

Bacteriocin production by *Enterococcus faecalis* VRE 1492 using different media at varying pH and temperatures

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ABSTRACT

The production of bacteriocin by *Enterococcus faecalis* VRE 1492 was increased by growing the bacterium at different growth media, initial pH and fermentation time. Maximum production of bacteriocin was observed using De Man Rugosa and Sharpe (MRS) medium with glucose. The activity of bacteriocin was greatly increased in MRS medium with glucose at initial pH of 7.50 and 8.50 after 8 to 20 hours of fermentation at 30 C. Progressive increase in cell count from 0 to 24 hours of fermentation did not necessarily favor an increase in bacteriocin activity. After 20 hours of fermentation, the activity of bacteriocin decreased. The production of proteolytic enzymes by the bacterium was believed to inactivate the bacteriocin.

Key words: bacteriocin. biopreservation. *Enterococcus faecalis* VRE 1492.