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RESEARCH REPORTS

Sustainable Aquaculture for a Secure Future

- Title:Effects of stocking density and feeding duration in cage-cum-pond-integrated system on
growth performance, water quality and economic benefits of *Labeo victorianus* (Boulenger
1901) culture
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Abstract: We evaluated the effect of varying cage stocking density (60, 90 and 120 fish m⁻³) and feeding duration (10, 30 and 60 min) in a cage-cumpond- integrated system on growth performance, water quality and economic benefits in *Labeo victorianus* culture. Interactions between stocking density and feeding duration significantly (P < 0.05) affected the fish growth performance and yields in the cages-cum-pond system. Stocking density of 60 fish m⁻³ resulted in the highest growth in cages and in ponds regardless of the feeding duration, but produced lower yields than at stocking density 90 fish m⁻³. The lowest Apparent Food Conversion Ratio (AFCR) in cages occurred at stocking density of 60 fish m⁻³ and feeding duration of 30 min. Growth performance in the open ponds declined with increased feeding duration of the caged fish. Survival in cages and in the open ponds decreased with increased recorded, at stocking density of 120 fish m⁻³, the lowest DO occurred when feeding of caged

AQUAFISH RESEARCH REPORTS are published as occasional papers by the Management Entity, AquaFish Innovation Lab, Oregon State University, Corvallis, Oregon 97331-1643 USA. The AquaFish Innovation Lab is supported by the US Agency for International Development under Grant No. EPP-A-00-06-00012-00. See the website at <aquafishcrsp.oregonstate.edu>. fish lasted 60 min. Growth performance, water quality and economic benefits in *Labeo victorianus* culture positively respond to interaction between stocking density and feeding durations.

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