CropScape
A web-based application that allows users with internet access to display, analyze, and download crop-specific categorized (CDL) imagery:
- Free
- Easy to use
- Multiple years are available
- No special software needed
- Integrated with Google Earth™

Perceived Strength in Spatial Accuracy but Unfamiliarity with Method
Of the 25 offices surveyed, the majority (87%) reported using the CDL remote sensing acreage indicators when setting state and/or county estimates. Currently, Field Offices rely on surveys and USDA administrative data that do not always record correct field geolocation.

NASS Field Offices and CDL User Survey
The role of the USDA NASS Field Office is to survey farm operators, ranchers, and agri-businesses to quantify the areal extent, animal count, and subsequent yield and expense of agricultural activities. Currently, a network of 46 field offices serves all 50 states and Puerto Rico through cooperative agreements with state departments of agriculture or universities. Statistics within these Field Offices analyze the surveys with ground observations, objective yield measurements, and other data to produce state statistics ranging from crop-specific yields to farm prices and the Census of Agriculture. These statistics are reviewed at NASS headquarters and released to the public.

CDL User Survey
The CDL User Survey was designed by USDA NASS statistical and spatial analysts and academic researchers. The survey was sent to 19 NASS Field Offices in 2009 and 6 additional NASS Field Offices in 2010. Instructions with the survey asked that the Director and/or lead statistician complete the survey.

Changes:
The CDL User Survey was a partial open-ended survey which contained categorical questions combined with several open-ended comment sections. A total of 27 questions were asked but due to multi-part questions and comments sections, survey respondents could have answered up to 42 questions. Survey respondents were not prompted with demographic questions related to education levels and/or official job titles but were asked which Field Office they represented. Respondents were guaranteed that answers would be kept confidential, therefore individual Field Offices are not identified by response.

Context:
CropScape makes it easy to select any state, county, agricultural statistics district, or user-defined region for investigation. The selected area can be downloaded for use in GIS software apps such as ESRI’s ArcGIS™, ENVI™ or ERDAS Imagine™

Results

Need for Mapping Utility
- Approximately 85% of the Field Offices wanted to implement a mapping utility to integrate CDL products and near-real-time satellite-based rapid response products.
- 72% of respondents indicated that NDVI images would be of interest to their personnel.
- 96% of respondents indicated that rapid response remote sensing products – vegetation indicator and natural disaster products delivered within days of satellite overpass and processing of captured image(s) – would be useful for floods, droughts, and other extreme weather events.
- Several Field Offices commented that drought information would be useful for ongoing policy debates concerning irrigation for agriculture and available water resources and that rapid response products of water stress and/or drought conditions would be useful for floods, droughts, and other extreme weather events.
- The Field Office responses specifically called for in-house mapping utilities and training for use of such software applications.

Conclusion
This study was targeted at internal NASS Field Offices. The results showed:
- General knowledge of the CDL product and perception of accuracy and usefulness were highly dependent on the crops grown per state
- Ability to use & understand remote sensing products
- High interest for training on both GIS and remote sensing software and products and rapid response remote sensing products that could be used in both outreach to producers and the public and for refining statistical estimates.
- The CropScape portal serves as a mechanism toward meeting these needs.