Pterygoplichthys Spp Meal for Culture Tilapia (Oreochromis Niloticus) and Carp (Cyprinus Carpio)

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Abstract. Tilapia and carp are economically important fish species and their demand is increasing. The fish farming still relies on commercial feed which is expensive. To support its cultivation, local feed alternatives are needed which are relatively cheaper, of good quality and sustainable. One of the ingredients that can be used as raw material for local feed is fish meal. Pterygoplichthys spp meal has good quantity and quality of nutrition to be used as a source of animal protein. The aim of the study was to analyze the use Pterygoplichthys spp meal for culture tilapia and carp. The research was carried out at the Engineering and Environmental Laboratory of Faculty of Fisheries and Marine Sciences UMI Makassar. The container used is an aquarium measuring 12 pieces long x wide x high 29 x 26 x 30 cm, and filled with 25 liters of water. The container was filled with tilapia and goldfish, 4–5 cm long and 5–6 cm long with a density of one fish/liter. The percentage of fish meal in the feed formulation was: treatment A= 16%; B=25%; C=34% and D=42%. Each treatment was repeated three times. The results showed that the treatment did not significantly affect the growth of absolute weight and length; survival and feed conversion in both tilapia and carp. Based on these results, it was concluded that Pterygoplichthys spp meal can be used as a source of protein for tilapia and carp because the survival rate of fish is 88-90%.

Keywords: tilapia, carp, pterygoplichthys spp meal, growth, survival