

PENGARUH PEMBERIAN PROBIOTIK (*Nitrosomonas sp.* dan *Nitrobacter sp.*) TERHADAP BERAT BADAN IKAN NILA (*Oreochromis niloticus*) SELAMA DELAPAN MINGGU

INTISARI

Astri Rizkia Silvani
2012/334064/KH/7475

Probiotik adalah mikroba hidup yang dapat digunakan untuk memperbaiki pertumbuhan dan keseimbangan mikrobial pada intestinal hospes. Probiotik tidak akan mengakibatkan resistensi sebagaimana antibiotik, tidak menyebabkan toksik dan karena itu tidak akan menghasilkan efek samping terhadap hospes. Penelitian bertujuan untuk mengetahui pengaruh pemberian probiotik (*Nitrosomonas sp.* dan *Nitrobacter sp.*) melalui pakan terhadap berat badan ikan Nila selama delapan minggu. Tiga puluh tiga ekor ikan Nila berukuran ± 7 cm digunakan dalam percobaan. Ikan dipelihara dalam aquarium 50x20x25 cm. Ikan Nila dibagi menjadi 3 kelompok yaitu kelompok perlakuan (K) tanpa probiotik, kelompok (D₁) diberi pakan probiotik 5% total berat badan dan kelompok (D₂) diberi pakan probiotik 2,5% dan takari 2,5% total berat badan. Pemberian pakan dilakukan dua kali sehari selama delapan minggu. Penimbangan berat badan dilakukan setiap minggu selama delapan minggu berturut-turut. Hasil penelitian menunjukkan perlakuan D₂ mencapai total pertambahan berat badan tertinggi pada minggu pertama hingga keempat, selanjutnya pada minggu keenam dan kedelapan total pertambahan berat badan tertinggi dicapai oleh kelompok kontrol (K). Hasil analisa statistik ANOVA menunjukkan pemberian probiotik kelompok perlakuan D₁, D₂ dan Kontrol berpengaruh nyata terhadap pertambahan berat badan ikan Nila selama delapan minggu ($p < 0,05$). Selama delapan minggu pemeliharaan terdapat empat ekor ikan Nila yang mati.

Kata kunci : *probiotik, Nitrosomonas sp., Nitrobacter sp., Oreochromis niloticus, berat badan*

**THE EFFECT OF PROBIOTICS (*Nitrosomonas sp.* and *Nitrobacter sp.*)
FOR EIGHT WEEKS TOWARD THE WEIGHT OF TILAPIA
(*Oreochromis niloticus*)**

ABSTRAK

Astri Rizkia Silvani

2012/334064/KH/7475

Probiotics was a microbes that live and can be used to improve the growth and balancing of microbials in hospes intestinal. Probiotic's will not lead to resistance as antibiotics, does not cause toxic and therefore would not produce the side effects on the host. The goal of this research was to determine the effect of probiotic's (*Nitrosomonas sp.* and *Nitrobacter sp.*) through fed to body weight of Tilapia fish for eight weeks. Thirty-three Tilapia fish were measuring ± 7 cm used in the treatment of group (K) without the probiotic, group (D₁) were fed probiotics 5% of the total weight and the group (D₂) were fed probiotics 2.5% and Takari 2.5% of the total weight. The feed of Probiotic was given twice a day for eight weeks. Weighing was did in every week for eight consecutive weeks. The result of this research showed that D₂ treatment reached the highest total weight gain during the first week to the fourth, then at weeks six till eighth the highest total weight gain was achieved by the control group (K). ANOVA statistical analysis result showed that probiotics treatment group D₁, D₂ and control did significantly affected on weight gain of the Tilapia fish for eight weeks ($p < 0.05$). During eight weeks there were four Tilapia fish were dying.

Keywords : *Probiotics, Nitrosomonas sp., Nitrobacter sp., Oreochromis niloticus, weight*