



# The Path and Problem of Big Data Intervening Non-legacy Protection

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**Abstract.** With the development of information technology, all industries have been inseparable from the support of big data. Big data plays an important role in information transmission, screening, storage and so on. At the same time, the protection of intangible cultural heritage has been attached great importance to by China. The development of big data brings a new proposition of the times for non-legacy protection, which is worth thinking deeply. This paper clearly expounds big data and non-legacy protection, and analyzes the aspects that big data can play a role in non-legacy protection. At the same time, this paper points out the existing problems and gives operational solutions.

**Keywords:** Big Data · Non-legacy Protection · Path and Problems

## 1 Introduction

Since Kunqu Opera was included in the list of representatives of human intangible cultural heritage, China's non-legacy protection began. So far, it has been more than twenty years. Among them, many gratifying achievements have been made, the state has built a top-down protection system, and issued relevant policies for existing problems. Under the new situation of wide application of big data, China has also adjusted its protection policy.

## 2 Analysis of Big Data in Non-legacy Protection

With the deep development of science and technology, it impacts people's inherent thoughts and brings severe thinking under the new era. They are more involved in the development of national history, trying to grasp the pulse of the times through scientific and technological iterations. In this way, to achieve the high ideological realm of family and country colleagues. At this moment, big data as a new thing, not surprisingly triggered the public's attention. The authoritative expert points out that big data refers to the information assets that the general technical products can not quickly sum up, integrate and innovate the data within the specified time, and must rely on the new information form to be able to process. In general, its advantages are classified as five points: rapidity, quickness, low value, large storage space, accuracy and reliability. Because it contains

the above advantages, it is widely used in real life. However, in the process of popularization, it can not be changed, and needs to enrich the new connotation anytime and anywhere according to the new situation. That needs to reserve a variety of disciplines literacy knowledge, and current production summary, in case of need. Fortunately, relevant experts pointed out that we have entered the era of big data, but did not form a “one-stop” industrial chain, so people are not easy to detect. The important sign of entry is the study of data mining. It is a new idea, especially for the times. It usually helps people make major decisions, using super search engines to filter out eligible data under a variety of information. Through the real-time analysis in the computer, the optimal solution of the problem is found. At present, it has been widely used in many fields, such as office, teaching and news.

On the other hand, experts note that in the context of big data communication, non-legacy shows another more positive style. Because of the support of big data media, space is no longer an obstacle to communication. On the contrary, because of the geographical location of the style, gave birth to a unique culture. This means that in the bustling city of tall buildings, tourists find the habitat of the soul, which becomes an important factor to attract tourists. At present, Yunnan departments see this opportunity, has planned to build a lantern technology exhibition hall. The history of lantern hundred years is brought into the museum, and a large number of media are attracted to report and spread, so as to expand its influence and be noticed by people in various regions. The integration of culture and economy is one of the protective measures, which keeps the pulse of traditional spirit and helps to move to a larger stage. These beneficial attempts not only stabilize the heart of the non-heritage inheritors, but also combine culture with economy to build a supporting industrial chain, and achieve a win-win situation of non-heritage protection and cultural prosperity through favorable policies. This example of success model, suitable for different regions combined with different local characteristics to transform [1].

The technology of interconnection of all things opens up a new way to protect non-heritage, but in the implementation stage, the two intertwined often produce new problems. Its fundamental reason lies in our country's unique economic structure, our country takes the small peasant economy as the main body, and takes part of the commodity economy, the insufficient development. For thousands of years, men and women weaving, independent individual labor deeply rooted in the hearts of the people. Therefore, the intangible cultural heritage produced on this basis has the characteristics of monopoly skill, generation inheritance and development disharmony. How to separate it from the individual, enter the collective vision, stable and long-term development, become a difficult problem to be solved urgently by big data. At present, a considerable number of non-heritage activities are still in the local, no growth out of the creative activities. This phenomenon not only does not let the public understand the charm of non-posthumous, but also makes its protection frequently blocked. Relevant experts through field visits, practical analysis, for non-legacy protection customized a program. That is, follow the tide of the times, using the media technology that young people like to promote non-legacy protection. The specific method is to build a network communication platform, using its large number of visits, rich information, wide audience, simple and easy to operate advantages. Big data technology performance skillfully integrated

into non-legacy products, vivid and specific dissemination. For example, it can create relevant websites, conduct online classroom presentations and integrated interaction. In this way, it not only retains the original characteristics of non-heritage, but also adds new elements to its promotion.

