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# RESEARCH ON THE WISDOM OF CHINESE TRADITIONAL AGRICULTURAL TOOLS FROM THE PERSPECTIVE OF DESIGN STUDIES

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In order to clarify the reasons for the continuity of Chinese traditional design for thousands of years, traditional agricultural tools are used as an example to study the design wisdom contained in Chinese traditional design culture. Re-examining traditional Chinese agricultural tools from the perspective of the unity of technology and art in design science, and comparing traditional agricultural tools in three dimensions of time, region, and culture, such as form, function, craftsmanship, use, aesthetics and other multi-dimensional comparisons, the design process of traditional agricultural tool design is full of modernized design principles, i.e., the traditional agricultural tools are equipped with the design wisdom of the appropriateness of the use and the appropriateness of the human being.

Key words: Chinese traditional agricultural tools, design science, design wisdom.

#### INTRODUCTION

Chinese traditional agricultural tools are agricultural production tools invented and inherited by the working people, and in different historical periods, they have undergone the evolution of materials, shapes and functions to form a large number of richly shaped agricultural tools with local characteristics. Agricultural tools of different periods are always born in a specific time and space scale, full of unique design factors, generating different evolutionary logic, reflecting different values, and representing traditional livelihood design. Re-examining the evolutionary logic of traditional agricultural tools from the perspective of design is undoubtedly an important window for studying traditional Chinese design culture and exploring the relationship between modern design and traditional artifacts.

### PURPOSE

From the perspective of design, the study of artifacts in the rural culture of Tianfu is re-examined from the new unity of technology and art, especially focusing on the practical instruments serving the agricultural production and life, and the design wisdom based on this is a kind of "living" survival wisdom and production and life wisdom, which is of great reference value to the formation of innovative design features in contemporary China.



## **RESULTS AND DISCUSSION**

Traditional agricultural tools, as show in fig. 1, are designed to better serve people's livelihoods through the theoretical summarization of farming techniques and the advancement of artifact design, which is mainly manifested in the fact that artifact design is characterized by a clear emphasis on experience and practicality, rather than theory.



**Fig. 1.** Some of the traditional agricultural tools shown in the Ming Dynasty volume of the Complete Book of Agricultural Politics (a – Flail, b - Pound with a pestle, c – Pestle, d – Grind, e – Fans, f - Oil press [2]



Traditional agricultural tools are the products of human creative activities, people are designers, manufacturers, users, people design the structure, function, form and other aspects of the artifacts, which inevitably requires that all the design of traditional agricultural tools originates from human perception, that is, the sense of the body, the sense of the heart, the use of the use of whether to feel comfortable, safe and efficient. The relationship between agricultural tools and people is extremely close, it is the bridge between people and agricultural affairs, and the perception of human body directly responds to the design value of agricultural tools. To create things in accordance with the premise of human body structure and body perception is essentially a design principle centered on "fitness for human beings" [3].

This is essentially a manifestation of the principle of "good tools and good deeds", the essence of which is to research and develop tools to help farmers accomplish agricultural production. Reflected in the traditional grain roughing agricultural tools, manifested in the "suitable for use" as the core design principle, which is in sharp contrast with the contemporaneous flashy but not practical gold and jade "playware" [1]. The reason why traditional agricultural tools for rough processing of grains can continue for thousands of years is that they are in line with the design principles of appropriateness and efficiency, characterized by simple structure, concise function and simple use, suitable for a series of process requirements, and also the design principles of appropriateness of processing tools that are most in line with the Chinese smallholder farming model [2].

## CONCLUSIONS

Traditional farming tools still in use are the epitome of Chinese agricultural implements and one of the starting points for the historical study of China's farming civilization and traditional Chinese design, and the design genesis of traditional farming tools contains the innovative wisdom of appropriateness of use and appropriateness of people.

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