

# Greening Landscape Design of Residential Area

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**Abstract:** With the development of urban economy, residents have higher and higher requirements for the green environment of residential areas. At present, there are still some problems in the green landscape design of many northern residential areas. Based on these problems, this paper summarizes and puts forward some suggestions.

## 1. Introduction

With the development of urban economy and the improvement of people's living standards, residents have higher and higher environmental requirements for residential areas, especially residential greening landscape design, has not only satisfied with the simple greening, but more attention to landscaping in improving the environment and regulating the climate and other aspects of the function. Many developers are the residential greening landscape design as a highlight to publicize. This paper summarizes the problems of residential greening landscape design and puts forward some suggestions for future greening landscape design.

## 2. Problems Existing in Residential Greening Landscape Design

### 2.1. Not in Line with the "People-Oriented" Design Idea

Residential area is an important space for residents' activities. It is necessary to master the laws and methods of residents' activities, design an active space that conforms to residents' psychology, and design plants for unique spaces to meet residents' aesthetic needs and create a satisfactory living environment for residents. For example, residents like enjoying the shade under the shade of trees in summer; residents like basking in the warm sun in winter. Therefore, the greening landscape design of the residential area should conform to the personal feelings of the residents, and should not place much emphasis on the design form. The selection and configuration of plants should be combined with the surrounding landscape environment. On both sides of the road in the residential area, some big trees with high branch points are designed as street trees for guidance; in the children's activity space, designing some arbors to enclose, and the selecting of arbors should not be poisonous, thorny, or fly, so as to ensure safety; The rest space, should be reasonably designed with shade trees to meet the function of residents' rest, especially the place equipped with seats; in the public space, the planting design should be focused on group plants, considering that the seasonal changes of tree species, and creating a rich plant landscape.

### 2.2. Excessive Imitation without its Own Characteristics

Residential area is a space where people live. The peak period for the opening of new real estate is in summer and autumn each year. All major real estate companies want to set industry benchmarks and polish the creation of planting space carefully. Of course, a good real estate landscape must be recognized by everyone. Once a real estate became a benchmark in the industry, other real estate developer would follow. Regardless of region, culture and borders. It's well known that a good landscape can bring beautiful enjoyment to people. Since people do it well and it is a landing project, why can't we learn from it? The answer is sure, but you must consider your own actual situation and highlight your own advantages, not losing your own characteristics, otherwise it will be the same without bright spots. Over time, it will cause aesthetic fatigue for everyone. For example, the "New Chinese" style has prevailed in real estate in recent years. Most of the real estate

are named after "Fu", "Tang" or "Courtyard", etc. The plant landscaping technique is usually a solitary pine tree at the entrance, with a "New Chinese" style wall. The landscape can be guessed from the name of the building, lacking its own characteristics.

### **2.3. Improper Planting**

When many new properties in northern residential areas are launched, in order to achieve the artistic conception of "flourish" and "winding path leading to seclusion", the trees are often selected with large sizes and beautiful tree shapes; and the shrubs are often full and densely branched. These conditions are not enough, and the plants need to be planted very densely, so that the dense planting does not expose the soil. In particular, the flowers and shrubs are planted in pieces, and some plants even reach 100 plants per square meter. From an aesthetic point of view, the scene does present a rich plant landscape. But in the long run, if the plant spacing was dense, the air circulation inside the plant would not be smooth, the temperature would rise, and the internal rot would be the phenomenon. In addition, it will also cause the plant to receive limited light, which is not conducive to grow great.

### **2.4. Unreasonable Design**

#### **2.4.1. Design Lacks Thought**

In order to make the plants that in the park to look more abundant, many designers have designed a lot of plants around the residential buildings. But too many plants make the owner look more burdened. Deciduous trees heavily block sunlight in summer, as do evergreens in winter. Therefore, many low-rise owners always like to cut down the trees in front of their houses, in order to let much sunlight into their houses. There are also some owners on the first floor who cut down the trees in front of their homes, and use fences to enclose the green space near their homes as their own, grow vegetables or plant their favorite plants. In addition, the management is poor, and the greening of the park is disorganized and cannot be formed certain system finally. In addition, it is not suitable to plant trees around the fire climbing operation site, but there are still many developers who take risks, which are unreasonable.