### 3 The Problem of Big Data in Non-legacy Protection

In a broad sense, “protection “means taking effective measures to retain the memory of non-posthumous people, such as the construction of museums, the establishment of production bases and the government issued relevant policy support. These mainly rely on policy guidance and market-oriented regulation and control. In the development of big data, the use of chips, can methodically classify different products. The reason is that it has massive storage space and runs fast. In the face of the protection requirements of large system and complex structure, the classification scheme can be put forward accurately. And can be targeted to different groups of considerations, facing the elderly, to provide music and opera and other literary and artistic relief; in the face of youth, the use of AI, 3D stereoscopic imaging technology to quickly attract their attention. At the same time, support multi-language communication, such as English, German, Spanish, and minority languages, so that both international and not lack of national connotation. But it should be seen that this only solves a few problems, classifies non-legacy and other handicrafts as a category, and does not discover the essence of its enduring and spreading in the world. Protection is not equal to self-contained, can not only solve the problem of floating on the surface. But should protect the inheritance, adhere to the concept of innovation. This is the first meaning of protection. Big data machines with understanding ability can follow the gourd painting ladle to imitate human action, mechanical production labor. But it is impossible to reproduce the aesthetic taste, creative thought and behavior art formed slowly in the course of history. This is the side that big data can not reach. Even if there are ready-made cultural results, stored in the computer, cold machines can not feel the heat. In the process of inheritance, the most urgent need to solve the problem of the successor is not refined. At present, the deep development of urbanization, natural simple villages can not stay craftsmen, they go to big cities to find development space. It is therefore women and the elderly who are in vulnerable situations who remain there. What is important to protect is to of experience and unique techniques. Sadly, today’s big data can not be empathy with human thinking, but a single isolated solution to existing problems. How big data establishes its own knowledge reserve system and thinks independently in depth is still a difficult challenge for today’s technology [2].

It should be recognized that only the externalization of ancient books, the experience of internal display, and the means of big data dissemination, three aspects of organic combination, can be perfect display of non-legacy to point out a practical direction. The road is destined to be difficult, but it is worth doing before. Most non-legacy families, the spread of skills through generations of inheritance can continue, technology closed. It is still the carrier of experience and does not undertake the deep function. Even if the experts constantly adjust, so that they have the ability to talk, ask questions, combat and so on, but also show superb learning ability in related aspects. But did not reach the height that can replace people. From another point of view, although it can solve the

problem that non-legacy products can not be manufactured in batches, there is no way to cooperate with the human brain to obtain technology and thinking synchronously. Relevant experts are still positive about this approach, they believe that the ancient imagination has become a reality. With the increasing progress of cultural technology, we can expect the emergence of intelligent products with higher stages.

#### 4 The Development Path of Big Data Intervention in Non-legacy Protection

At present, although the overall form of protection is good, but there are some problems. How to better seek advantages and avoid harm, quickly and ruthlessly solve the problem. Table 1 shows the comments from four perspectives.

In addition, the big data operation of the financial media can also protect it. In the leisure and entertainment of contemporary young people, fragmented reading accounts for a large proportion. This way of reading, with fast browsing, instant satisfaction characteristics. Will allow people to obtain a large amount of information in a short period of time, emotional satisfaction. For example, in the subway station waiting room screening and production of exquisite non-legacy protection propaganda film; with the help of micro-film display exquisite craftsmanship, expand its social influence. At present, big data plays an indispensable role in product inheritance and promotion. However, the involvement of big data in non-legacy protection is still in the trial stage. How to combine the two, not conflicting, should also be taken into account.

