

Agricultural Extension Services Provided to farmers by NGOs in the Field of Climate Change in Fayoum Governorate

Salwa Mohamed AbdElgawad Ahmed

**Department of Agricultural Economics, Faculty of Agriculture, Fayoum
University**

ABSTRACT

The research aimed to: identify the advisory services provided by agricultural in the field of climate change, know the farmers' benefit level from these services, determine sustainability and adequacy of those services, know the information sources, identify the sustained and their adequacy of these services, Identify the most important extension methods used to aware farmers about climate change And determine the most important factors affecting of farmers' benefit level from agricultural extension services provided by those organizations in the field of climate change.

The study was conducted in Fayoum governorate. Fayoum and Tamiya districts have been selected according to the most active NGOs in the agricultural field. Two villages were selected from each district: Damashqin and Al-Ielam from Fayoum, Kasr Rashwan and Fanos from Tamiya, A simple random sample of the beneficiaries of these associations was selected by Krejcie and Morgan equation, the sample size reached to 307 respondent.

Regarding the respondents 'awareness of the climate change findings, indicated that majority of the respondents (68.1%) were either average or low awareness of this phenomenon, as their percentage reached 45.9% and 22.2%, respectively, compared to only 31.9% of them had high awareness of this phenomenon.

finding indicated that 45.3% of respondents had average exposure information sources, compared to only 14% who had high exposure. The merchant of agricultural production supplies was the sources of information about climate

change, followed by important personal experience, relatives and neighbors, NGOs, and finally the agricultural extension, as 62.2%, 50.2%, 48.5% , 46.6%, 45.3% respectively.

findings also indicated that the level of services was average, as mentioned by 59.3%.

services provided by associations to the respondents related to awareness of the causes of the phenomenon and its negative effects were: awareness of non-excessive use of pesticides, and chemical fertilizers, unburn of residues, and reduction of crops productivity, as mentioned by 78.8%, 71.3%, 57.9% and 55.4% respectively.

As for the agricultural extension services provided by these societies related to reduce the effects of climate change, it were as follows: encouraging farmers to switch to organic farming, training the respondents on making and using organic fertilizers instead of chemical fertilizers, and holding seminars to urge respondents not to pollute canals and drains and help them to its disinfection, the use of biological control of agricultural pests, and training them to recycle agricultural waste, as mentioned by 80.1%, 76.9%, 71.3%, 68.1% and 65.5% respectively.

About benefit level of services and activities provided to them, it was either low or average, as it mentioned by 40.1% and 38.1% respectively, compared to only 21.8% of them, their benefit was high.

Findings reported that the most important factors affecting the benefit degree of the provided extension services were educational level and sustainability of services, as the illustrate 75.4% of the variance of the dependent variable.