

Farmers' Participation in Agricultural Fairs and Determination of Their Satisfaction Level; Konya Agricultural Fair Example

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HIGHLIGHTS

- Agricultural fairs are organizations that provide important information exchange and innovation opportunities for farmers.
- Agricultural fairs are important organizations for farmers to learn about new technologies and products.
- Farmers' satisfaction with agricultural fairs varies depending on the quality of the organization, the applicability of the information provided, and commercial opportunities.
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Abstract

The objective of the study was to determine the level of satisfaction among farmers who participated in the Konya Agricultural Fair with regard to their experience of agricultural fairs. The sample size was calculated according to simple random probability sampling based on finite population ratios. A survey was conducted with 96 farmers participating in the Konya agricultural fair. The age, education level, and social security status of the farmers were given with simple percentage calculations. The reasons for farmers' participation in agricultural fairs and their satisfaction levels with agricultural fairs were measured with a 5-point Likert scale. The research results showed that the farmers participating in the agricultural fair were between 30 and 49 and were high school and secondary school graduates. The vast majority of them had social security statuses such as Bağkur. It was determined that the participating in agricultural fair. Rapid developments have also emerged in industry and technology with the globalization of the world. Fairs have a very important share in the introduction of these technologies. In addition, fairs have become the biggest dynamics of the need for socialization limited by development. Therefore, efforts should be made to increase the number of participants in agricultural fairs, and the participation of farmers in the fairs should be increased. In particular, farmers participating in agricultural fairs have a very important fairs, and the participation of farmers in the fairs should be increased. In particular, farmers participating in agricultural fairs should be provided with access to financial resources to purchase the technologies they see at the fair.

Keywords: Agricultural Fairs; Farmer; Konya; Satisfaction Level

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1. Introduction

Agriculture plays an important role in economic and social development in most underdeveloped and developing countries (Mokotjo and Kalusopa 2010; Zhang et al. 2016). Agriculture is an important factor in improving the living conditions of rural people especially farmers (Manda 2002). Adequate quality of information is a necessary condition for the improvement of all areas of agriculture (Mao 2012). The provision of agricultural information plays a decisive role in the general development of agriculture as well as in the improvement of farmers' livelihoods (Li 2009; Milovanović 2014). Agricultural information is dynamic due to the increasing awareness of farmers about their needs. The emerging information requirement is demanddriven, unlike the public information system provided during the green revolution. The challenge is to increase farmers' access to information and its importance in agricultural development (Sharma 2002). Farmers use a combination of formal and informal information sources to secure information (Mittal and Mehar 2013). Agricultural fairs are among the sources of agricultural information.

Fairs have been an integral part of the cultural life of society since ancient times. Even in today's information explosion era, fairs are vital for the rural masses as a source of new information, entertainment, and a platform for the exchange of goods (Netrapal et al. 2015). Agricultural fairs constitute extremely important events within the agricultural sector by facilitating the exchange of products and services while also contributing to society through conferences, training sessions, and technology exhibitions (Gutierrez et al. 2024). Agricultural fairs have historically played a critical role in rural economic development by providing a meeting place for the trade of agricultural products, supplying farm supplies, learning new and innovative agricultural techniques, and providing a variety of entertainment services (Kniffen 1949; Lin 1992; Schwartz, 1994; Kelly 1997; Brunt 2003; Longley et al. 2005; Mitchell 2007; Chang 2009; Laflin et al. 2010; Detre et al. 2011; Padilla et al., 2019). Agricultural fairs are fascinating and important planned events (Larsen 2007). The role of fairs as marketplaces for trading farm products, procuring farm supplies, and acquiring innovative agricultural knowledge has significantly diminished (Borish 1997; Mitchell 2007; Chang 2009; Roberts 2015). Agricultural fairs uniquely provide opportunities for social engagement, entertainment, youth development, and exposure to various agricultural product sectors. Fairs also serve educational purposes with exhibits showcasing new technologies and/or stakeholder groups that provide access to non-farm visitors (Mahoney et al. 2020). The role of agricultural trade fairs is to disseminate information on agricultural techniques and technologies used in large-scale production, including marketing, as well as the organization of pavilions for marketing products from family farming (Gazolla and Schneider 2015). The study aims to determine the participation of farmers in agricultural fairs and their satisfaction levels. Since satisfaction is an unobservable abstract concept, it cannot be measured directly (Acharya and Lillywhite, 2021). Several empirical approaches to measuring satisfaction have been proposed in the literature (Iso-Ahola 1980; Iso-Ahola 1982; Iso-Ahola 1989; Nicholson and Pearce 2001; Yoon 2005; Hsu et al. 2009; Lee and Hsu, 2013). In the study, farmers' participation in agricultural fairs and their satisfaction levels were determined with a 5-point Likert scale, which is an empirical approach, as in other studies. Additionally, there is no study in the region on the participation of farmers in agricultural fairs and the determination of their satisfaction levels.

