Abstract

The aim of this study was to investigate effect of different dietary crude protein:energy ratios on growth indices and body composition of Bester. In order to, 240 juvenile of Bester with the mean weight and length, 358.4±13.37 g and 47.38±2.30 cm, respectively, allocated in to four groups (60 specicsment per each group) and three replicate per each group. The groups fed with four diet including: 31.67%, 35.54%, 40.86% and 41.5% of crude protein and 4777, 4800, 5344 and 5366 KCal of energy/kg, respectively, during 8 week base on 1.5% of biomass per day. The result showed different signification in investigationed different indices (p<0.05). There have the fish fed diet containing of 40.86% of crude protein and 5344 KCal of energy/kg, which showed highest body weight increase (BWI), condition factor (CF), specific growth rate (SGR), average daily growth (ADG), feed efficiency (FE), protein production value (PPV), and lowest feed conversion ratio (FCR). The highest protein efficiency rate (PER) in 35.54% of crude protein and 4800 KCal of energy/kg no significant different with the other treatments (P>05.5). Comparison of the chemical of examined fish carcass also showed different significant between treatment (p<05.5). There have the highest moisture and carcass ash also of gained by 35.54% crude protein and 4800 KCal of energy/kg (p<05.5). also highest carcass crude protein of in treatment was 40.86% crude protein and 5344 KCal of energy/kg (p<05.5). The highest carcass lipid was observed in treatments with 41.5% crude protein and 5366 KCal of energy/kg (P<0.05). The results showed that 40.86% of crude protein and 5344 KCal of energy/kg is efficient and suitable for juvenile Bester.

Keywords: Specific growth rate, Feed conversion ratio, Protein efficiency, Bester

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Effect of different ratio of dietary crude protein / energy on performance, growth indices and body composition in Bester juveniles

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