

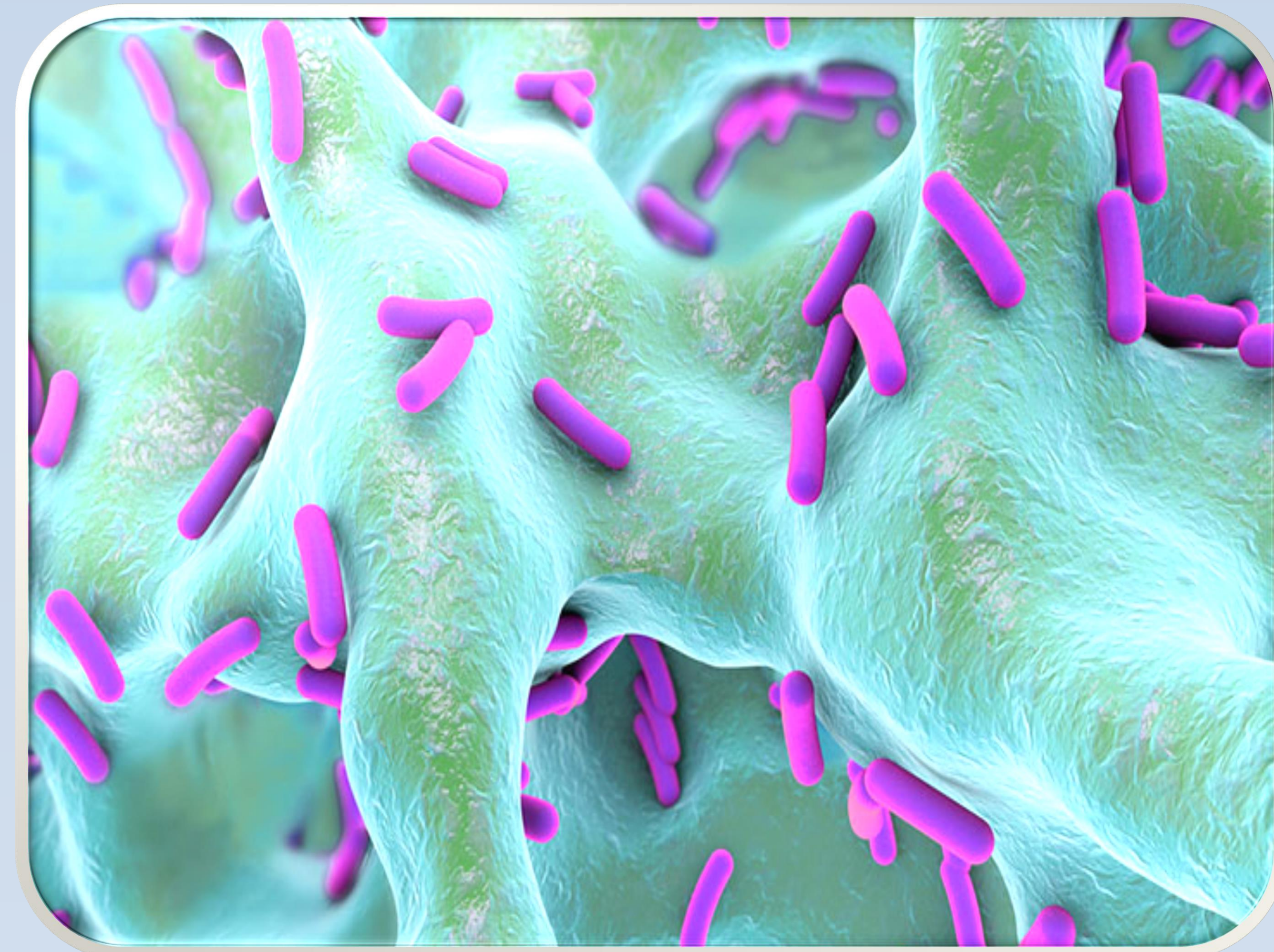


# COST EVALUATION OF OFF-LABEL THERAPY OF METHICILLIN-RESISTANT S. AUREUS OSTEOMYELITIS (MRSA) WITH DALBAVANCIN VS STANDARD OF CARE IN AN HEALTHCARE COMPANY

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## BACKGROUND AIM AND OBJECTIVES

Dalbavancin in off-label indication is used in osteomyelitis caused by MRSA (Methicillin-Resistant S. Aureus)(1). Osteoarticular infections are of considerable importance in clinical practice in terms of frequency, prognosis and complexity of treatment. The aim of this work is compare the costs of patients treated with standard of care(SoC) vs Dalbavancin therapy with MRSA-osteomyelitis including hospitalization costs. Recommended dose of dalbavancin is 1500 mg administered as a single infusion or as 1000 mg followed, one week later, by 500 mg while SoC of antibiotic therapy in MRSA osteomyelitis is composed of vancomycin 1g-IV every 12h and cefepime 2g-IV every 12h.

