatient FQ consumption from 2012-2022 is summarized in Figure 1. After the initiation of the ASP in 2012, a gradual and steady decline in in-patient FQ use was observed. During the first four quarters, the average FQ use was 71.3 DOT/1000 CD. Lowest use was observed during 2020 calendar year, with average consumption of 19 DOT/1000 CD. FQ consumption then increased to 30.6 DOT/1000 CD (Q2-2021 to Q4-2022). Overall, there