

Farm Households' Behavior and The Quality and Safety of Agricultural Products

Qing Wang^{1,2}, Weijun Jiang^{1,2*}, Yingshuang Ma¹, Jiali Xiao¹

¹ College of Business, Huanggang Normal University, Huanggang 438800, China

² Dabie Mountain Agricultural Resources Utilization of Collaborative Innovation Center in Hubei Province, Huanggang 438800, China

Abstract: The root of agricultural product quality safety problem is the problem of source management of agricultural production, the production behavior of farmers has a decisive influence on the level of quality and safety of agricultural products. Only through the internal incentive and external restraint mechanism to optimize the farmers' agricultural production behavior, can solve the problem of agricultural product quality and safety in china.

Keywords: Farmers' behavior, agricultural products, quality safety, agricultural development

From the point of view of international experience, solving the problem of the quality and safety of agricultural products need producers, enterprises, government and social interaction to propel. But from the point of view of the agricultural development of our country, if only there are small and scattered farmers equipped with the consciousness of strengthen quality and behavior of production safety can the quality and safety of agricultural products get effective solution.

I A REVIEW OF THE THEORY OF FARMERS' BEHAVIOR

Generally speaking, farmers have the dual roles of producers and consumers. The behavior of this paper focuses on the analysis of their behavior as a producer. When looking at the farmer's individual as a producer, the farmer's behavior can be defined as: "the farmer" s response to the input and output of the input and output, which corresponds to the change of the price of the agricultural products and the factors of production "[1]. Current theoretical research for the behavior of farmers has formed three more representative of the school, the Russian a Chayanov for representative school of organization of production, to the west of Okin Schulz representative of the school of Rational Peasant and Historical School of yellow Zong Zhiwei representative.

School of production organization that rely on the economic development of the farmers is their labour, and not hired labor; its products mainly to meet the demands of family self-sufficiency rather than the pursuit of profit maximization of the market; because farmers labor input not in the form of wages measurement. Because of this, the optimization behavior depending on the balance between

consumer satisfactions and work hard, rather than the profit and cost comparison.

Schultz, the Economics Prize winner T.W. Nobel, as the representative of the rational school, considered the behavior of farmers is rational, and its behavior tends to act in accordance with the principles of rational investors. In the "transformation of traditional agriculture", Schultz pointed out that farmers is equivalent to enterprises in the capitalist market economy, farmers are entrepreneurs, once the modern technology inputs can guarantee profits at the current price levels, farmers will not hesitate to become the pursuit of the most profits. From such a point of view, the rational thought is essentially the peasant household as the economic man who has the greatest benefit. Historical school representatives of Chinese sociologist Philip Huang in the analysis of the results of the two schools of thought that family farmers in very low marginal returns will continue to put in the work, the reason may be that farmer family did not owns the concept of marginal returns or the the size of arable land of the peasant households are restricted so that family labor surplus too much, due to the lack of a good employment opportunity, the opportunity cost of labor is almost zero. He believes that the peasant is the pursuit of profit, but also the producers of maintaining the livelihood, there need to analyze the motivations and behaviors of peasant, it must combine the behavioral theory of the firm and the theory of consumer behavior, the former pursues the profit maximization, and the latter pursues the utility maximization.

The three theories in explaining the behavior of peasant household in China has its rationality, despite the formation of Huang Zongzhi theory of farming is

largely based on investigation of North China, but due to the before and after the reform and opening up to the outside world in different regions of China rural economy development level, farmer behavior also exist large differences. Therefore, the theory in explaining the behavior of farmers need to re-examine, but to be sure, these behavior patterns are product specific environmental factors has the rationality of the existence of views. According to such a view, we can consider the behavior of farmers is farmers in driven by profit maximization, according to its production conditions and objective and around the objective of natural, economic and social environment of production investment and technology adoption activities. That is to say, the farmer behavior is purposeful and rational, is to pursue the maximization of their own interests as the ultimate goal, but subject to their own subjective understanding ability, economic ability and its social and economic environment, the rationality of farmers is limited, from the farmers' perspective of rational behavior, in the eyes of others is likely to be irrational, or said is the rational behavior in the short term, in the long run has may be irrational.