When digital protection was put forward in the 1970s, it was paid attention to by relevant experts. Big data is an intelligent behavior based on Internet background, referring

**Table 1.** Problems and Solutions for Non-posthumous Protection

Problems and Solutions for Non-posthumous Protection		
Problems	Instruction	Target Solutions
Collection and identification	Complex processes, large numbers, scattered distribution and fraud	Simplify the process, widely mobilize the participants in the network to identify non-legacy projects, to ensure the authenticity and reliability of non-legacy data information
Fraudulent infringement	Counterfeit infringement exists in circulation, which infringes the intellectual property rights of inheritors or institutions	Establish an open and transparent retrieval platform to ensure rapid and effective information retrieval
Consensus sharing	Lack of openness and transparency of information to provide knowledge	Building open knowledge platforms
Storage security	Large amount of data, serious data storage center	Integration of databases, multi-party data storage

to user preferences and using complex algorithms to study observation objects. Since the development, its high speed, high-quality expansion beyond people's expectations. At present, big data can be divided into five stages, namely, initial exploration, index development, gradually low, difficult to move forward, widely used in five periods. Each stage has its different growth trend, but the overall wave-style forward to the good state. With joy, we should still see that it is still in a difficult stage. At this stage, we have made positive and effective attempts, for example, to intervene big data in non-legacy protection and improve its means of communication and communication. Use the Internet and other media platforms to build non-legacy reserves. Online and offline mutual development, expand the audience, at the same time, a number of areas to try. For example, short video, song 3 D visual technology. These creative inputs have been effective, penetrated into the system of non-heritage generation, and thus affected a number of inheritors. To build a new cultural situation, which includes the study of experts day and night, reflects the inheritors throw away their inherent ideas, devote themselves to the spirit of innovation change, and spare no effort to support the platform. These aspects of investment, so that the tradition to adapt to the trend of the times, to better upgrade. At the same time, let more people realize the artistic crystallization of five thousand years of Chinese culture. Understand the past, accept the past, better meet the future. Like Baidu's product Baidu encyclopedia, timely launch of "non-legacy encyclopedia". Use a minute of video with text explanation, strive to show users all-round non-legacy. At the same time, the use of related search, intelligent screening of user satisfaction culture. Encyclopedia just a few minutes online, there are tens of thousands of hits. Visible, its potential is wide, worth digging deeply. Based on this effective attempt, Baidu chose the venue of the event at the 2018 World Cultural Heritage Day—Beijing. With the theme of "non-posthumous intelligent costume show", a unique exhibition conference was held. Highlights of the event are the use of modern AR forms, a comparison of hand-made New year paintings, traditional kite making technology. Let the audience like through a thousand years of time, experience the road technology attached to the thick history [3]. A year later, with the support of the state, the second Import Expo Congress appeared a bright figure. For the first time, a new booth "non-legacy AI" was opened in the exhibition area Bring the high-profile non-legacy to the world of science and technology, so that a group of young people also have the opportunity to see the beautiful and strange non-legacy through the booth. At the same time, the platform also supports visitors to the experience of "non-legacy AI." in place For example, visitors can touch multiple buttons on the screen with their fingers and control multiple color brushes. With the help of big data technology, a traditional oil painting with gloomy color is completed, and the shadow behind the black curtain is brought to the audience by using multi-sensory interaction technology [4]. The audience can use the intelligent screen to manipulate the shadow, make it expand and change, complete the scene of the plot. Let shadow according to their own will to complete the action, this new way of communication, but also let tourists refreshing; Dragon robes as the emperor's 95, with the symbol of the highest power, by future generations covered with a mysterious veil. And 3 D printing technology is used to copy the garment pattern, and the most suitable fabric is tested by computer. A combination of the two can restore the unique Chinese flavor of the dragon robes, so that future generations also have the opportunity to see the

royal style. At the same time, the machine can also adapt to local conditions to change. For example, according to the field temperature embroidered out different patterns, to achieve the “day for new clothes” surprise effect.

