Questionable changes in how ag research in land-grant universities is funded

While funding for agricultural commodity programs and the Supplemental Nutrition Assistance Program captures most of the attention during the development of and wrangling over the budget for the farm bill, this column is focused on the funding for agricultural research that is primarily carried out through the Land-Grant University and College system.

The Hatch Act of 1887 was approved by Congress to provide funding for the establishment of agricultural experiment stations by each of the state land-grant institutions. The initial focus was focused on soil fertility and plant growth. Over time the purpose of the research grant was broadened to include all the various research departments that are associated with agricultural colleges.

The current scope of this research touches every US resident. The funds granted to the states "shall be used to conduct original and other researches, investigations, and experiments bearing directly on and contributing to the establishment and maintenance of a permanent and effective agricultural industry of the United States, including researches basic to the problems of agriculture in its broadest aspects, and such investigations as have for their purpose the development and improvement of the rural home and rural life and the maximum contribution by agriculture to the welfare of the consumer, as may be deemed advisable, having due regard to the varying conditions and needs of the respective states" (https://tinyurl.com/y7rokbyy).

The Hatch Act grants must be matched by the states with most, if not all, states providing research funding above the required level. These funds provide a stable base that allows researchers to address the needs of their state and the nation.

Over the last several decades, this broad government research funding was supplemented with federal grants that were focused on particular crops/problems/issues. These additional grants required researchers to spend time writing grant proposals that would be submitted to the USDA. In addition, researchers can apply for funding by private entities including foundations and commercial firms.

Public funding for all agricultural research and development in 1970 was 3.5 billion (2013\$). By 2014, public funding had increased to 4.3 billion (2013\$), a 20 percent increase (<u>https://tinyurl.com/y9xveltj</u>). That increase includes the competitive federal grants, so that the basic Hatch Act funding has declined in constant 2013 dollars.

During that same period, private funding for agricultural input research and development increased from 2.1 billion (2013\$) to 6.3 billion (2013\$), an increase of 193 percent. Some of that research was done by the commercial firms themselves and some was conducted by researchers at land-grant institutions with funds provided by these firms.

With these concepts in mind we have several thoughts we want to share with our readers.

It is our observation that it often takes 4 or 5 proposals to land a grant. As researchers have become more dependent on these competitive grants, the land-grants have had to develop grant and contract offices to process the grant applications. These offices become part of the costs that are embedded in the grant proposals. While not knocking the availability of competitive grants, it must be recognized that the application process takes up time and resources that could be spent working on issues of direct concern to farmers, other rural residents, and consumers in general.

Furthermore, the focus of grant funded research may be of more interest to the funder than farmers, rural residents, and the general population. The resulting research may not meet the needs of an increasingly diverse public where factors other than maximizing yields and the utilization of proprietary products may be more important: issues like the environment, animal welfare, reduced use of pesticides and antibiotics, urban farming, and small farms.

As part of many commercial firm contracts, the results of the research may not be publicly available, and these firms often get the pick of the resulting products, including patents.

In addition, by increasing the dependence of land-grant researchers on private grants and contracts, we certainly end up subsidizing these commercial firms with public money. They would be doing the research in their own laboratories if it were less expensive.

From our experience, we have come to believe that the public would be better served if Congress were to significantly increase the level of Hatch Act funding in this and subsequent farm bills, freeing up researchers to focus more closely on issues of general concern.

Policy Pennings Column 952

Originally published in MidAmerica Farmer Grower, Vol. 37, No. 198, November 30, 2018

Dr. Harwood D. Schaffer: Adjunct Research Assistant Professor, Sociology Department, University of Tennessee and Director, Agricultural Policy Analysis Center. Dr. Daryll E. Ray: Emeritus Professor, Institute of Agriculture, University of Tennessee and Retired Director, Agricultural Policy Analysis Center.

Email: hdschaffer@utk.edu and dray@utk.edu; http://www.agpolicy.org.

Reproduction Permission Granted with:

1) Full attribution to Harwood D. Schaffer and Daryll E. Ray, Agricultural Policy Analysis Center, Knoxville, TN;

2) An email sent to <u>hdschaffer@utk.edu</u> indicating how often you intend on running the column and your total circulation. Also, please send one copy of the first issue with the column in it to Harwood Schaffer, Agricultural Policy Analysis Center, 1708 Capistrano Dr. Knoxville, TN 37922.