Optimization of the production of protein hydrolysates from common Kilka (*Clupeonella cultiventris*) using protease enzyme (Promod)

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Abstract
Fish protein hydrolysates were produced from Kilka (*Clupeonella cultiventris*), a major *clupeonella* species in the Caspian Sea. Fish protein hydrolysate was produced from the hydrolysis conditions (enzyme/protein substrate concentration %, temperature, and time) were optimized using response surface methodology. The optimum conditions to reach the highest degree of hydrolysis were: 39.64°C, 21.02 min, and a protease (Promod) 1.36 %. Kilka protein hydrolysates had relatively high protein (75.36%).

Keywords: Fish protein hydrolysates, Kilka, Promod, RSM.