

Based on the Concept of Sustainable Development, Reuse of Waste Materials is Involved in Interior Design

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Keywords: Waste; Interior; Design; Design Method; Reuse

Abstract: With the development of economy and science and technology, the urban household garbage increases sharply, the ecological environment is destroyed, threatening the survival and development of human beings, the concept of energy saving and recycling design, sustainable development is more and more accepted. To the attention. In terms of waste disposal, how to deal with the waste will directly affect the whole environment. Load capacity. This article through the analysis of daily life in the relevant cases of excellent summary of sustainable development for waste. Methods and importance of recycled materials in interior home design.

1. Introduction

As early as August 2005, comrade xi jinping, then secretary of the CPC central committee of zhejiang province, put forward the scientific conclusion that "clear water and green mountains are golden mountains" when he visited anji, huzhou, zhejiang. On October 18, 2017, comrade xi jinping pointed out in his report to the 19th national congress of the communist party of China (CPC) that people should live in harmony with nature. We must establish and practice the concept that clear waters and green mountains are golden mountains, and adhere to the basic state policy of conserving resources and protecting the environment. Improve the quality of life, improve the quality of life has become the focus of People's Daily attention. Urban real estate prices are high, most people to idle household goods are "reluctantly give up love" attitude to abandon the use, of course caused a waste of resources, so intensive daily life household goods came into being. At the same time, those who are good at developing and utilizing commodity value also redesigns and organizes some idle household articles into practical household articles, enhancing its artistry and practicability, economic and environmental protection, and bringing new business opportunities and development to the furniture industry.

2. Recycling Status of Waste Materials

With the continuous deterioration of the ecology, people pay more and more attention to environmental protection. Although there are garbage power generation, classification and so on, the consumption is still far behind the production volume. Therefore, the problem of waste recycling and utilization has become a top priority. With a large population and an annual household waste production of more than 400 million tons, about 20,000 square meters of land is forced to be used for garbage piling and storage. Therefore, scientific disposal of garbage, classification is the first step. From the current situation of our country, the recycling of waste is beneficial to both environmental protection and economic development. Therefore, we should vigorously support the progress of waste recycling, develop and promote relevant advanced technology and production equipment, maximize the use of waste resources, reduce waste.

As for the recycling and reuse of wastes, foreign researches started earlier, and the planning and publicity of garbage classification in society were also done well. While the industrial revolution

brought rapid development to the world, it also brought serious environmental pollution problems. The sharp increase of environmental pollution made people realize that green and sustainable development with little damage to the ecological environment is the mainstream direction of future development.

The international science and technology community attaches great importance to environmental issues. In the project "predicting the transformation of society by science and technology in 30 years' time", chaired by 18 large organizations in Europe and the United States, three out of 35 aspects are related to the environment, with special emphasis on recycling, recycling and remanufacturing of resources to save energy, protect natural resources and protect the environment.

In the 1960s, like China, Japan also encountered a large amount of garbage under the rapid development. After that, Japan established a strict system. Since 2005, the direct landfill volume of garbage in Japan is less than 3%. Japan enacted the waste disposal law in 1970, which has been revised on a large scale. In 1991, the law on promotion of the use of renewable resources, namely the recycling law, was enacted. In 2000, the basic law on promoting the recycling of resources, the law on recycling construction engineering materials, and the law on promoting the recycling of food recycling resources were enacted, all of which have been implemented since 2001. In the early 1990s, Japanese yamamoto professor puts forward the concept of "environmental materials, environmental materials in the field of international materials appeared a new research field, suggested that in the process of materials research and development, we need not only the pursuit of good performance, but also must understand the importance of the limited resources and minimize waste emissions, as well as the extraction, preparation and use of materials in the process of the whole disposal and recycling, should minimize damage to the environment.

Environmental materials refer to materials with good performance or function, low consumption of resources and energy, little pollution to ecology and environment, high recovery rate, degradable recovery, coordination with ecological environment or purification and recovery function to environment.

There are many highlights in Japan's garbage collection system, such as the government's strong requirements and technical guidance for recycling companies. However, its biggest highlight is its extremely fine waste classification system, which makes its waste incineration project far ahead in environmental protection, efficiency and other aspects of the world. Japan's garbage classification system, the first impression is strict. There are four main types of garbage :(1) general garbage (not much value) (2) combustible resource garbage (3) non-combustible resource garbage (4) large garbage that can be broken, and there are many smaller details.

Japan is a small country with dense urban residents, so it is not suitable to build a large number of garbage stations. Timely disposal of garbage is conducive to keeping the city clean and saving energy.