II THE MAIN CHARACTERISTICS OF FARMERS' BEHAVIOR IN OUR COUNTRY AT PRESENT

According to the second national land survey, by the end of 2012, China's arable land area of 2.027 billion mu, [2] is only 1.50 mu of cultivated land per capita, less than the world average of 1/2, and this situation is increased with the increase of population and cultivated land resources dwindling and gradually increased, so that farmers produce curing in ultra small business status. At the same time, the policy and the average distribution of farmland allocation mechanism of cultivated land of finely, enable farmers contracted land is not only the size smaller and smaller, and more and more diversified, finely, which restricts the development of agricultural mechanization, hindering the formation of scale economy, which serious impact to the improvement of agricultural productivity. But in another ways, finely of arable land to farmers that diversity in different plots of land, so that they can basically meet the needs of families on agricultural products consumption. Farmland scale restriction and, therefore, the existence of diversity, enable farmers production is a production of subsistence and commercial production of mutual integration, namely the peasant household production of agricultural and sideline products, first of all, to be used to meet the needs of the family's own consumption, then the rest will be for sale, to meet the needs of the consumer society. In this process, the purchase of production and sales of agricultural products, farmers are ChanGuDuHu geared to the needs of the market, decentralized production, independent, and between production and marketing have randomness and chance, not form a fixed supply and demand relations

of cooperation. This ChanGuDuHu operators to farmers is lack of enough capital, technology, capture market information, are less able to withstand market risks and natural disasters, lack of necessary technical guidance in the process of agricultural production and product quality inspection, production operation management difficult to standardize, so as to make the low level of standardization of production, product quality is not easy to control, poor stability.

It is important to note that since China's reform and opening up, along with the development of market economy, the behavior of the farmers more and show the dual development tendency: on the one hand, as far as possible stable family basic subsistence production of agricultural products consumption, on the other hand, efforts to seek the rapid growth of the domestic currency income. Due to the low agricultural comparative benefits, farmers often no longer keen to increase agricultural investment, labor and capital investment focus to non-agricultural industries. This kind of situation determines the peasant household production behavior to the restriction of the agricultural income important degree. In general, the lower level of the development of farmers and non-agricultural income less important, strong, the greater the dependence of farmers on agricultural income, farmers will put more energy in agricultural production, to seek the optimal methods and techniques to engage in agricultural production. Degree is higher, on the other hand, the farmers development of agricultural income less as an important source of income, so the farmers don't want to spend more time and resources on agricultural activities, relative time save trouble of agricultural technology is a good alternative for labor, and therefore, in the agricultural production, farmers tend to use to save time, energy, money and efficient high toxic pesticide for prevention and control of plant diseases and insect pests, the use of chemical fertilizer to improve soil fertility and increase production. In real life, the farmland pastureland, QiGeng is more typical example.

The improvement of the level farmers development means the transfer of rural surplus labor force to the second and third industry, to improve the efficiency of agricultural labor force and the use of agricultural resources, it is of great significance to increase farmers' income; But must see, transfer of rural labor force to the second and third industry, is a relatively high cultural quality of the rural youths, with their transfer to non-agricultural industries, currently staying in the rural agricultural production mainly by some old people, children and women, because of the rural women and some engaged in agricultural production, the old man in the aspects of physical, cultural quality, make the cultivated land utilization and agricultural productivity can be effectively improved, the serious influence to the development of the agricultural scale and specialization, hindered the promotion of advanced

agricultural production technology and use, to a certain extent restricts the improvement of agricultural productivity, also affects the development of agricultural production safety.

