analysis of the studies was conducted with chi-square and I2. The statistical analysis of the efficacy rate was performed using the meta package with the R software. The effect estimate was expressed in risk ratio (RR) with 95% confidence interval (CI 95%) and pooled using a random effects model.

RESULTS:

Of the 106 identified studies, 11 high quality RCTs were included for meta-analysis (25 were duplicate publications, 70 did not meet the inclusion criteria). Considered genotypes were 1 (n = 9), 2 (n = 1), 3 (n = 1). Meta-analysis included 3,720 patients (2,698 treated with DAAs-2; 1,022 treated with placebo or a first generation DAA±Ribavirin±Pegylated interferon). Heterogeneity between studies was high ($p<0.001$; $I2 = 90.2\%$); however, it was absorbed by the model ($\tau2 = 0,08$). Long-term efficacy was expressed as SVR 24 weeks after EOT, since longer timescales were not available. According to the pooled RR, the incidence of efficacy was 1.5 (CI 95%: 1.24−1.83, $p < 0.001$).

CONCLUSIONS:

The meta-analysis demonstrated that DAAs-2 for HCV treatment have long-term efficacy at SVR 24 weeks after the EOT; however, the number of studies is mostly based on genotype 1. More RCTs are required to confirm long-term efficacy at more than six months after EOT for all treated genotypes.

VP18 Antibiotics And Orthopedic Surgery Without Implant: A Meta-Analysis

AUTHORS:

Sophia Campbell Davies (secampbelldavies@gmail.com), Chiara Inserra, Gaetana Muserra, Angelo Bignamini, Paola Minghetti

INTRODUCTION:

According to guidelines, antibiotic prophylaxis in orthopedic surgery without implant is not recommended for the reduction of the incidence of surgical site infections (SSI); however, the evidence level is low. Surveys have shown that preoperative antibiotics for orthopedic procedures without implant are administered routinely by surgeons due to medico-legal concerns. Such practice may have an important impact on costs, side effects and the emergence of antibiotic resistance. Therefore, the objective of the review is to evaluate existing clinical evidence.

METHODS:

A systematic review was performed with the use of Pubmed, EMBASE/MEDLINE, CENTRAL, SBBL-CILEA/METACRAWLER, ISRCTN Registry, ICTRP and ClinicalTrials.gov databases. Trials were initially screened by the title and abstract; secondly, full papers were analysed. The meta-analysis included randomized controlled trials (RCT) with patients undergoing surgery as treatment for any orthopedic impairment that did not need implantation. Heterogeneity analysis of the studies was conducted with chi-square. The statistical analysis of the infection rate was performed using the meta package with the R software. The effect estimate was expressed in risk ratio (RR) and pooled using a random effects model. Study quality assessment was undertaken using the Jadad scale.

RESULTS:

Of the 184 identified papers, 129 were excluded since they did not meet inclusion criteria and 45 were discarded because they were considered to be duplicate publications. After analyzing the 10 potentially relevant studies, only two were included. The study population consisted of 1,152 patients. No heterogeneity was observed; however, the studies were outdated and associated with a high risk of bias. According to the pooled RR, the incidence of infection in the intervention group was lower than the control group favoring prophylaxis (RR = 0.39, 95% CI: 0.16−0.96, p = 0.040).

CONCLUSIONS:

The meta-analysis demonstrated, in contrast to the guidelines, that antibiotic prophylaxis can reduce the incidence of SSI in elective orthopedic surgeries without implant; however, the low number of available studies and the high risk of bias show that the effect estimate is not statistically significant. Considering that antibiotic prophylaxis is usually administered in clinical practice, RCTs are required to establish whether antibiotic prophylaxis in orthopedic procedures without implant is recommended or if this practice could cause more harm.

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