2. Materials and Methods

The main material of the study consists of farmers who came to the Konya province Agricultural Fair. The number of surveys used in the study was calculated according to simple random probability sampling based on finite population proportions (Newbold 1995), which is also used in many studies (Çobanoğlu et al. 2003; Armağan and Akbay 2007; Büyükbay et al. 2009) to reach the maximum sample size in limited populations. According to the data received from the fair authorities, the number of visitors who attended the Konya Agricultural Fair in 2023 was taken as 241,500 people.

$$n = \frac{N p (1-p)}{(N-1) \sigma^{2}_{px} + p(1-p)}$$

In the formula;

- n: Sample volume,
- N: Total number of people in the sampling frame,
- p: Probability of being a farmer (based on 50% assumption),
- σ^{2}_{pr} : variance of the ratio (with a 95% confidence interval and a 10% margin of error to reach the maximum sample volume).

Since it was not known at the beginning how many of the participants who participated in the fair constituting the main mass were farmers, p=0.5 was taken to maximize the sample size. The sample size was taken as p=q=0.5 and calculated as 96 to reach a 95% confidence interval, 10% margin of error, and maximum sample size in the formula. A survey was conducted with 96 farmers who participated in the Konya agricultural fair. The age, education level, and social security status of the farmers were given with simple percentage calculations. The reasons for the farmers' participation in agricultural fairs and their satisfaction levels with agricultural fairs were measured with a 5-point Likert scale. The Likert scale was developed by Rensis Likert (1932) to measure the attitudes, tendencies, and opinions of individuals and groups. Likert-type questions include options that examine the attitudes and behaviors of individuals or groups on the subject under investigation and indicate the level of participation. The Likert scale was developed by Rensis Likert in 1932 and individuals are generally asked to rate the statements on five categories in the attitude scale (Likert 1932).

3. Results

The fair paves the way for participants to meet and collaborate with industry representatives from all over the world. (Bardak and Özdaşlı 2019). These centers on trade routes such as the Royal Road and Silk Road, which have an important position regionally and internationally, have served as fairs throughout history. (TBMM 2013). Fairs can be planned as large or small-scale organizations according to their purpose; they are also used to promote similar products or a wide range of products. (Keleş 2018). Konya Agricultural Fair has significant potential for the Konya region. The differences in people's interests are related to many factors such as people's personal characteristics, age, gender, beliefs and values, upbringing, family structures, living standards, education and income levels, and habits. (Torun et al. 2012). The age status of the participants attending the fair is given in Graph 1.

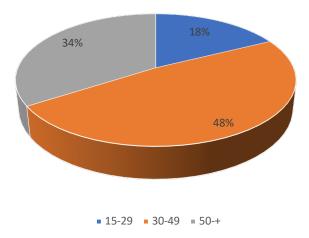


Figure 1. Age of the participants in the fair (%)

According to the graph, 48% of the participants are between the ages of 30-49, 34% are between the ages of 50 and above, and 18% are between the ages of 15-29. The educational background of the participants attending the fair is given in Graph 2. In a similar study, approximately 77% of the fair participants (producers) are over the age of 40 (Savran et al. 2018). In a study conducted in Çanakkale and Tekirdağ, it was determined that 6.6% of the participants were between the ages of 20-30, 15.4% were between the ages of 31-40, 22.2% were between the ages of 41-50, and 55.7% were over the age of 50 (Köksal et al. 2021).