III THE INFLUENCE FACTORS OF FARMERS SUPPLY OF AGRICULTURAL PRODUCTS SAFETY BEHAVIOR

From the point of safe agricultural production situation in China, certified pollution-free agricultural products, green food and organic food are agricultural production base as the carrier, or by a government or a company farmer cooperative economy organization behavior such as main drive, guiding farmers to the results of the scale, standardization and standardization production. Due to the agricultural production is a combination of natural reproduction and economic reproduction process, the production object is living animals and plants and microorganisms, the specific land, temperature, light, water, heat, gas and other environment and conditions for crop growth and development has an important influence, that is to say, are greatly influenced by the natural ecological environment of agricultural production, and compared with the industrial products, agricultural products production cycle is

long, production, processing, packaging, transport link is more, more quality and safety is not controllable factors. Therefore, by related parties to unite the peasant household production of similar products, the use of advanced applicable technology, unified quality standards, realize the scale operation, from the origin of environmental management, the investment of means of agricultural production, the production technology of the specification, the processing and packaging, storage transportation link control, the standardized management, is the main way of safety production in China at present. But is that the current social reality ChanGuDuHu small-scale peasant families to provide agricultural products is still the constitution of daily consumption between urban and rural areas in China. Therefore, small-scale peasant production form farmers to the supply of safe agricultural products for quality and safety of agricultural products in China is very important. But, as stated earlier, peasant household behavior is under certain economic and social environment of a productive investment choice, restricted by various factors, the supply of agricultural products safety behavior and the related influencing factors can be expressed in below [3].

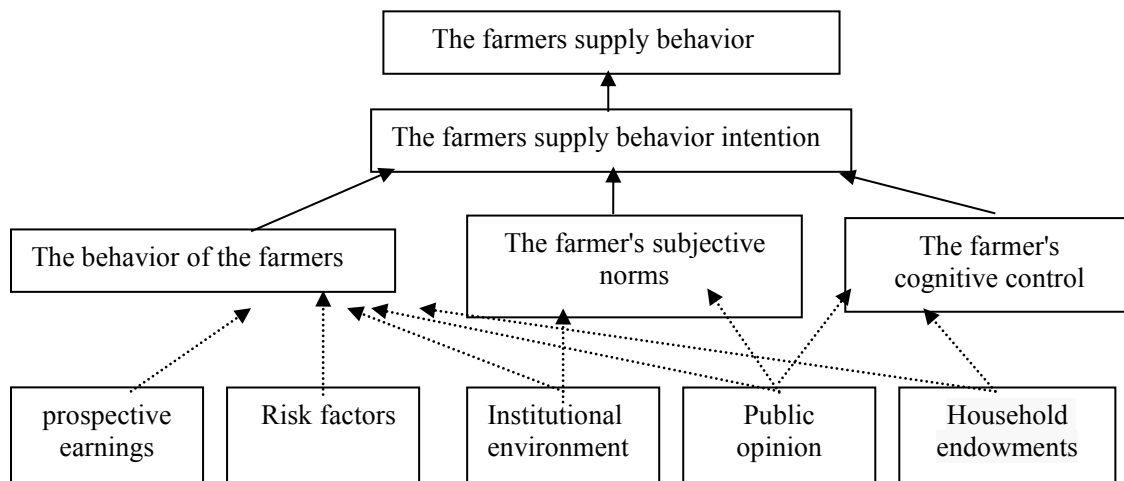


Figure 1. The influence factors of farmers supply of agricultural products safety behavior and mechanism of action.

Can be seen from the figure, the expected return, risk factors, the institutional environment, social public opinion and farmers endowment for farmers the farmers behavioral attitude, subjective norm, the control of farmers cognition, and then supply to farmers security behavior intention and supply behavior itself has an important influence. Among them, the expected return is farmers based on the price of the previous period of safe agricultural products and choose this period to provide a safe agricultural benefits, you will be able to access the high and low directly decides the willingness to peasants for safe agricultural production; Risk factors include natural risk, market risk and the risk of the

use of advanced production technology or methods, especially the safety of agricultural products market price risk for the choice of peasant household behavior has important influence; Institutional environment including related laws and regulations, the quality and safety of agricultural products quality supervision system and the corresponding ethical, etc., is a code of conduct for the peasant household behavior choice; Public opinion as an effective complement, the institutional environment for the peasant household behavior is also a kind of behavioral norms; Farmers endowment including farmers have all kinds of resources, education level, individual ability and social experience, and many

other aspects.

