

Investigating perception, practices, barriers, and perceived facilitators of antimicrobial stewardship among pharmacists in Sri Lanka

SRUK Senanayaka¹, VC Liyanapathirana², MHF Sakeena^{1,3}

Introduction and Objectives: Antimicrobial stewardship (AMS) promotes the judicious use of antimicrobials with the ultimate goal of preserving current and future antimicrobials, improving patient safety, and saving unnecessary costs. Pharmacists play a key role in antimicrobial stewardship teams. This study aimed to investigate the perception, practices, barriers, and perceived facilitators of AMS programmes among pharmacists in Sri Lanka.

Methods: This cross-sectional study collected data from Sri Lankan pharmacists registered with the Sri Lanka Medical Council (SLMC) using a self-administered online questionnaire. Pharmacists working in every sector were contacted using the convenience sampling technique. Descriptive data analyses were conducted, and chi-squared analysis was used with Statistical Process for Social Sciences (SPSS) software (Version 22.0 SPSS IBM, USA).

Results: The questionnaire was completed by 126 pharmacists of whom 81 had graduate qualifications. Of the 126 participants, 96 (76.2%) were aware of the term 'AMS'. Formulary restrictions and institutional guidelines were correctly identified as AMS strategies by 67 (53.2%) participants while use of antimicrobial order forms was identified as an AMS strategy by only 37 (29.4%). Of the 126 participants, 101 (80.2%) agreed that adequate training should be provided to pharmacists on antimicrobial use and 103 (81.8%) stated that pharmacists should be given training on AMS through in-service and continuous professional development programmes. Of the 85 practicing pharmacists, 67 (78.8%) stated they often/always dispensed antimicrobials on authentic prescription only and 62 (72.9%) acknowledged always/often communicating with prescribers for clarifications on prescriptions. Limited access to clinical and laboratory data, prescribers not being receptive to pharmacists intervening in the choice of antibiotic and duration stated in the prescription were the major barriers identified in this study. Participation in AMS educational activities were considered as an important provision to enhance education on AMS. Awareness about pharmacist-led AMS strategies and perceptions about AMS were more favorable among graduate pharmacists. Practices did not differ among graduates and non-graduates.

Conclusions: This study identified that while participants claimed awareness of AMS programs, knowledge on AMS needs to be improved. Since, pharmacists' perception towards AMS was good and practices were favourable, interventions targeting the identified barriers are recommended.


Key words: Antimicrobial Stewardship, Antibiotics, Pharmacists, Perception, Practice, Sri Lanka

¹Department of Pharmacy, Faculty of Allied Health Sciences, University of Peradeniya, Sri Lanka

²Department of Microbiology, Faculty of Medicine, University of Peradeniya, Sri Lanka

³Sydney Pharmacy School, The University of Sydney, NSW, Australia

Address for correspondence: Ms.SRUK Senanayaka. Department of Pharmacy, Faculty of Allied Health Sciences, University of Peradeniya, Sri Lanka Telephone: +9470-3194011; Email: ahs16pcy022@ahs.pdn.ac.lk;

 <https://orcid.org/0009-0000-0256-510X>