PRODUCTION AND PARTIAL CHARACTERIZATION OF PROTEASES PRODUCED FOR Fusarium solani.

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Proteases play an excellent role in physiological processes and constitute one of the groups most important in industrial processes. Of the commercialized enzymes, they answer for at least 25% of commercialization being that two thirds of these enzymes are of microbial origin. This work had as objective to analyze the production of proteases as well as characterizing these enzymes produced for *Fusarium solani*. The fermentation was carried through in 20mL medium liquid with 0.5% of gelatin, pH 6.9. In this medium 10^6 conídios/mL of medium was inoculated. The culture had been carried through 30ºC, 150rpm for 96h, in triplicate. Samples were removed at time intervals (24h) and supernatants were used to measure protease activity. The biomass was dehydrated the 80 ºC, and in the crude extract pH was adjusted. The protease activity was carried through 440nm, using as substrate azocaseína 1% (w/v), in 0.1 M Tris-HCl, pH 7.6. The data had shown to *Fusarium solani* expressed the maximum growth (178mg) and maximum protease activity (2.46 U/mL), in 72 hours, when pH of the crude extract was 7.The optimum activity values of pH and temperature had been 7 and 50 ºC, respectively. In these same conditions, proteases had demonstrated to greater stability.

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