# SUPPORTING STATEMENT FOR INFORMATION COLLECTION BY THE CENTERS FOR EPIDEMIOLOGY AND ANIMAL HEALTH (CEAH), NATIONAL ANIMAL HEALTH MONITORING SYSTEM (NAHMS)<sup>1</sup> OMB NUMBER 0579-XXXX NATIONAL CATFISH STUDY 2010

August 2009

#### A. JUSTIFICATION

This submission is a request for approval to initiate the National Catfish Study 2010, an information collection by the National Animal Health Monitoring System (NAHMS). The study questionnaire and evaluation will be administered by USDA National Agricultural Statistics Service (NASS) enumerators to collect information on the objectives of Catfish 2010 which include: (1) describe foodsize fish production practices, including stocking, feeding, pond management, and general practices; (2) examine fingerling production practices, including brood stock management, hatchery management, vaccination practices, fingerling pond management, and stocking and feeding practices; (3) describe the prevalence of disease problems in fingerling and foodsize fish, disease control and treatment practices, and risk factors associated with disease; (4) develop baseline information on the use of hybrid channel x blue catfish production by the industry; (5) evaluate trends in foodsize fish and fingerling management practices from 2003 to 2010.

The information collected through Catfish 2010 will be used to identify trends and determine the economic consequences of animal disease, management, and environmental practices. The potential benefits to trade from Catfish 2010 include increased production, enhanced pond management, expansion of the industry into export markets, and preservation of existing markets through increased confidence in quality and disease freedom.

### 1. Explain why the collection of this information is necessary.

Collection and dissemination of animal and poultry health data and information is mandated by 7 U.S.C. 391, the Animal Industry Act of 1884<sup>2</sup>, which established the precursor of the Animal and Plant Health Inspection Service (APHIS), Veterinary Services, the Bureau of Animal Industry. Legal requirements for examining and reporting on animal disease control methods were further mandated by 7 U.S.C. 8308 of the Animal Health Protection Act, "Detection, Control, and Eradication of Diseases and Pests," May 13, 2002.

Collection, analysis, and dissemination of animal and poultry health information on a national basis is consistent with the APHIS mission of protecting and improving American agriculture's productivity and competitiveness. APHIS' National Animal Health Monitoring System (NAHMS) is collecting information that is not available from any other source on the prevalence and economic importance of livestock and poultry health/disease.

<sup>&</sup>lt;sup>1</sup> The National Animal Health Monitoring System is responsible for collecting national data on animal health and productivity from voluntary participants

<sup>&</sup>lt;sup>2</sup> 7 United States Code 391, and 7 United States Code 8308, are available upon request.

### National Surveys Providing Baseline Information – Catfish 1997 and Catfish 2003

NAHMS completed the first National Catfish Study in 1997 followed by a second study in 2003. Through these projects, baseline information on catfish health, illness and management practices, as well as prevalence estimates for enteric septicemia, columnaris, winter kill and proliferative gill disease were obtained.

The NAHMS Catfish 2010 study will continue to build on two previous Catfish studies through addressing the priority issues of the U.S. catfish industry. An extensive needs assessment was performed through a collaborative effort with producers, industry, extension specialists, and Federal and State personnel. Specific objectives identified through this needs assessment include:

- (1) Estimate the losses of foodsize fish attributable to diseases, low dissolved oxygen and predation. Focus on the pond-level prevalence of catfish specific diseases such as enteric septicemia<sup>3a</sup> (ESC), columnaris<sup>3</sup>, winter kill<sup>3c</sup>, proliferative gill disease<sup>3d</sup> (PGD), visceral toxicosis, and diseases associated with trematodes;
- (2) Assessing the adoption of the use of hybrid channel X blue catfish by the catfish industry including a preliminary comparison of the hybrids production characteristics with those of the channel catfish
- (3) Describing management practices used by catfish farmers and the impact on productivity
- (4) Evaluating feeding practices that producers may have adopted in reaction to current production conditions.
- (5) Describing the frequency of health related management practices including fingerling purchase and production, stocking procedures, harvesting methods, pest management practices, use of veterinary services, and vaccination and disease treatment practices.
- 2. Indicate how, by whom, and for what purpose the information is to be used. Indicate the actual use the Agency has made of information received from current collection.

