

TO

The soul of my dearest father

TO

My lovely mother, brothers, and sister

Asha

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Abstract

This study was conducted at El-Obeid Town and some rural areas around EL-Obeid. 116 samples were collected as swabs, exudates and tissues scraping from different types of wounds.

Equine (donkeys and horses) were the targeted animals. These animals are used for different purposes.

For the isolation and identification of bacterial contaminants the conventional methods described by Barrow and Feltham (1993) were used.

Most of the bacterial isolates were recovered from swab samples (118 isolates), *Enterococcus faecalis* – 27 (22.9%), *Staphylococcus aureus* – 24 (20.3%) and *Enterococcus faecium*- 14 (11.9%) were the most dominant isolates.

The majority of isolates, 63 isolates out of 159 were obtained in summer; these isolates were highly recovered from riding donkey's saddle wounds at El-Obeid Town.

Staphylococcus aureus, *Staphylococcus epidermidis*
Enterococcus faecium, *Enterococcus faecalis*, *Bacillus licheniformis*
and *Bacillus firmus* were selectively used for the susceptibility against different antibiotics, Nitrofurantoin, Kanamycin, Nalidixic acid and

Gentamicin were found active against the tested organisms (6-10 mm) inhibitory zone.

ملخص الأطروحة

تمت هذه الدراسة بمدينة الأبيض وبعض المناطق الريفية حولها، بلقت جملة العينات 116 عينة عبارة عن مسوحات (Swabs) وخراجات Exudate وأنسجة (Tissue scraping) اخذت من أنواع الجروح المختلفة. الحيوانات المستهدفة هي الفصيلة الخيلية (حمير وخيول) ذات استخدامات متعددة الأغراض.

لعزل وتصنيف البكتريات الملوثة اتبعت طريقة (بارو وفلثام 1993). عزلت معظم البكتريات من عينات المسوحات (swabs) هي 118 معزوتة منها، *Enterococcus faecalis* 27(22.9%)، *Staphylococcus aureus* 24(20.3%)، *Enterococcus faecium* 14(11.9%).

عزلت 63 معزولة من اصل 159 معزولة في فترة الصيف من جروح السرج لحمير الركوبة في مدينة الأبيض.

المتكورة العنقودية الذهبية (*Staphylococcus aureus*) والمتكورة العنقودية البشرية، *Staphylococcus epidermidis*، *Enterococcus faecalis*، *Enterococcus faecium*، *Bacillus licheniformis*، اختبرت لاجراء اختبارات الحساسية ضد المضادات الحيوية والبكتيرية التالية: نيتروفوران ، كناميسين ، حامض

النالديكسك، والجنتاميسين لوحظ ان كبح نمو الميكروبات المذكورة اعلاه في منطقة الاختبار

يتراوح في مساحة 6 – 10م²