

**Improved purification of collagenases from
Clostridium histolyticum liquid culture**

Abstract

The present invention provides a method for purifying *Clostridium histolyticum* collagenase type I and type II proteins from a complex mixture by subsequently performing a precipitation with ammonium sulfate, hydrophobic interaction chromatography, cation exchange chromatography, and anion chromatography. Conditions are provided which lead to a stabilized partially purified preparation even after the precipitation step. The method of the invention leads to a quick and efficient removal of other proteolytic activities. The preparations according to the invention provide exceptionally pure and intact collagenase type I and type II proteins which are enzymatically active. The invention also provides blends of the two isolated proteins. The invention further provides the use of the purified collagenase proteins or blends thereof for treating a tissue sample in vitro.

No suitable figure