Research and implementation of search engine based on Java Technology

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Abstract. With the deepening of China's modern construction, innovative computer technology and the modern Internet technology has gradually become an important tool in social production activities has been indispensable in people's daily life. Computers and the Internet have been extensively used in all walks of life in society, and become an essential technical support to promote China's socialist modernization. In the application of the Internet, the application of search engine is closely related to people's Internet life, it can help users to locate the information they need in a large number of Internet information. At present, the search engine technology has been relatively mature, in the mechanical structure and application of the promotion has a relatively good performance. However, with the increasing number of Internet users and the increasing demand of users, the traditional search engine has been unable to meet the needs of the times. At present, the intelligent search mode based on Java technology is an essential development direction of the Internet search engine. Next, this article will start from the current Java technology based on the search engine research and implementation of the relevant content to start a specific description of the article.

Introduction

The basic principles of animation are visual principles as well as film and television. In recent years, the new vitality of the animation industry has been brought by the development of computer science, making animation more exciting, and better visual effects. But no matter how the animation design technology changes, the idea that human animation always want to express the true feelings has not changed. If an animation is lack of thought and emotion, it will not give people a very good appreciation of the feelings even the best technology, the impressive animation has its unique style and emotional thoughts. This research lays the technical foundation for the deduction of the unique style and emotional artistic conception, mainly based on the principle of emotional computing, starting from the emotional modeling of animation, and capture the basic expression of 3D animation.

An overview of Java technology based search engine

1. Overview of Java Technology

Java is an object-oriented programming language, which is based on C++ language based on the new innovations, all has the advantage of C++ language on the one hand, is not difficult to understand C++ language in multiple inheritance, on the other hand, the concept of pointers. In practical applications, Java technology has higher compatibility, versatility and security than other programming languages. Java technology has these characteristics. Firstly, Java technology is mandatory relatively high in programming, in the practical application of the Java technology, programming objects are often one-way between inheritance class objects can support, facing a number of system interfaces is a mode of inheritance. Secondly, Java technology has good flexibility,
is that researchers can use Java technology to make adjustments according to the actual situation, from the Java programming language has higher application compatibility, a big advantage is that under Java technology upgrade is more simple. In addition, Java technology has characteristics of multi thread. This feature can effectively improve the efficiency of system processing tasks, improve the stability of the application execution. Finally, Java technology has a high security, in the Java programming system is often set up a security mechanism, can effectively resist malicious attacks.[1]

2. factors affecting the implementation of search engine tools

For enterprises engaged in the development of search engine tools, in order to stand out in the fierce market competition, it is necessary for enterprises to research and development personnel based on the actual situation of the market for product development. At the same time, enterprises are required to establish a perfect search engine marketing model for product promotion activities. The above two steps are based on the market macro environment and micro factors to do a good job in search engine marketing decisions. First, enterprises need to consider the macro factors of the overall environment, including the social population, economic development, shared value orientation, etc.. Secondly, enterprises need to take into account the micro factors, including the competitive environment in the market, the development of the enterprise itself, the technical level of R & D personnel, etc..[2]

Search engine optimization of search results

1. Internal link optimization

In the actual situation, the website design structure is often more complex, reflected in the website operating system is often designed with a variety of different functions. Therefore, to search engine website can play a better operational effect, it requires developers to coordinate the various parts of the structure within the site, to ensure smooth and effective transmission of information and commands between the various functional structure. Optimization of internal links is an important means to achieve this goal, developers through the design to carry out measures and dialogue may meet expectations according to users in the application site of the problems in the process in the development of website, the dialogue to integrate these problems, to join the search in the database, so as to reduce the artificial answer the problem of pressure.[3]

