

SUPPORTING STATEMENT

Generic Testing – June Area Survey

OMB No. 0535-0248

This mini-supporting statement is being submitted to OMB to define the need for conducting the 2014 June Area Testing. The test is comprised of two main components. The first part of the test will be using a grid system for selecting 60 target segments (20 each in PA, NC, and SD). This test will attempt to measure the enumerator's ability to collect data using the new grid layout. Currently the segments are drawn to use natural or manmade boundaries (roads, rivers, train tracks, etc.) to mark off the segment. In our current June Area Survey enumerators collect data using paper questionnaires and referencing aerial photographs of the selected segment.

To assist the enumerators with the interviews, the new grid segments will be loaded onto iPads and the enumerators will be able to collect the data and mark off the area(s) operated by the farmer within each target grid segment. The farmers who operate or own land inside the 60 grid segments will be contacted by a NASDA enumerator during the data collection period.

The second part of the test will attempt to replicate enumerator's ability to accurately draw off field and tract boundaries using the iPad. This will involve enumerators in the Indiana office replicating segments that were completed previously using the aerial photographs and grease pencils. Enumerators participating in the test will use the iPad to copy the segment photo information using a geographic information system. This test will attempt to evaluate exterior fields only in 30 selected IN segments. No respondent burden is associated with this phase of the testing.

A. JUSTIFICATION

1. Circumstances making collection of information necessary.

NASS is developing a computer-assisted personal interviewing (CAPI) data collection instrument that is deployed on an iPad. Instead of simply recreating the June Area Survey as an electronic photo and questionnaire, the iPad makes it possible for NASS to develop a Geographic Information System (GIS) tool that can provide a vast improvement to the current JAS procedures. The "Geographic Information Running Area Frame Forms Electronically" (or GIRAFFE), was developed with the Center for Survey Statistics and Methodology at Iowa State and will be the application tested to draw out farm segments and collect information about the land.

2. How, by whom, and for what purpose information is to be used.

The information gathered through field testing the GIRAFFE system and the iPad will be used by our Area Frame Modernization Research Team to identify and address issues related to full implementation such as connectivity, battery power, hardware and software issues, iPad visibility in bright conditions, questionnaire usability, ease of drawing tracts and fields, enumerator training, and any other potential technical problems.

The information gathered through these interviews will be analyzed by our Research and Development Division, our Survey Administration Branch, and our Summary, Estimation, and Disclosure Methodology Branch to see if additional modifications need to be made to the questionnaire, Interviewer's Manual, editing parameters, internet data collection instrument, etc. Approved changes will be implemented into future testing that will be conducted in 2016.

3. Use of improved information technology.

The purpose of field testing the GIRAFFE and iPad is to increase our use of improved information technology. The June Area Survey is currently conducted using paper questionnaires and aerial photos of land segments. The GIRAFFE application provides web GIS functionality including a mapping library to add layers to the imagery and tools to assist in drawing segments such as zoom, selection options, and undo/redo buttons. The iPad allows for imagery to be seen in color plus the benefits of having a computer assisted instrument platform in the field. The data will be collected by trained enumerators through face to face interviews.

4. Efforts to identify duplication.

No additional efforts will be taken to identify duplication. The GIRAFFE GIS application was specifically developed to collect the information about the land within the June Area Survey segments.

5. Methods to minimize burden of small businesses.

The 60 grid segments will be drawn to represent the various farm types in each of these States. We will be interviewing different size farm operators.

6. Consequence if information collection were less frequent.

This test is a critical step to identify issues related to, and feasibility of, full implementation of the technology.

7. Special circumstances.

There are no special circumstances associated with this information collection.

8. Federal register notice and consultation with outside persons.

Not applicable.

9. Payments or gifts to respondents.

There are no payments or gifts to respondents.

10. Confidentiality provided to respondents.

The same confidentiality that is applied to the 2014 June Area Survey will be applied to data collected during the GIRAFEE and iPad field test.