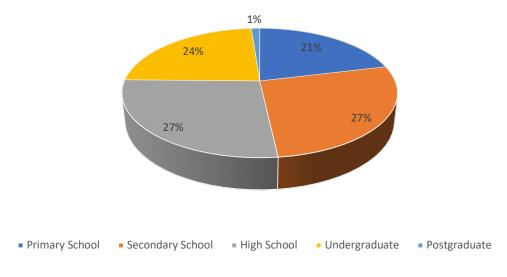


Figure 2. Educational status of farmers participating in the fair (%)

According to Figure 2, 27% of the participants attending the fair are middle school graduates, 27% are high school graduates, 24% are undergraduate graduates, 21% are primary school graduates and 1% are postgraduate graduates. Figure 3 shows the social security status of the participants attending the fair.

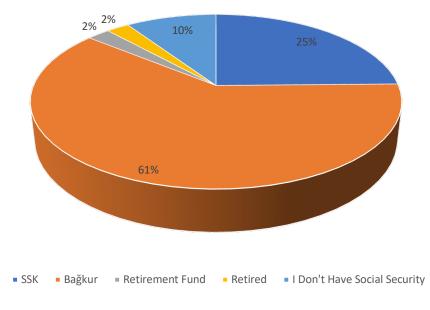


Figure 3. Social security status of farmers attending the fair (%)

According to Figure 3, when the social security status of the participants attending the fair is examined, 61% are BAGKUR, 25% SSK, 10% do not have social security, 1% are retired and 2% are pension fund. The land assets of the farmers participating in agriculture are given in Graph 4.

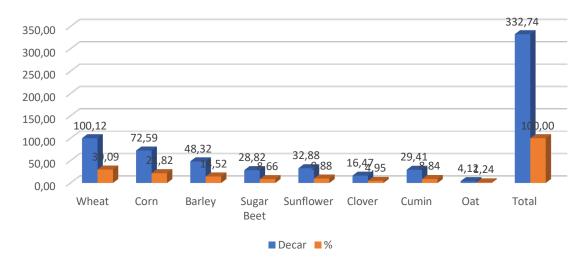


Figure 4. Land assets of the farmers attending the fair (da, %)

The total land area of the farmers participating in the agricultural fair is 332.74 hectares. 30.09% of this land asset is wheat, 21.82% is corn, 14.52% is barley, 9.88% is a sunflower, 8.66% is sugar beet, 8.84% is cumin and 2.24% is oat. The agricultural production experience of the farmers participating in the agricultural fair is 21.93 years. The reasons for the participants' participation in the agricultural fair are given in Figure 5.

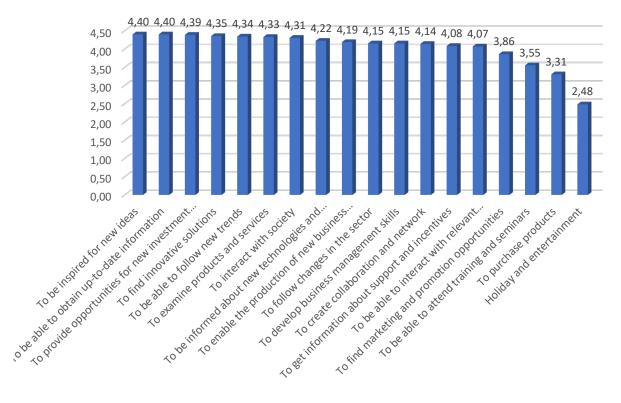


Figure 5. Reasons for the farmers' participation in the fair

When the reasons for participation of the participants attending the agricultural fair are examined, it is seen that they are; to be inspired by new ideas (4.40), to obtain up-to-date information (4.40), to provide opportunities for new investment areas (4.39), to find innovative solutions (4.35), to follow new trends (4.34), to examine products and services (4.33), to interact with the society (4.31), to be informed about new technologies and agricultural innovations (4.22), to enable the generation of new business ideas in agricultural issues (4.19), to follow changes in the sector (4.15), to develop business management skills (4.15), to establish cooperation and network (4.14), to get information about support and incentives (4.08), to interact with relevant organizations (4.07), to find marketing and promotion opportunities (3.86), to participate in training and seminars (3.55), to purchase products (3.31) and to have fun and have fun (2.48). In a similar study, the vast majority of producers (72.9%) who heard about the fair location and time from social media, roadsides, or posters were found to have the reason for attending fairs as seeing new technologies and learning more about these technologies (Köksal et al. 2021). Fairs are temporary or regular places where agricultural products are sold freely (Dickson 1966). The satisfaction of the participants attending the agricultural fair with the agricultural fair is quite important. Figure 6 shows the satisfaction of the participants attending the agricultural fair with the agricultural fair.