3. The design method using the original form of waste materials

3.1. From the perspective of design: re-design and create waste materials

Support and develop waste resource utilization, use our professional knowledge to reduce the amount of waste landfill, and selectively use harmless or less hazardous waste as raw materials in interior furnishings design, so as to make them more functional and artistic. In modern interior space environmental art design, if interior display art is considered in design and implementation, its space art and cultural taste will become rich and colorful, and the meaning and purpose of pursuing environmental art will be relatively more complete and clear.

Example: the hot sun hot summer day, a lot of people like to eat a piece of cool and refreshing ice cream to good, but there are a lot of people always naturally, after I eat ice cream to eat ice cream with the rod of discarded thought has no value, thrown into the trash can also good, if carelessly throw, a fly on residual sugar provoke a lot of ice cream sticks, debris litter itself also destroyed the beauty of the surrounding environment and health, at this moment if you can put a great deal of need not ice cream sticks to take advantage of the second creation, make its have the

practicability, enhance the artistic quality and functionality, can effectively alleviate these problems. Clean enough ice cream sticks, stick white latex on both ends after drying, lay them out and fix them according to figure (1), and then add a row of ice cream sticks at the bottom to stabilize the back cover. After drying, a solid, practical and beautiful wooden small house will be ready. A DI Y wood house made of log material is a good place to buy and place on a table.



Figure 1. A wooden house made of ice cream sticks

3.2. From the perspective of aesthetics: waste materials are separated and recombined

Through xi advocated by general secretary embodies the spirit of the Chinese culture from the "beauty", to take this step in column we will waste into the household space display design, adopt the way of restructuring to "new aesthetics" into the waste involved in household design concept of green design, in order to promote the development of the waste in household design the study.

In the 1950s, pop art became popular. Pop art is a form of artistic expression that USES a large number of techniques such as scrap, commercial poster pictures and various newspaper advertising pictures. Pop art can be called the expression of the trend of that era. It is also known as neo-dadaism because it is similar to or related to dadaism in some places. In the past, using waste for painting or making finished products was a form of innovation, not environmental protection or energy saving, and had little to do with recycling. Nowadays, the application of waste in art design is endowed with more new meanings.

In daily life, a large amount of garbage is usually transported to the garbage station first. Although some combustible garbage is used as fuel for power generation, most of the garbage recycling methods are basically landfill treatment when facilities in most areas of China are not perfect. In this way, some resources or materials are wasted.

Among them, a large number of scrapped auto parts, including waste tires, are directly put into the furnace, and some are buried in landfills, which is very harmful to the land. However, in recent years, a trend of "transformers" has become popular in large urban squares. The majestic transformers sculptures (see figure 2) often attract a large number of tourists to take photos, which is a good example of waste recycling.



Figure 2. Transformer sculpture

Transformers model role model requires a lot of metal materials, although the transformers sculpture, not directly with waste components to build, but provides a large amount of raw materials, metal waste to our sculpture cost savings at the same time, reduce waste, as long as the grinding, joining together, a new art appeared in front of us. In addition, for example, the waste of the type of cans can be slightly modified and splicing can also be developed some of the strong practicality of the artistic aesthetic value of the craft works, such as art ashtray, peel box, bottle and so on. However, its production also requires certain design thinking and skills. Because its material is made of alloy, which is very thin and light, the artistic treatment of this material can fully learn from the technique of paper-cut art, and combine it with the innovative thinking of industrial design to cut and make for its functionality and artistry. The utilization of waste cans is very suitable for mass production due to its low cost of finished products and easy promotion. A few high-grade place or high-quality goods are decorated in general meeting the woodcarving of age of old, household, or adorn article...Decorate in reasonable dimensional position through the form that mount them foil to come out, in order to reflect its class or show some kind of nostalgic lasting appeal.

3.3. From an economic perspective: integrate waste materials into daily life and let them be consumed by the public

We will put the focus of "waste recycling design" on how to use waste in interior furnishings design, better development and innovation of this research. As an important part of the indoor environment, furnishings play an important role in the indoor environment. They also play an important role in integrating furnishings design and household waste into daily life and public consumption.

For example this kind of wooden ladder (see figure 3, figure 4), use old furniture to carry on simple processing transformation, the longer the more beautiful. Can serve as the head of a bed to buy content to wear, perhaps put in the sitting room to serve as magazine to wear, towel rack, potted buy content to wear, the effect also is very ideal, contracted and do not break beautiful.



Figure 3. A decorative frame made of old wood



Figure 4. Wood potting stand

4.The design method of changing the original form of waste materials

4.1.Disassembling and reintegrating waste materials

Example: discarded cardboard boxes

Cardboard boxes are solid wastes that are easy to be redesigned and utilized to get involved in indoor furniture. In 2018, the development index of China express was 814.5, up 23.6% year on year, and the industry has accelerated into a stage of high-quality development. The express delivery business exceeded 50 billion pieces, reaching 50.71 billion pieces, an increase of 26.6% over 2017. The number of cartons generated by the express business alone is so terrible that most of them are now recycled to make low-quality paper. We can improve the value of discarded cartons by recycling and redesigning.