11. Questions of a sensitive nature.

There are no questions of a sensitive nature.

12. Hour burden and annualized costs to respondents.

The test is scheduled to be conducted in 60 total (20 per state) selected grid segments in PA, NC, and SD.

Survey	Estimated Sample Size	Estimated Responses			Non-response			Total Burden Hours
		Resp. Count	Min./ Resp.	Burden Hours	Nonresp Count	Min./ Nonr.	Burden Hours	
Area Frame								
Agricultural Tracts	300	240	20	80	60	2	2	82
Non-agricultural Tracts	300	240	5	20	60	2	2	22
Total	600	480		100	120		4	104

We will be conducting the test using 60 segments. Each segment will have on average 5 farm tracts and 5 non-farm tracts.

Cost to the public of completing the questionnaire is assumed to be comparable to the hourly rate of those requesting the data. Reporting time of 104 hours are multiplied by \$25 per hour for a total cost to the public of \$2,600. NASS regularly checks the Bureau of Labor Statistics' [Occupational Employment Statistics](#). Mean wage rates for bookkeepers, farm managers,

and farm supervisors are averaged to obtain the wage for the burden cost. The May 2012 mean wage for bookkeepers is \$17.62. The mean wage for farm managers is \$35.45. The mean wage for farm supervisors is \$22.31. The mean wage of the three is \$25.13.

13. Total annual cost burden to respondents.

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

14. Annualized costs to federal government.

Costs for conducting the test interviews are estimated at \$25,000. This will cover expenses for staff payroll, travel, survey training, and any other data collection expenses. Test development, and the analysis of data collected are estimated to cost approximately \$20,000 for a total expense of \$45,000. NASS and NASDA employees that have been trained to conduct interviews will travel to the farm operations in the 3 selected states to conduct the surveys.

15. Reasons for changes in burden.

This supporting statement addresses additional field tests that were not included in the Agricultural Surveys docket 0535-0213.

16. Tabulation, analysis, and publication plans.

No data will be published from these tests. Data are for internal use only.

17. Request for approval of non-display of expiration date.

There is no request for approval of non-display of the expiration date.

18. Exceptions to certification statement.

There are no exceptions to the certification statement.

B. COLLECTION OF INFORMATION EMPLOYING STATISTICAL METHODS:

1. Respondents universe, sampling and response rate.

NASS selected Pennsylvania, North Carolina and South Dakota to be representative of the varying types of agriculture, farming operations, topography, cropping practices and crops from across the majority of the United

States. We will be selecting 20 grid segments from each State to represent the variety of conditions within each State. We are expecting an 80% response rate for these tests. Within each of the segments we will attempt to collect data from each respondent who operates or owns land inside the segment. We will follow the same data collection procedures used to conduct our June Area Surveys (0535-0213).

2. Procedures for the collection of information.

Trained NASDA enumerators and Supervisors will employ standard data collection procedures during these tests. We want to measure any variances that may occur from our normal June Area Survey conducted annually.

3. Information collected adequate for intended uses.

This test will be the first part of a much larger test that will be conducted in 2016. In 2016 NASS plans to conduct parallel testing in South Dakota and North Carolina that will use the iPads as the medium for collecting data. In addition, NASS will have two complete area samples drawn that will compare the currently used area segments against the grid segments.

4. Test of procedures or methods.

Not applicable.

5. Individuals consulted on statistical aspects of survey.

Claire Boryan, (703) 877-8044 Ext. 168, is the Area Frame Section Head in the Geospatial Information Branch in our Research and Development Division. Claire will be the lead contact on this test.

Selection of methods of testing and providing of training is done by the Research and Development Division; Chief Cognitive Research Methodologist is Jaki McCarthy, (703) 877-8000 Ext. 142. Statistical Methodology Research Branch Chief is Wendy Barboza, (703) 877-8000 Ext. 129.

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