#### **2.4.2. The Design Did not Try to Figure out the Psychology of the Users**

Many residential areas have designed a large area of lawn, in order to increase the greening rate and create romantic feelings, euphemistically called "Wedding Lawn". Although the "Wedding Lawn" can broaden people's horizons, it can not consider that the psychology of the people who use it fully. For example, it does not conform to the idea of "cutting the corner", causing many green spaces to be trampled; and when the northern winter comes, a large area of lawn became a dirt road, and the green space had to be instead of hard pavement to satisfy users finally.

### **2.5. The Greening Maintenance Is Not Timely, Resulting in a Low Greening Survival Rate**

The green environment of the residential area needs to be maintained by everyone, but that also needs professional people to manage it. Garden plants are living, so for living plants, their ecological habits, growth laws, and the plant preferences, etc, which should be considered. Only by understanding these and creating a suitable growth environment for plants that can plants grow well. For example, the newly planted trees should be watered in time to fix the root water. When watering, ensure that they are thoroughly watered. At the same time, pay attention to the shape of the tree hole, to ensure that the water is stored, so as to promote its survival rate. At the same time, routine maintenance is very important, such as the hot climate in summer, pay attention to pruning, spraying, watering and supplying nutrient solution, etc. Before winter comes, pay attention to take protective measures such as whitening and drying.

### **2.6. Not Following Ecological Principles**

#### **2.6.1. One-Sided Pursuit of Effect**

A reasonable plant configuration should be based on the configuration of suitable plant species

according to different spatial forms. Many park landscapes often use a large number of tree species that are not commonly used or that are too large, in order to achieve a unique and immediate effect. It is known that these large trees have already adapted to the soil and climate of the source area. Using them will increase the difficulty of construction. Moreover, in order to catch up with the construction period, many developers planted many big trees out of season, which not only increased the construction cost, but also increased the maintenance cost in the later period.

### **2.6.2. Improper Mix of Plants**

in the greening landscape design of residential areas, the tree species that in some residential areas are single and lack of changes. Therefore, it is necessary that highlight the diversity of plants, which is more conducive to the growth of plants and reduces the occurrence of pests and diseases. From an ecological point of view, the combination of fast-growing trees and slow-growing trees, deciduous trees and evergreen trees, light-loving trees and shade-tolerant trees that should also be paid attention to in the matching of plants, so as to present different landscape characteristics in different seasons.

## **3. Suggestions For Residential Greening Landscape Design**

### **3.1. "People-Oriented" Design Thinking**

The plants in the residential area should reflect the design idea of serving people. People are the main body of the environment, all designs must be considered from the perspective of people, not only to meet people's material needs but also to meet people's spiritual needs, all design ideas that are divorced from "People-Oriented", the final design results will not last long. in the public space, people need a place for openness, communication and activities. This part needs to be dominated by hard pavement. During this period, a few large trees are sporadically planted to make the space more transparent and facilitate residents' activities. in a private space, in order not to be disturbed, it is necessary to enclose the space with plants. The layers of plants should be richer and airtight. A single plant can also be densely planted or enclosed by a high fence to increase the sense of security. When choosing the greening tree species in the residential area, it is necessary to configure the plants according to the preferences of the residents, so as to make the greening of the community have affinity and make the residents have a sense of identity.