<sup>&</sup>lt;sup>3</sup>a ESC - The disease has two forms, a gastrointestinal form characterized by loss of appetite, lethargy, fluid accumulation in the abdominal area ("dropsy"), bloody intestinal contents and hemorrhagic spots on the liver. The second form is neurological and may be characterized by an open ulcer between the eyes of young fish <=6" long referred to as "hole-in-the-head.""(UF/IFAS: Fact Sheet FA-10 February 1996).

<sup>&</sup>lt;sup>b</sup> "Fish with columnaris usually have brown to yellowish-brown lesions (sores) on their gills, skin and/or fins. The bacteria attach to the gill surface, grow in spreading patches, and eventually cover individual gill filaments." (Southern Regional Aquaculture Center, September 1998).

<sup>&</sup>lt;sup>c</sup> "Clinical signs of [winter kill syndrome] are easily recognized and are exhibited as dry skin, sunken eyes, and skin lesions that appear as white to yellow cottony patches." (Mississippi State University, Undated)

<sup>&</sup>lt;sup>d</sup> PGD - "This disease causes catfish to suffocate because of severe damage to the gills." (SRAC, March 1998)

<sup>&</sup>lt;sup>e</sup> visceral toxicosis - Extensive visceral lesions, the most notable being intussception and fat effusion (USDA)

f trematode - A parasitic fluke associated with snails and pelicans which causes and encystic condition in fingerlings and food fish. (USDA Aquaculture industry report, July 2000)

Data collected, analyzed, and interpreted, and information disseminated by NAHMS are used by a wide variety of constituents. Farmers use the information to compare their operation's animal health and productivity with other ponds regionally. Producers and veterinarians use information derived from analyses to improve preventive medicine and environmental management programs. Pharmaceutical and biologics companies use the information to plan and develop research and marketing strategies for their products. Extension specialists use the information to identify diseases and disease trends. State and Federal officials responsible for regulatory veterinary medicine use the information to gain a more complete picture of animal health as a basis for program planning and to direct funding. State and Federal officials use the data to show the scientifically based evidence that supports their decisions and actions. Public health officials use the information to estimate the magnitude of health conditions which represent public health hazards. Research scientists use the information to define current and future animal health issues and direct research funding appropriately. Veterinary and agricultural students in universities in the United States use the data on the occurrence and cost of animal disease as a foundation for training in health management, animal welfare, nutrition, environmental impacts, and preventive medicine. Consumers of animal products use the information when exercising their purchasing power.

APHIS uses the data collected to:

- Address emerging issues,
- Determine the economic consequences of disease, and
- Develop trade strategies and support trade decisions.

Since catfish farming requires a specialized climate, the ideal group of States is Alabama, Arkansas, Louisiana, and Mississippi. These 4 States account for 91.6 percent of 2008 total catfish sales and 90.9 percent of the water surface acres for catfish production, as reported by NASS in the February 2009 Catfish Production Report.

### **CATFISH 2010 STUDY DATA COLLECTION FORMS**

**NAHMS-230,** <u>Catfish 2010 Questionnaire</u> - will be administered by NASS enumerators to collect information on all aspects of the catfish growers operation ranging from breeding to harvesting with an emphasis on disease management practices. The questionnaire will be divided into two parts. The first part focuses on breeding and hatchery management. Only a small portion of the industry implements these practices so a majority of producers will skip this part. The second part of the questionnaire covers foodsize fish production. Most catfish producers are growing fish for consumption so this section will be relevant for almost all (approximately 95 percent) of catfish producers. A unique NAHMS identification number is assigned to each operation. NASS will enter and validate collected data. The complete dataset will be sent to NAHMS.

**NAHMS-231,** <u>Catfish 2010 Producer Evaluation</u> - will be used by APHIS to evaluate the Catfish Growers Survey (NAHMS-230). NASS will mail this survey to participating producers after the initial survey. Completed questionnaires will be sent directly to APHIS. Section 1, *Knowledge of the Study*, asks if the participant had heard of the National Animal Health Monitoring System or the Catfish 2010 study before their participation. Section 2, *About the National Catfish Study*,

asks the producer what motivated them to participate in the study (to help the catfish industry, to benefit personally from the study, encouraged by industry leaders, other), if the producer will change their operation as a result of their participation in the study, if they would participate in future studies (why), would they recommend others to participate in future studies (why), rate the service of the data collector (poor, fair, good, excellent, no opinion), rate the data collector's understanding and respect for the producers time (poor, fair, good, excellent, no opinion), and if expectations and benefits of participation were clearly described. The completed forms are tabulated by APHIS and the results will be reported in an information sheet for internal use.