(1) make robot clothes that can be worn by children. Cardboard box material hardness moderate, easy to cut, easy to paint graffiti, folding. It is tailored to the shape of the transformers and is designed with safety in mind.

(2) make a beautiful pen holder, this is relatively simple, to do creative depends on the doodler's skills.

(3) make children's folding chair, using the fulcrum principle to make, by many small pieces of paper combined, very strong.

(4) make it into indoor crafts, decorations, flower POTS, storage boxes and so on.

4.2. A variety of waste materials are combined to superimpose their functions

Example: wire,pop cans, bottle, hemp rope, straw

Iron wire, can, beverage bottle, hemp rope are easier to combine with collocation and redesign the items, especially today's iron art is very popular with the people.Iron wire has rich modeling and strong plasticity, and can be made into various shapes.

(1) for example, it can be matched with red wine bottles, and the iron wire can be used to make a base frame for placing wine bottles. With red wine bottles, it becomes a decoration with strong literary atmosphere.

(2) can can be used alone, can also be used with iron, hemp rope and other items.For example, a small chair can be made with the cutting method, most of the surface of the cans have patterns, yellow cans made out of the chair to show dignity, blue-green cans made out of the chair to show vitality. No matter which kind, make its in the home, can become a lifelike handicraft.

(3) the bottle can also be paired with hemp rope to make a sailboat, and then put the craft made with cans on top.

(4) straw material is soft, and very tough, the application of straw's unique characteristics, we can use it to weave a variety of items. For example, we can use straws to weave small baskets or pen containers, flower POTS, small houses, decorations and so on.

(5) hemp rope with discarded wine bottles can make a beautiful hemp rope vase.

4.3. Deformation or remodeling of waste materials

E.g. The strong plasticity of fragile materials such as glass

Glass has strong plasticity after being treated by crushing technology. With the addition of gel, glass sculpture has high artistic value, high craft value and beautiful appearance. The technique of crushing, and then mixing with gels, different colors, and the properties of the glass itself, makes it possible to create sparkling, multicoloured, multi-faceted crystal balls. FIG. (5) large-scale mass production can be realized in mold manufacturing.

Abandoned glass after artistic cutting, with abandoned crystal beads, bracelets and other metal, glass reflective material waste, you can make a lifelike wind chimes.



Figure 5. Faceted glass crystal ball (source: artisan)



Figure 6. Glass crystal wind chimes (source: artisan.com)

5. Intervene the problem that indoor furniture place exists

Waste to be transformed into indoor furniture for the material characteristics of the waste, the

level of technology and appearance have great requirements, home is every one of us the initial "soil", we want to let us transform the furniture in the new life while with beauty, with fresh color. Contrast is an important part of beauty. Through the contrast of color, light and shade, we can create a kind of beauty, a kind of beauty that belongs to life.

Furniture modelling is nothing more than by dot line face combination and become, when carrying on modelling to its transform to renovate or recombine, we want to catch dot line face, dot line face passes a design to become a body thereby combination. Different materials have different textures, different color combinations give people different moods, design has changed our life, good design makes our life more and more beautiful. Combined with the furniture aesthetics, design and transform the interior furniture to meet the market demand, to meet the aesthetic, green, functional integration requirements.

6. The conclusion

China is a populous country, the total purchasing power is the world's first, the demand for furniture is extremely large, with a vast market. Nowadays furniture is updated, those who eliminate also is very fast, this caused huge pressure to the environment undoubtedly, the material of these discarded waste is not corrupt, just because modelling and colour "out of date" be eliminated. In the contemporary era of advocating sustainable development, waste recycling is undoubtedly a major issue. , of course, will waste into an excellent works of art need new and unique ideas, exquisite combination of skilled craft art processing of the wood material and through certain media, it has more factors is the designer of novel conception and original artistic conception, not just simple pile of various new materials and precious materials such thoughts in western pop art prevailing era has been very obvious. During this period, the comprehensive materials like waste were created by the talented artists under the guidance of skillful hands and wonderful thoughts, creating a visual feast.

To sum up, in the disposal of waste, the pros and cons of the solution and effective recovery affect the bearing capacity of the whole environment. Using waste raw materials to create artistic "cosmetics" with formal beauty and artistic life will be a relatively economic and applicable environmental protection behavior, easy to be recognized by people, improve life, improve the quality of life, it can be said that practicality and environmental protection coexist. As long as these wastes are redesigned, they can have a brand new life, not only saving resources and protecting the environment, but also entering our life again, adding a luster to our life.

Acknowledgements

The project received funding from the Student's Platform for Innovation and Entrepreneurship train program in 2019: Recycling of waste resources into interior home design research. Project Number: S201910488068

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