

Abstract

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Performed at
Institute of Immunology
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Title of diploma thesis: The Influence of the O-glycosylation in oncofetal fibronectin on the bone formation

Hepatic osteodystrophy is a major complication in patients with chronic cholestatic liver diseases which significantly contributes to decreased quality of life. It was established that increased levels of the oncofetal domain of fibronectin correlated with bone loss and decrease in bone formation in patients with primary biliary cirrhosis. The oncofetal fibronectin is characterized by the O-glycosylation in the variable domain. Another O-glycosylation is found on the NH₂-terminus. The aim of this project was to prepared O-deglycosylated fibronectin isoforms and fibronectin knockdown mammalian cells for further research on the effect of O-glycosylation on the bone formation.