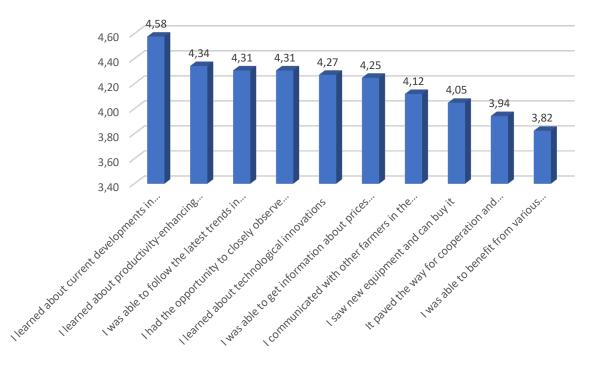


Figure 6. Farmers' satisfaction with the agricultural fair

When the satisfaction levels of the participants attending the agricultural fair were examined, it was determined that they were satisfied with the following issues: learning about current developments in the agricultural sector (4.58), learning about products that increase productivity (4.34), being able to follow the latest trends in the agricultural sector (4.31), being able to closely observe the latest developments in agricultural technology and innovations (4.31), learning about technological innovations (4.27), being able to get information about prices and conditions by directly contacting sellers and suppliers (4.25), communicating with other farmers in the sector and sharing their experiences (4.12), being able to see and purchase new equipment (4.05), preparing the ground for cooperation and partnership opportunities (3.94) and being able to benefit from various pieces of training and seminars (3.82). In a similar study, a large portion of the participants expressed their satisfaction and stated that they would attend the fair again (de Meneses et al., 2007). In a similar study, it was found that participants enjoyed it (5.23), had a good time (5.14), and were satisfied because it was exciting (5.14) and exciting (4.25) (Acharya and Lillywhite 2021).

4. Conclusions

The research results showed that the farmers participating in the agricultural fair were between 30 and 49 and were high school and middle school graduates. The majority of them have social security status as Bağkur. The most produced products are wheat, corn, and barley. The agricultural production experience of the farmers participating in the agricultural fair is 21.93 years. When the reasons for the participation of the participants attending the agricultural fair were examined, it was determined that they attended to be inspired by new ideas (4.40), to obtain up-to-date information (4.40), to provide opportunities for new investment areas (4.39), to find innovative solutions (4.35), to follow new trends (4.34), to examine products and services (4.33), to interact with the society (4.31), to be informed about new technologies and agricultural innovations (4.22), to enable the generation of new business ideas in agricultural matters (4.19), to follow changes in the sector (4.15), to develop business management skills (4.15), to establish cooperation and network (4.14), to receive information about support and incentives (4.08), to interact with relevant organizations (4.07), to find marketing and promotion opportunities (3.86) and to attend training and seminars. When the satisfaction levels of the participants attending the agricultural fair were examined, it was determined that they were satisfied with the following: learning about current developments in the agricultural sector (4.58), learning about productivity-enhancing products (4.34), being able to follow the latest trends in the agricultural industry (4.31), having the opportunity to closely observe the latest developments in agricultural technologies and innovations (4.31), learning about technological innovations (4.27), being able to get information about prices and conditions by directly contacting sellers and suppliers (4.25), communicating with other farmers in the sector and sharing experiences (4.12), being able to see and purchase new equipment (4.05), preparing the ground for cooperation and partnership opportunities (3.94), and being able to benefit from various pieces of training and seminars (3.82). In a similar study, it was determined that a large portion of the participants at the fair would return by expressing their satisfaction. This situation shows that the education levels of the farmers involved in agricultural production are generally at a medium level and that the farmers are satisfied with the agricultural fair. Rapid developments have also emerged in industry and technology with the globalization of the world. Fairs have a very important share in the introduction of these technologies. In addition, fairs have become the greatest dynamic of the need for socialization that development has limited. Therefore, efforts should be made to increase the number of participants in agricultural fairs, and farmers' participation in fairs should be increased. In particular, farmers participating in agricultural fairs should be provided with access to financial resources to purchase the technologies they see at the fair.