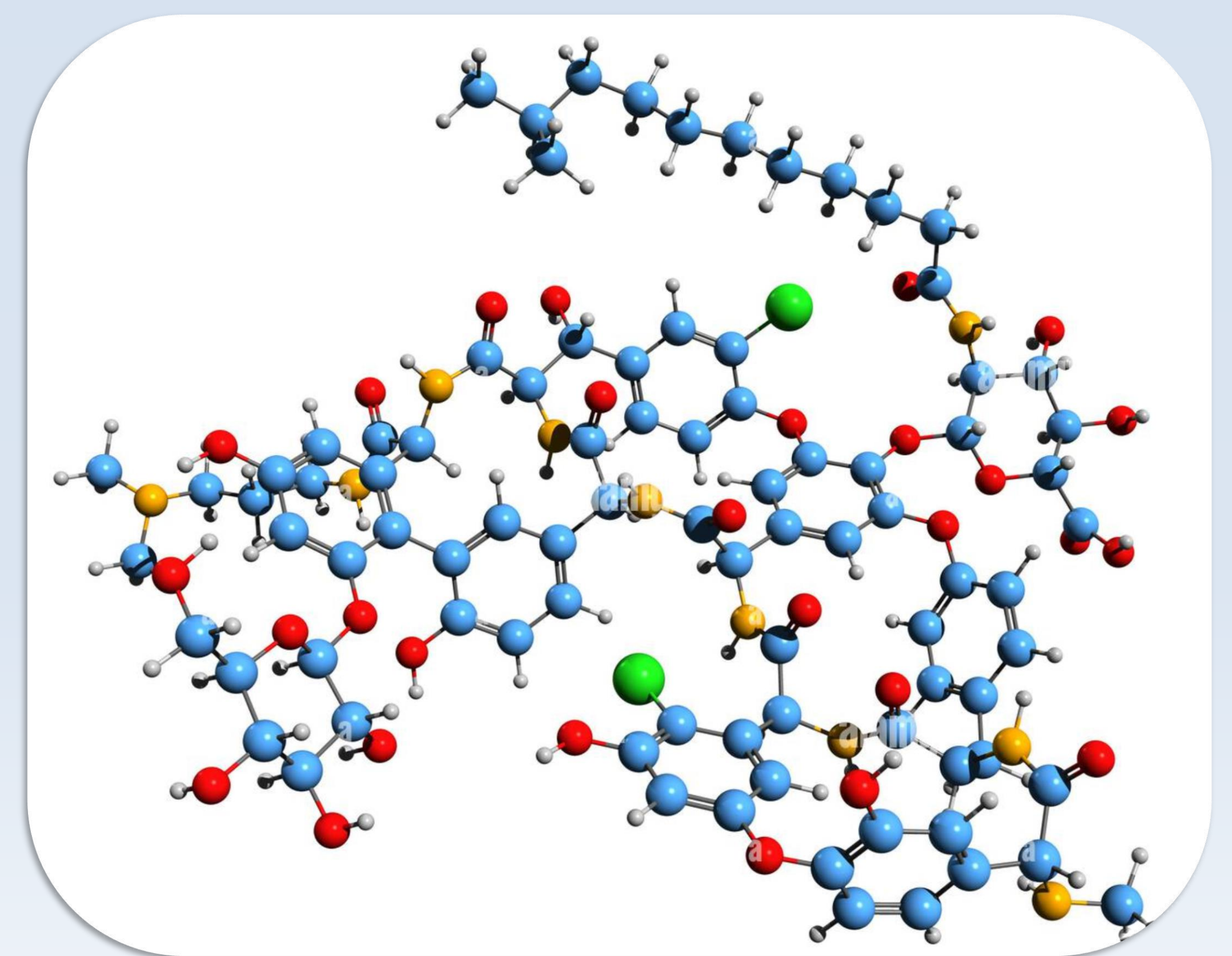


## MATERIALS AND METHODS:

The cost of antibiotic therapies and processing the average days of hospitalization in the two cases (SoC and Dalbavancin) was calculated using the company management software. Cost of hospitalization-days in Osteomyelitis case was extrapolated from the available scientific literature. Dalbavancin is administered as reported in the literature and RCP.

## RESULTS:

In the period May 2023–May 2024 we treated 26 patients with MRSA osteomyelitis. Dalbavancin was administered to patients after approval of the off label procedure. Economic cost of dalbavancin therapy is €1267,24 /patient. We calculated the cost of SoC therapy with cefepime 4g/day + vancomycin 2g/day equal to €16,30/day for each patient. the average cost of hospitalization day is €732(2). The number of hospitalization days for the treatment of osteomyelitis-MRSA with SoC therapy, in 2023, in our company was 22 days.



## CONCLUSIONS:

Cost analysis for patients in therapy with dalbavancin led to a value of €3472,00 obtained from the economic value of the drug (€1276,24) and the cost of three days of hospitalization (€2196,00) which are implemented according to company protocol; the second administration is carried out on an outpatient basis. SoC therapy with cefepime and vancomycin (22 days) have a cost of €357,94 for the drug component; However, the cost of hospitalization days (€16104,00) significantly affects the economic impact of SoC therapy, the total cost of which is €16461,94. Dalbavancin therapy for 26 patients with MRSA osteomyelitis allowed an overall saving of €12989,7. The decrease in patient hospitalization led to a reduction in Healthcare-Associated Infections with further savings in resources.