3. Describe whether, and to what extent, the collection of information involves the use of automated, electronic, mechanical, or other technological collection techniques or other forms of information technology.

Personal interviews via NASS enumerators are conducted so that questions from the producer about the entire program might be better answered.

### 4. Describe Efforts to Identify Duplication.

Literature searches for existing data relevant to Catfish 2010 have been performed. Available data were reviewed and compiled from all known sources. Sources include cooperative State research, private industry and professional publications, diagnostic labs, other Federal and State agencies, and universities. Personnel from Federal agencies and academia were consulted in their area of expertise to identify areas of potential duplication.

5. If the collection of information impacts small business or other small entities, describe the methods used to minimize burden.

All NAHMS surveys are designed to collect only the minimum data required from a minimum number of producers and/or private veterinarian practitioners to ensure that the data are statistically and scientifically valid. Since NAHMS surveys are voluntary, it is at the discretion of the company/farmer/producer whether or not it is desirable for them to participate or continue to participate. Since the catfish industry is so small, NAHMS will attempt to perform a census of the industry and contact all possible farms.

6. Describe the consequences to federal program or policy activities if the collection is not conducted or is conducted less frequently, as well as any technical or legal obstacles to reducing burden.

Determining the status of the U.S. Catfish industry must continue with the collection of data on the average level of production, prevailing production practices, and the frequency of health problems within the industry. The type, quantity, and frequency of data collected by NAHMS

through national on-farm collections is unique in the U.S. No other entity/source is collecting and analyzing data on the health of the U.S. catfish population.

Without this type of national data, the U.S.' ability to detect trends in management, production, and health status that increase/decrease farm economy, either directly or indirectly, would be reduced or nonexistent. The ability to strengthen consumer confidence in U.S. Catfish products would be severely jeopardized without Catfish 2010.

7. Explain any special circumstances that would cause an information collection to be conducted in a manner:

This information collection is consistent with guidelines established in 5 CFR 1320.5.

8. Describe efforts to consult with persons outside the agency to obtain their views on the availability of data, frequency of collection, the clarity of instructions and recordkeeping, disclosure, or reporting form, and on the data elements to be recorded, disclosed, or reported. If applicable, provide a copy and identify the date and page number of publication in the Federal Register of the agency's notice, soliciting comments on the information collection prior to submission to OMB.

During 2009, APHIS consulted with the following individuals concerning the Catfish 2010 Study:

Dr. Carole Engle, Chair Department of Aquaculture and Fisheries, University of Arkansas at Pine Bluff, 1200 N. University Drive, Mail Slot 4912, Pine Bluff, AR 71601, (870) 575-8523

Dr. Andy Goodwin, Professor - Fish Health and Pathology, University of Arkansas at Pine Bluff, 1200 N. University Drive, Mail Slot 4912, Pine Bluff, AR 71601, (870) 575-8137

Mr. David Heikes, Extension Specialist - Aquaculture/Equipment Development, University of Arkansas at Pine Bluff, 1200 N. University Drive, Mail Slot 4912, Pine Bluff, AR 71601, (870) 575-8143

The NAHMS staff is responsible for developing the basic content of the questions and a reasonable flow through the questionnaire. Upon much iteration a draft is sent to NASS who assumes responsibility for the questionnaire thereafter. This includes review and editing for reasonable content, formatting questions into useable, producer and enumerator friendly terms and arranging questions for the best flow of the interview. Several exchanges of version development occur via Word software and then NASS enters the questionnaire into their Questionnaire Repository System which formats the final product. Conference calls are held between NAHMS staff and NASS to discuss issues related to versions of the questionnaire. Item codes are then assigned and NASS performs the pretests. Pretest results are discussed via conference call and NASS makes the final updates for the enumerator version.

This information collection was reviewed by OMB Statistician Brian Harris-Kojetin. Brian OK'd the collection after CEAH made suggested changes on September 16, 2009.

