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Investigation of Foraging Strategies of *Xiphophorus Helleri*: Group versus Solitary Feeding

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Poster Presentation 21

INVESTIGATION OF FORAGING STRATEGIES OF *XIPHOPHORUS HELLERI*: GROUP VERSUS SOLITARY FEEDING

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In any foraging situation, an animal must determine if the benefits of continuing to forage in a particular manner exceed costs such as exposure to predators and lost reproductive opportunities. In addition to these costs, other factors exist which influence foraging decisions; including hunger level and competitive ability. Specifically, these conditions have been shown to have a significant effect on the choice of an organism to feed in a group or individually. Experiments were conducted using female green swordtail fish, *Xiphophorus helleri*, to determine which foraging situation (group or solitary) is chosen in four different treatment sets: normal diet/no predator present; reduced diet/no predator present; normal diet/predator present; reduced diet/predator present. Preliminary results suggest the fish subjects prefer the group environment to the solitary one in all cases.