ANTIMICROBIAL SUSCEPTIBILITY OF BACTERIA OBTAINED FROM BOVINE MASTITIS IN ZONA DA MATA OF ALAGOAS STATE

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Mastitis is a hard control disease and responsible for numerous economic losses to dairy industry. The growing resistance to antibiotics that have been showed by bacteria isolated from bovin mastitis makes clear the need for treatment protocols. The aim of this work was to analyze in vitro antimicrobial susceptibility patterns, using Disc Diffusion Method in agar Mueller-Hinton, among bacteria groups isolated from 26 positive samples collected in five farms in Viçosa – Al. The following antibiotics were used: Gentamicin 10mcg, Sulfazotrim 25mcg, 30mcg Cephalothin, Erythromycin 15mcg, 10mcg Amoxicillin and Penicillin G 10u. The isolated bacteria were *Staphylococcus* sp, *Corynebacterium* sp, *Streptococcus* sp, *Bacillus* sp, *Micrococcus* sp, *Pasteurella* sp, *Pseudomonas* sp, and *Enterobacteriaceae*. Among antimicrobial agents tested, the most effecient against bacteria were Gentamicin 96.15% (25/16) followed by Sulfazotrim 76.92% (20/26), Cephalothin 61.53% (16/26), Erythromycin 53.84% (14/26), Amoxicillin 38.46% (10/26), Penicillin 30.76% (8/26). Great penicillin resistance occurred in 69.24% (18/26) of the samples, followed by Amoxicillin 61.54% (16/26), Erythromycin 46.16% (12/26), Cephalothin 38.47% (10/26), Sulfazotrim 23.08% (6/26) and Gentamicin 3.85% (1/26). Studies conducted in 2011 has shown conflict results considering that in the research Sulfazotrim (100%), followed by Cephalotin (90.48%) diplayed a low effectivness. In the same study, Penicillin rates of resistance was lower (66.67%). The obtained data also indicate the need of the knowledge about bacterial sensitivity profile against antimicrobial agentes because the multiple resistance to them may hamper the choice of the more suitable drug that will be used in the therapy as well as can be potentially transmitted to humans through milk and its derivatives.

Keywords: Antibiogram, Bacteria, Bovine mastites.