

Responses to the April 5, 2018 NASS Review Comments from Peter Quan on the U.S. Forest Service, National Woodland Owner Survey

Comment: The United States Department of Agriculture Forest Service (FS) is responsible for the inventory and assessment of forest and related renewable resources. The National Woodland Owner Survey (NWOS) – designed to collect information on the nation’s forestland – has been conducted 11 times since 1976. The FS is renewing their previously approved NWOS for another three year cycle.

Response: This is an accurate summary.

Comment: The NWOS Sampling Frame comprises all forested land in the US. The sampling frame is divided into hexagons before selecting one point within each hexagon. Thus, the size of hexagons in a given area is a function of the number of samples allocated to that area. The sample size was determined to achieve a coefficient of variation of at most 15%.

Response: This is an accurate summary.

Comment: The sampling frame, sample size determination and sample selection and estimation procedures are all fine.

Response: Great.

Comment: However, it is interesting FS is using the same sample size for all states. An idea would be to allocate the appropriate number of samples to each state to achieve corresponding target CVs. The target CVs can be lower for areas that have relatively less forest land areas and higher for areas that have relatively more forest land.

Response: The discussion should be focused on number of family forest owners. We are aiming to get similar levels of precision in our estimates, particularly number of family forest ownerships. As the sampling errors will vary greatly depending on the size, we need to look at them in a relative way and hence the coefficients of variation. The numbers of family forest ownerships vary substantially by state, but they are all “large” in terms of survey population sizes (i.e., >10,000) and hence they all require a similar number of samples to achieve similar levels of precision¹.

Comment: The process to maximize response rates and to deal with non-response is very similar to NASS’s procedures: cognitive testing, pre-notice, initial questionnaire, reminder, second questionnaire, telephone interview and electronic version option.

Response: It is encouraging that we are using the same methods.

¹ Dillman, D. A., Smyth, J. D., & Christian, L. M. (2014). Internet, phone, mail, and mixed-mode surveys: The tailored design method (4th ed.). Hoboken, NJ: Wiley & Sons.