From the perspective of the influence factors of peasant household safety supply of agricultural products in recent years, as "pollution-free food action plan" to promote, in society have formed consumer food safety in a good atmosphere for public opinion, consumer health consciousness constantly improve, the wave of green consumption is gradually rise, residents of consumer preference is turning to safety and quality of agricultural products; On the other hand, with the development of the market economy and the deepening of rural reform, the majority of farmers thought idea, the consciousness of market, personal ability, etc have improved greatly, also begin to pay more attention to their own health and safety consciousness, and began to consider the self-sufficient agricultural products safety. Therefore, the main factors affecting the safety supply of agricultural products for farmers, one is a farmer expected returns of production safety of agricultural products, the other is the system environment, that is to say, the safety of agricultural products market price and the government regulation of markets for agricultural products for farmers supply behavior has the decisive influence of safe agricultural products. However, due to the lack of system of external constraints, and agricultural product quality internal incentives, the farmer's production behavior to maximize their own interests as the fundamental purpose: under the guidance of growth in the traditional concept, rely on increasing yield significant such as fertilizers and pesticides intensive input of means of agricultural production to improve agricultural production has become the inevitable choice of farmers. And in the interests of the driven, purchase and use highly toxic pesticide, feed in illegal additions such as hormones and growth promoters as well as the sales and production of pesticide residues in agricultural products seriously, for their own consumption and production of no pesticide pollution of agricultural products of the phenomenon is the reasonable explanation. Which further shows that the market information asymmetry and the lack of market of agricultural products effective supervision and management mechanism, is one of the important reasons of produce quality safety problems [4], which also determines, to improve the quality and safety of agricultural products, accelerate the construction of agricultural product market system and to strengthen the supervision and management of the agricultural production process is indispensable two conditions; And the emphasis and difficulty in currently lies in small-scale, decentralized small-scale peasant economy to achieve these two goals from all sorts of difficulties and obstacles. How to break through the difficulties and obstacles, becomes the current the key to improve the

quality and safety of agricultural products in China.

IV CONCLUSION

The level of quality and safety of agricultural products, directly related to the sustainable development of agriculture in our country, more related to the broad masses of the people's quality of life. In the small-scale peasant production pattern is difficult to change in a short time, must further strengthen agricultural production safety training and propaganda work, improve the farmer's production safety consciousness, and through the quality of agricultural products of incentive mechanism, leading producers to adopt advanced technology for production and safety of agricultural inputs; At the same time, by encouraging farmers to join intermediary organizations such as farmer cooperative economy organization to improve organizational degree, is beneficial to use all kinds of organization carrier to agricultural production, processing, circulation of omni-directional, the whole process of standardization management and control, strengthen the supervision and standardize the peasant household production, so as to make up for the government in the agricultural product quality safety management in the process of the low efficiency, reduce the social organizations in the increase of produce quality safety management cost [5]. In establishing a perfect organization of supervision and management mechanism, on the basis of the government will also create a good external environment, especially to push and ensure the smooth operation of the "law of produce quality safety" implement, change the way of promoting agricultural production, optimization of the agricultural production behavior of peasant household, achieve the purpose of the steady rise of the quality and safety of agricultural products.

ACKNOWLEDGEMENT

Project of Humanities and Social Science of Educational Commission in Hubei Province(15D115); Excellent young talents Program of Educational Commission in Hubei Province(Q20162907); High-Level Project Cultivate Fund of Huanggang Normal University.

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