### **3.2. Plant Configuration To Meet Functionality**

The green space in the residential area is an important place for residents to rest and entertain. The greening of the residential area is related to the improvement of the living environment of urban residents. in order to create a comfortable, beautiful and hygienic green environment, it reflects that plants purify the air, reduce noise, reduce dust, and improve the microclimate fully. It is necessary to consider that its functionality when selecting and configuring plants. in the process of planting plants, we should pay attention to keep a certain distance from the building, especially in the south of the northern residential buildings. We should pay attention to avoid the doors and windows of residents, so as not to affect the lighting and ventilation of residents.

### **3.3. Pay Attention To The Ecological Principle of Plants**

The green landscape design of modern residential area is not only a single design of a tree species, nor does it emphasize the accumulation of a large number of community plants, but pursues the overall effect of plants, so as to reflect the overall appearance of plants in the park.

#### **3.3.1. Adjust Measures to Local Conditions**

According to the requirements of temperature, light, soil and so on, choose local tree species suitable for local growth, that is, "Suitable Place Suitable Tree", understand the growth habit of plants, avoid the phenomenon of "mutually incompatible" plants, and reasonably match the plant landscape. At the same time, the plant should be arranged reasonably according to the terrain, water system and structures, so as to reduce the change of the original conditions as far as possible,

highlight the regional characteristics, and reduce the cost at the same time.

### **3.3.2. Variety Diversity**

There are many varieties of plants, it is necessary to carry out a reasonable design of plant varieties before planting design. Variety does not represent "miscellaneous", should carry on configuration according to respective function. Usually, each area of the residential area has a theme of plant design, which can be divided according to the color of flowers or the season of plants. in each theme area of plants, varieties will show obvious primary and secondary. The tree species expressing the theme are used as the backbone tree species, while other tree species are used as secondary tree species for auxiliary design to meet the different landscape of the residential park in four seasons. in a word, the diversity of plant species can not only satisfy the plant ecosystem, maintain the ecological balance, but also has a certain significance for the shaping of landscape.

### **3.4. Plant Configuration Should Reflect Its Own Characteristics**

On the basis of following the principle of plant ecology, we should pay attention to the characteristics of plants. in the selection of tree species, local tree species should be selected as far as possible, because local tree species have good growth, high survival rate, extensive management and low cost. And native tree species can best reflect the local cultural characteristics. As we all know, the total area of residential greening land should not be less than 30%. But many developers, replace the grassland area with grass-planting bricks, and some use unrolling terrain to create the so-called "Moving Scenery" situation, and then plant a few trees at the high place, and almost all the grass at the low place in order to save costs. in winter, the lawn turns into exposed soil, and had to revise the design scheme, sewing, laying, etc finally. The park's green landscape became chaotic, without unity, let alone characteristics at last. Therefore, in order to embody characteristics, it is important to highlight the local culture. Each region has some representative tree species, and these tree species have certain cultural implications. These tree species are used to create green landscape in the park, which is characteristic.

### **3.5. Strengthen Greening Maintenance Management**

The conservation and management of residential greening that provide a strong guarantee for the quality of plant landscape in the residential area. Therefore, it is very important to increase the investment and maintenance cost of residential greening. First of all, periodic afforestation maintenance plan should be made to ensure reasonable expenditure of maintenance costs. Secondly, it is necessary to formulate a reasonable greening conservation plan. Corresponding plans are required for the protection measures that should be taken for daily management, different seasons and extreme weather. Thirdly, it is necessary to reasonably arrange specialized personnel to manage and determine the responsibilities of management personnel, and to investigate the responsibilities of dereliction of duty management personnel. At the same time, it also calls on the representatives of the residents of the residential areas to participate in the management of the period, so as to make the communication more efficient and direct. Moreover, when residents participate in the park really, they will more consciously take care of every plant and tree in the park, which can better reflect the spirit of ownership.

## **4. Conclusion**

To sum up, the greening and landscape design of the residential area is related to the quality of the living environment. It is necessary to follow the "People-Oriented" design idea, meet the functional requirements of the residential area according to local conditions, and create a beautiful living life in accordance with the laws of aesthetics surroundings.

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