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References

- Acharya RN, Lillywhite J (2021). The role of push and pull motivations on satisfaction and consumer loyalty to agricultural fairs. *Agriculture 11*(10): 923.
- Armagan G, Akbay C (2007). An econometric analysis of urban households' animal products consumption in Turkey. *Applied Economics* 1-8
- Bardak S, Özdaşlı K (2019). Sistem yaklaşımı açısından türkiye'de fuarcılığın gelişimine yönelik bir model önerisi. Süleyman Demirel Üniversitesi İktisadi ve İdari Bilimler Fakültesi Dergisi 24(4): 847-869.
- Borish LJ (1997). 'A Fair, Without the fair, is no fair at all': Women at the New England Agricultural Fair in the mid-nineteenth century. *Journal of Sport History* 24(2): 155-176.
- Brunt L (2003). Mechanical innovation in the industrial revolution: the case of plough design. *The Economic History Review* 56(3): 444-477.
- Büyükbay OE, Sayılı M, Uzunöz M (2009). Tüketicilerin sosyo-ekonomik özellikleri ile salça tüketimleri arasındaki ilişki: Tokat İli örneği. *Gıda Teknolojileri Elektronik Dergisi* 4(1): 17.
- Chang HCH (2009). Rethinking public policy in agriculture: lessons from history, distant and recent. FAO, Rome, Italy, p. 97.
- Çobanoğlu F, Konak K, Bozkurt M. Aydın ilinde etlik piliç işletmelerinin ekonomik analizi ve pazarlama durumu. *Akdeniz Üniversitesi Ziraat Fakültesi Dergisi* 15.
- De Meneses BUL, González MR, González-Andrés F (2007). The contribution of agrifood fairs to rural development: the Castilla and Leon region in Spain case study. *Economics and Rural Development* 3(2): 22-27.
- Detre JD, Mark TB, Mishra AK, Adhikari A (2011). Linkage between direct marketing and farm income: a double-hurdle approach. *Agribusiness* 27(1): 19-33.
- Dickson GW (1966) An analysis of vendor selection systems and decision. *Journal of Purchasing & Supply Management* 2(26): 735–738.
- Gazolla M, Schneider S (2015). Conhecimentos, produção de novidades e transições sociotécnicas nas agroindústrias familiares. Organizações Rurais & Agroindustriais 17(2).
- Gutierrez RP, Júnior ALN, Vieira JBF, Rosa CB (2024). Agricultural fairs management: A literature review. Business and Management Studies Vol. 10, No. 1; June 2024 ISSN: 2374-5916 E-ISSN: 2374-5924 Published by Redfame Publishing
- Hsu CHC, Cai LA, Mimi L (2009). Expectation, motivation, and attitude: A tourist behavioral model. *Journal* of Travel Research 49: 282–296.
- Iso-Ahola SE (1980). Social Psychological Perspectives on Leisure and Recreation; Charles C. Thomas: Springfield, IL, USA.
- Iso-Ahola SE (1989). Motivation for leisure. In Understanding Leisure and Recreation: Mapping the Past Charting Future; Venture Pub.: State College, PA, USA, pp. 247–279.
- Iso-Ahola, SE (1982). Towards a social psychology of theory of tourism motivation: A rejoinder. *Annals of Tourism Research* 9: 256–262.
- Keleş H (2018). Fuar turizmi ve gelişimi: Manavgat destinasyonundaki turizm sektörü temsilcilerinin bakış açısına yönelik bir uygulama. Phd Thesis, Selcuk Universty (unpublised), Türkiye.
- Kelly CE (1997). The consummation of rural prosperity and happiness: New England agricultural fairs and the construction of class and gender, 1810-1860. *American Quarterly* 49(3): 574-602.