The Agency's notice of information collection activity was announced in the Federal Register on Tuesday, June 23, 2009, pages 29658-29659. One comment was received from a concerned citizen who complains about most of APHIS' collections but does not address the paperwork burden. Her comment can be read in ROCIS under Public Comments on the Manage ICR Documents page.

## 9. Explain any decision to provide any payment or gifts to respondents, other than reenumeration of contractors or grantees.

There will be no payment or gifts provided to respondents.

### 10. Describe any assurance of confidentiality provided to respondents and the basis for the assurance in statute, regulation, or agency policy.

APHIS will only release study results based on summary estimates from the inference population. Only the NASS designated APHIS confidential agents collecting on-farm data will have knowledge of the participant's identity. All forms, data, and questionnaires will refer to the respondent by a numeric code assigned by NASS. This link between participant and numeric code will be destroyed once data collection, entry, validation and report dissemination are complete (except in those cases where the producer consents to participation in follow-on studies). All completed survey forms, without names and other identifying personal information, will be stored securely in a limited access records vault.

NASS has statutory protection, under Title 7, Section 2276 of the U.S. Code<sup>4</sup> and additionally through the Confidentiality Information Protection and Statistical Efficiency Act (CIPSEA) of 2002 that guarantees NASS's ability to keep individual farm data and associated producer names and addresses confidential. Acting under the capacity granted to government statistical agencies, NASS designates APHIS personnel as confidential agents which allow access to record level data critical to project scope.

Every NASS employee and designated APHIS personnel that may handle a questionnaire, or data coming from a questionnaire, are required to sign a form certifying they understand the restrictions on the use of unpublished data. These documents reference protections provided by the aforementioned statutory and regulatory protections. Access to record-level data files is always restricted and these files are only accessible by NASS employees or designated APHIS personnel. APHIS designated personnel are never provided access to NASS respondents' name and address without producer consent.

### 11. Provide additional justification for any questions of a sensitive nature.

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<sup>&</sup>lt;sup>4</sup> 7 USC Sec. 2276, Confidentiality of information.

There are no questions of a sensitive nature used in this collection activity.

#### 12. Provide estimates of the hour burden of the collection of information.

- **A.** A total of 517 burden hours are needed to complete the Catfish 2010 study information collection activity. A detailed burden estimate has been included on the enclosed APHIS Form 71.
- **B.** Respondent costs: Estimated respondent costs for the information collection proposed is calculated based on an on-farm data collection estimate of \$10.17 per hour<sup>5</sup>. The total respondent cost for the Catfish 2010 study is \$5,258. (517 hours \* \$10.17).
- 13. Provide an estimate of the total annual cost burden to respondents or recordkeepers resulting from the collection of information (do not include any hour burden shown in items 12 and 14).

There are no capital/start-up costs or ongoing operations and maintenance costs associated with this information.

### 14. Provide Estimate of annualized cost to the federal government.

The estimated cost for the Federal government is \$51,330. For more specific information, please see the enclosed APHIS 79 form.

15. Explain the reasons for any program changes or adjustments reported in items 13 or 14 of the OMB Form 83-I.

This is a new information collection.

16. For collections of information whose results will be published, outline plans for tabulation and publications.

Information from this survey will be summarized immediately following the collection, editing, and cleaning of the data. Data will be entered into a database management system utilizing microcomputers or workstations, and statistical calculations will be performed; e.g., descriptive statistics including frequency distribution, prevalence and point estimates. Variance measures and confidence intervals for the point estimates will be calculated in order to describe the

<sup>&</sup>lt;sup>5</sup> NASS Farm Labor, published report for 2006, released May 18, 2007, available upon request.

precision of the descriptive statistics generated. Standard errors will be published along with the point estimates.

Considerable effort has been placed on reducing the time between the end of data collection and release of a final publication. Hardcopy information from the study will be made available to producers, universities, researchers, practitioners, animal health related industries, Federal agencies, legislators, and any other interested party. Copies of current and past information from the NAHMS are available at: <a href="http://www.aphis.usda.gov/vs/ceah/ncahs/nahms/">http://www.aphis.usda.gov/vs/ceah/ncahs/nahms/</a>.

### 17. If seeking approval to not display the expiration date for OMB Approval.

APHIS will display the expiration date for OMB approval on the forms used in this collection.

18. Explain each exception to the certification statement identified under "certification for paperwork reduction act submission," of the Act.

APHIS is able to certify compliance with all provisions of the Act.