There is no doubt that big data brings more new ideas to non-legacy protection. It built a bridge, so that the ancient and modern connected. People on the bridge come and go, have become dynamic communication factors. Relevant experts suggest that the introduction of big data can not only add technical impetus to non-legacy, but also build it into a well-known brand. It can also let foreign people contact China’s excellent culture, thus expanding the influence of Chinese culture and making China shine brilliantly in the world art garden. It is worth paying attention to that big data is not to carry forward the non-posthumous product itself, but to enter its production process, step by step guidance. For example, in the non-heritage, change its inherent thinking, stimulate creative vitality [5]. In the progress of inheritance, change the way of communication, extensive and vivid communication. Let the public not only hazy impression of non-legacy, but sincere recognition of its beauty, accept the national culture. However, this is essentially different from the scripted explanation. The latter uses manual labor, using simple tools, such as broadcasting, loudspeakers, etc. With regional and communication limitations, it is difficult to effectively promote, so that tourists can not only listen to, but also speak out. The former starts from the human demand, stores the non-posthumous information into the database, carries on the protection automatically and omnipotent. Put it into use, not only will avoid complex duplication of labor, but also will simulate the human brain program. Accept instructions to work methodically. For example, exquisite embroidery, there is a “treasure in embroidery” famous Sichuan embroidery. In the process of creation, there are many processes, such as field investigation, preliminary design, manuscript determination, point craftsman, selection of patterns and installation of machines. Not only the quality of silk thread and base material is very high, but also embroidery needlework is a test of embroidery mother’s basic skills. This procedure down, not only a long time limit, but also very expensive embroidery Niang painstaking efforts. In the process, the design of the first draft of embroidery is very important. Excellent Sichuan embroidery works on the design and content of strict control, can only be embroidered Niang cumulative experience and up and down the skillful power to complete. However, the use of big data can significantly reduce its burden. Embroidered Niang can use accurate recommended patterns, combined with product requirements. Take the planned embroidery pattern with the equipment, and then combine the intelligent transformation picture technology to process the pattern into the embroidery sample that will be embroidered on the cloth and silk. Then according to the embroidery sample, embroidery mounting. To meet the needs of customer customization. From this point of view, in the big data to provide convenience for production, facing the tide of the times, aiming at the standard of the times, it is wise to flourish [6].

With the rapid development of science and technology, the impact on non-legacy protection is beyond expectation, which is also a new subject of related experts. In 2018, “Shanghai International Tea Exhibition”, the relevant personnel put into active practice. In the exhibition, the virtual machine “pot” constructed by big data challenges the tea culture that has been passed on for a long time. During the exhibition, the “pot” uses the Internet to search for tea saint Lu Yu’s Tea Classic, and analyzes the tea set, water

temperature and temperature in the book. The results are stored in the intelligent chip and sent to the control center of the “pot” by multiple sensors to determine the specific steps of brewing tea. Finally, the pot brewed a cup of fragrant tea. This attempt is divorced from human guidance and excludes the practical skills of tea artists. Only according to the computer layer by layer operation way understanding, as the method of making a cup of tea. Experts reasonably infer that in the future big data will partly replace human manual labor. However, under the global observation, big data still needs to be debugged continuously in order to make a breakthrough in non-legacy protection.

## 5 Conclusion

Extracting quantitative information, knowledge framework, prospective perspective from big data, peer-to-peer use into non-legacy protection will not only gives full play to its superiority, but also ensures that it will not lose its original style under the background of the times. Big data creates a fair and reasonable communication platform for non-legacy, in which national supervision plays an irreplaceable role. Including non-heritage, big data operators, relevant departments, relevant experts, should form a partnership of cooperation and mutual trust. To protect the determination and perseverance as the starting point, condense collective consensus, formulate reasonable plans. So far, to avoid the loss of manpower and material resources in layers of links, while enhancing national self-confidence.

Everything can not be beneficial without harm, big data intervention, information fraud, no absolute security is worrying. At present, although the overall trend to good, but also some problems. How to better seek advantages and avoid disadvantages is the direction of experts’ thinking. The trend of technological progress is unstoppable and should be expected to surprise us in the future.

## References

1. Li,X.(2018)Study on the Protection and Inheritance of the Intangible Cultural Heritage of the Chinese Nation from the Perspective of Internet. packaging engineering.11:93.
2. Wang,J.(2018)Discussion on Optimization of Intangible Cultural Heritage Archives Management Based on Block Chain Technology.Beijing Archives.10:28–29.
3. Yang,M.W.Zhang,C.F.(2019)Analysis on the Dissemination of Intangible Cultural Heritage in the Age of Internet. Contemporary Library.12:21.
4. Wang,L.(2017)Digitalization of Intangible Cultural Heritage in the Internet Age.quest.8:193.
5. Liu,J.J.Xie,J.(2017)Research on Digital Protection of Intangible Cultural Heritage Based on Big Data.Old Area Construction.
6. Chen,M.B.(2014)Thoughts on the Construction of Intangible Cultural Heritage Resource Database in Big Data Age. Science and Technology Information Development and Economy.

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