

Highlights of the NAHMS National Catfish Study

In January 1997, the National Animal Health Monitoring System (NAHMS), conducted the first part of a two-part study of the catfish industry in cooperation with the National Agriculture Statistics Service (NASS).

The Catfish '97 study was conducted in the four largest catfish producing states: Alabama, Arkansas, Louisiana, and Mississippi. These four states represented 95.9 percent of the total national catfish sales in 1996 and 93.5 percent of the water surface acres to be used for catfish production from January 1, through June 30, 1997. These states also accounted for 68.6 percent of all the catfish operations on January 1, 1997

Study objectives were developed with input from producers, extension personnel, researchers, industry associations, and diagnosticians. The first phase of the study focused on aspects of disease and production on operations that produced foodsize fish in 1996. The second phase of the study will describe management practices.

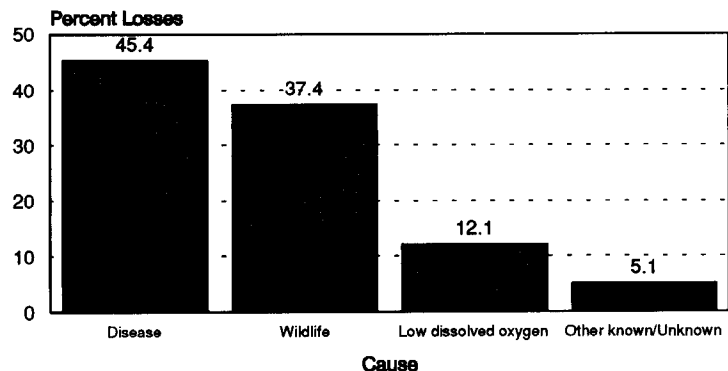
The following are highlights from the first phase of the Catfish '97 study:

- 571 producers responded from the four states (Alabama, 129; Arkansas, 117; Louisiana, 71; Mississippi, 254) with an overall response rate of 65.6 percent

- The primary cause of losses during 1996 was disease (45.4 percent of all losses), followed by wildlife (37.4 percent), low dissolved oxygen (12.1 percent), and other known/unknown causes (5.1 percent, Figure 1).
- Just above 78 percent (78.1) of all operations reported a combination of Enteric Septicemia and columnaris (ESC/Columnaris) infection. Winter kill infection (winter saprolegniosis) was the second most reported disease problem (35.8 percent). Proliferative Gill Disease (PGD) was the third most reported disease (19.8 percent). Percentages of operations reporting these disease problems increased as operation size increased. The percent of operations that experienced losses from Ich (*Ichthyophthirius multifiliis*), Channel Catfish Virus (CCV), and "other" causes, were all relatively low.
- Producers reported having problems with ESC/Columnaris infection in 42.1 percent of all

Figure 1

Percent of All Fish Losses by Cause



ponds. Winter kill infection was reported in 21.0 percent of all ponds, while PGD infection was reported in 5.3 percent of all ponds.

- ESC/Columnaris, winter kill, and PGD caused moderate to severe losses per outbreak (losses estimated at 200 or more pounds) on 54.0 percent, 19.2 percent, and 12.5 percent of all operations.
- ESC/Columnaris, winter kill, and PGD caused average losses per outbreak in the moderate to severe categories (losses estimated at 200 or more pounds) in 30.0, 11.4, and 3.4 percent of all ponds respectively.
- A majority (54.1 percent) of operations that reported experiencing disease losses did not submit any samples for disease testing to state, Federal, or university laboratories in 1996. The percent of operations that did submit to such laboratories varied by disease with CCV and winter kill submitted relatively infrequently (20.7 and 27.5 percent of the operations that experienced losses from the disease). PGD and "other" diseases were submitted relatively frequently to laboratories (57.7 and 57.3 percent of operations that experienced loss).
- ESC/Columnaris was cited most often (70.2 percent of all operations) as the disease that caused the greatest economic loss over the previous 3 years (Figure 2). "Other/unknown" causes, winter kill, and PGD were the next most frequently cited diseases causing the greatest economic loss (13.8, 6.4, and 6.4 percent of all operations).
- Foodfish sales per surface acre of foodfish ponds averaged 3,775 pounds per acre with the

Figure 2

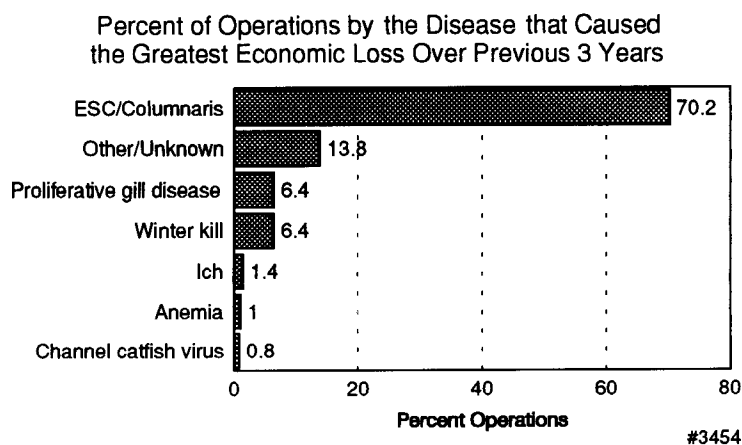
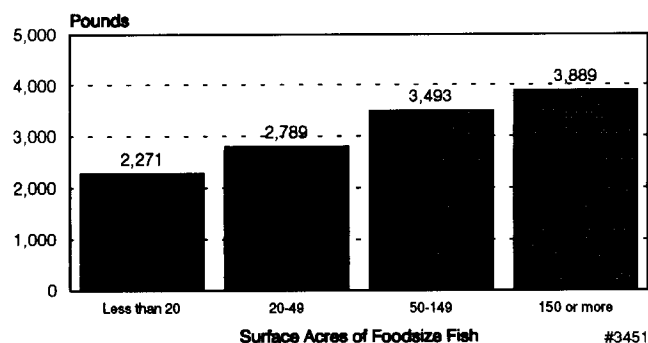


Figure 3

Average Pounds Foodsize Fish Sold per Acre by Operation Size



highest values found on larger operations (Figure 3). Operations with small average pond size (less than 5 acres) and very large average pond size (over 20 acres) had the lowest production averages.

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