EXTRACTION AND PURIFICATION OF URASE FROM *Proteus vulgaris Pv12* ISOLATED FROM CHILDREN INFECTED WITH URINARY TRACT INFECTION IN IRAQ.

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ABSTRACT

The results of purification of urease was extracted from local isolates *Proteus vulgaris* Pv12 showed the specific activity 33.33 unit / mg protein by ammonium sulfate with (25-50) % percentage of saturated, and specific activity 109.68 unit / mg protein, purified 60.03 fold and 55.3% of yield by DEAE sepharose, While the results indicated the specific activity 175.09 of unit / mg protein, purified 90.25 fold and 36.55% of yield by sephacyl S-200chromatograghieles. Using buffer (PEM) 20mM With 7.5 pH. Molecular weight of enzyme was about 215000 Dalton determined by gel filtration. The results indicated the isoelectric point of purified urease that extracted from *Proteus vulgaris* Pv12 was 5.3.

Key words : Proteus vulgaris, urease, gel filtration, molecular weight, Isoelectric point