- Kniffen F (1949). The American agricultural fair: the pattern. *Annals of the Association of American Geographers* 39(4): 264-282.
- Köksal Ö, Aktürk D, Gün S (2021). A research on producer reasons for participation into agricultural fairs. *Turkish Journal of Agriculture-Food Science and Technology* 9(12): 2312-2318.
- Laflin SL Anderson DE (2010). State fairs: A means of exposing America's youth to the veterinary profession? Online Journal of Rural Research & Policy 5(7): 13.
- Larsen MH (2017). Getting a sense of agriculture: Visitor experiences from an agricultural fair. *Sociologia Ruralis* 57: 661-681.
- Lee TH, Hsu FY (2013). Examining how attending motivation and satisfaction affects the loyalty for attendees at aboriginal festivals. *International Journal of Tourism Research* 15: 18–34.
- Li D (2009). China rural informatization development 2009 report. Publishing House of Electronics Industry: Beijing China.
- Likert R (1932). A technique for the measurement of attitudes. Archives of Psychology, New York, USA, p.55.
- Lin JY (1992). Rural reforms and agricultural growth in China. The American Economic Review 82(1): 34-51.
- Longley C. Dominguez C, Devji M (2005). Agricultural input trade fairs and vouchers in Mozambique: Experiences and lessons learned. ICRISAT/ODI Working Paper, p.48.
- Mahoney JA, Widmar NJ, Bir CL (2020). # GoingtotheFair: a social media listening analysis of agricultural fairs. *Translational Animal Science* 4(3): txaa139.
- Manda PA (2002). Information and agricultural development in Tanzania: a critique. *Information Development* 18(3): 181-190.
- Mao Y (2012). Meaning and mode of mobile information services. Information Science 2: 2012.
- Milovanović S (2014). The role and potential of information technology in agricultural improvement. *Економика пољопривреде 61*(2): 471-485.
- Mitchell I (2007). The changing role of fairs in the long eighteenth century: Evidence from the north midlands 1. *The Economic History Review* 60(3): 545-573.
- Mittal S, Mehar M (2013). Agricultural information networks, information needs and risk management strategies: a survey of farmers in Indo-Gangetic plains of India. Socioeconomics Working (Vol. 10), CIMMYT, p. 29.
- Mokotjo W, Kalusopa T (2010). Evaluation of the agricultural information service (AIS) in Lesotho. *International Journal of Information Management* 30(4): 350-356.
- Netrapal Malik NM, Singh VP, Jeena AS (2015). Participation and information seeking behavior of farmers from Uttarakhand hills at Pantnagar farmers fair: a study. *International Journal of Tropical Agriculture* 33(4): 2899-2905.
- Newbold P (1995). Statistics for Business and Economics. Prentice Hall, New Jersey, USA 1995
- Nicholson RE (2001). Pearce, D.G. Why do people attend events: A comparative analysis of visitor motivations at four South Island events. *Journal of Travel Research* 39: 449.
- Padilla WR, García J, Molina JM (2019). Knowledge extraction and improved data fusion for sales prediction in local agricultural markets. *Sensors* 19(2): 286.
- Roberts H (2015). Place-Identity and the geographies of contemporary county fairs in Oklahoma.
- Savran F, Köksal Ö, Aktürk D (2018). A Research on reasons for participation of producers to agricultural fairs. Ege Üniversitesi Ziraat Fakültesi Dergisi 55(1): 19-25.

- Schwartz LA (1994). The role of the private sector in agricultural extension: Economic analysis and case studies. *Network Paper 48*, p.67.
- Sharma VP (2002). Cyber extension: The extension approach for new millennium. Manage Cyberary 18(8).
- TBMM (2013). Türkiye Büyük Millet Meclisi Ekonomi Maliye Bölümü.
- Torun E, Çelik A, Bobat A (2012). Pazarlamada fuarların rolü ve önemi (Yalova süs bitkileri ihtisas fuarı örneği). *KSÜ Doğa Bilimleri Dergisi* 15(2): 11-21.
- Yoon Y, Uysal M. (2005). An examining the effects of motivation and satisfaction on destination loyalty: A structural model. *Tourism Management* 26: 45–56.
- Zhang Y, Wang L, Duan Y (2016). Agricultural information dissemination using ICTs: A review and analysis of information dissemination models in China. *Information Processing in Agriculture* 3(1): 17-29.