

(CI) have a fundamental task of achieving adequate use of these drugs. It is important to establish a suitable circuit for the control of their prescriptions. Knowing how this circuit operates is essential to establish if it is necessary to make any modifications.

**Aim and objectives** To analyse the operation of the prescription/revision circuit for new antibiotics included in the pharmacotherapeutic guide, and to show the adequacy of the prescriptions of antibiotics recently included in the hospital's pharmacotherapeutic guide.

**Material and methods** Inclusion criteria: prescriptions (January 2018 to September 2019) of ceftaroline, dalbavancin, ceftolozano/tazobactam, ceftazidime/avibactam, tedizolid and isavuconazole. Exclusion criteria: prescriptions in the intensive care unit (which has a different prescription circuit).

The CI and AST decided the indications for the new antibiotics and their prescription circuit. A non-restrictive attitude was decided. Prescription of these antibiotics could be carried out by any specialist, with or without prior advice from the AST. Prescriptions made without AST supervision were reviewed by the AST in 24–48 hours.

The information for review was obtained from medical and electronic prescription records.

**Results** A total of 28 prescriptions were reviewed: 39.3% (n=11) ceftazidime/avibactam, 28.6% (n=8) dalbavancin, 14.3% (n=4) ceftaroline, 7.2% (n=2) ceftolozano/tazobactam, 7.2% (n=2) isavuconazole and 3.4% (n=1) tedizolid. A total of 50% (n=14) of prescriptions were made by the AST and 50% (n=14) were performed by doctors who did not belong to the AST, of which 36% (n=5) had prior consultation with the AST and 64% (n=9) did not consult the AST.

Of the prescriptions that did not receive prior advice from the AST, 55.55% (n=5) were reviewed by the AST. All of the prescriptions (100%, n=14) made by the AST or under their supervision were within the indications established by the CI.

Five of 28 prescriptions were not adequate (2 isavuconazole, 2 ceftaroline, 1 tedizolid). These were prescriptions made without the advice or revision of the AST. Three of the incorrect prescriptions were in August 2018 and one in August 2019.

**Conclusion and relevance** In general, our circuit worked correctly. Some of the prescriptions out of indication were during the holiday period and not all AST members were working. Therefore, this team should operate at full capacity all year round. The adequacy of antibiotics is greater when there is AST prescription or intervention.

## REFERENCES AND/OR ACKNOWLEDGEMENTS

No conflict of interest.

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### ASSESSING THE IMPACT OF ANTIMICROBIAL STEWARDSHIP PROGRAMMES IN HOSPITALS: THE ROLE OF PHARMACISTS

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**Background and importance** Antimicrobial resistance is a growing public health problem because it has been associated with

increasing treatment failure, hospital stay, mortality and health-care costs. An antimicrobial stewardship programme is a multi-disciplinary team working together against inappropriate antimicrobial prescriptions. Its aim is to improve clinical outcomes and slow down the emergence of antimicrobial resistance. Pharmacists are an integral part of the stewardship team and have an important role.

**Aim and objectives** This study aimed to assess the role of pharmacists within the antimicrobial stewardship programme in a 200 bed hospital. Secondary objectives were to analyse pharmaceutical interventions, quantify their acceptance, the recommendations made and the antimicrobial drugs involved.

**Material and methods** We conducted a prospective observational study in a 200 bed hospital over a period of 25 months (September 2017–September 2019).

Inclusion criteria: patients with active antimicrobial prescriptions during admission with an antimicrobial stewardship programme recommendation. Exclusion criteria: antimicrobial stewardship programme recommendation made without active pharmacist participation. Recommendations were classified as no indication of antimicrobial treatment, inadequate antimicrobial drug selection, drug dosage, route of administration and duration of treatment.

Recommendations made were prospectively registered and at 72 hours intervention acceptance was assessed based on modifications to the medical prescription. Collected data were age, gender, antimicrobial treatment, type of recommendation and acceptance.

**Results** A total of 580 recommendations were carried out in 474 patients. The average age of the patients was 69 years (54% men). Intervention acceptance was 93% (539 recommendations were accepted). Recommendations according classifications were: 190 (33%) inadequate antimicrobial drug selection, 131 (23%) inadequate route of administration, 129 (23%) inadequate duration of treatment, 85 (15%) inadequate drug dosage and 45 (8%) no indication for antimicrobial treatment.

**Conclusion and relevance** Pharmacist recommendations were about drug selection, route of administration, drug dosage, duration of treatment and absence of indication of treatment, with a high degree of acceptance. Hence pharmacists can play an important role in antimicrobial stewardship programmes. It seems reasonable to claim that antimicrobial stewardship programme recommendations may enhance the degree of acceptance when decisions are made from a multidisciplinary team.

## REFERENCES AND/OR ACKNOWLEDGEMENTS

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### BETA-LACTAM ANTIBIOTICS IN CRITICAL ILL PATIENTS: ARE WE DOSING OUR PATIENTS CORRECTLY?

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**Background and importance** Exposure to beta-lactam antibiotics due to their hydrophilic properties is widely known to be influenced by the typical pharmacokinetic alterations in critical