2. Page Title Optimization

In the optimization of the use of search engine, the optimization of web page title is a most important work. In fact, "the title of the key words is the basis for the users to search engine search content, on the other hand is for the user to preview the contents of web pages is the site of judgment, can attract users to click to view the key. Therefore, the search results for search engine optimization, developers need to pay attention to the following points. First of all, to ensure that the site title to maintain a high degree of correlation with the content of the website, to ensure that the site title can fully display web content, so as to help the user to quickly find the content in the search process. Secondly, in the same website in the title of different pages to ensure that the situation in the overall unity of the difference, so as to ensure that users can accurately locate the keywords.[4]

Java technology search engine implementation

3. Software development environments

(1) Socket class

In fact, every computer connected to the Internet in the program is often equipped with an auxiliary operation set over there is a large number of computer systems. These sockets are also referred to as ports in applications. In the link between the computer and the Internet, the server program will specify all the relevant ports in the computer system, and all of the links generated by this. On the other hand, in the computer client, are required to link to the same server port in the process. It should be pointed out that, in practice, in the link between the Internet and the computer
system, at the same time only one server port to the same port. At present, there are two main types of socket class in the development of Java technology. One is the ServerSocket, mainly to provide monitoring method, the other is Socket, is in the client application, in the actual situation, the customer Socket connect method is used to connect to the Internet server, and accept server's return value is a Socket, actually provide a link is two Socket. The two socket class has a very important application in the development of search engine, on the one hand, developers can use the Socket to do the socket in the client's statement, on the other hand, the server using ServerSocket to declare the site keywords, so as to achieve the client to server between point-to-point links.[5]

(2) uses the URL class

Java technology in the network link, the use of URL class links is also an important means. In the use of search engines, through the analysis of the site URL address, and the address using a specific algorithm for decomposition. When the R & D personnel in programming to create the URL object, but also to help users in the application process of the search engine in the path of the URL and the host and other important parameters for a certain degree of detailed analysis. Finally, the URL link is also an important site for users to open the site. The user can be displayed through the URL information in the search engine to search the target site directly.

2. Chinese processing of about Java Technology

In fact, developers in the development process of the Java system, it is easy to appear Chinese characters garbled phenomenon, and this situation will be Chinese characters garbled web crawling, to be found by search engines, it will not only affect the web content display, but also on the user's search experience a great impact. Therefore, developers need to make a good job in the Chinese processing of Java technology. First, developers need to in the program before you set the correct encoding Chinese processing work, in the international practice, Chinese Chinese characters belong to the double byte, with high and low two performance characteristics, according to the international, China's Chinese characters encoding for GB2312, coding range OXhoal to OXf7fe.[6]

3. Java multithreading mechanisms

As mentioned above, Java technology has the characteristics of multi thread, which can effectively increase the efficiency of the system processing tasks and improve the stability of the application. In addition, Java technology multithreading mechanism can also help users to achieve a simple web page crawl and keyword search, through the search engine efficiency. Thread is an important part of the computer system running in the background program. In the process of running the thread, other programs in the computer system need to continue. Therefore, the establishment of Java multithreading mechanism needs to be implemented by programming the background code, there are two principal ways. The first approach is to inherit the Thread object to complete the packaging thread. Another way is based on Java to determine a good Runnhale interface, and in the interface to establish a good run method.

4. JDBC applications

The application of network spider makes the search engine retrieval efficiency and retrieval accuracy has been greatly improved, therefore, developers need to be driven by scientific design method to realize the driving site queue, so as to improve the quantity and speed of the network spider visit the website in the retrieval process. Submit to implement SQL using JDBS is an important means to improve the efficiency of network spider, in JDBS technology, developers operate on the retrieval of a database through the command, using imported jug.Sol.* in advance into the programming language and object realization link, then determine the statement object, to achieve operation of the database through SQL.

5. evaluation indexes of search engine application

First of all, in the evaluation index search engine applications, the need for a complete survey of satisfaction degree for users to click on the situation, this is an important basis for the developers to design and development based on the market demand of the second search related content is also an important part of search engine evaluation value. The content of this standard includes search engine, search function, search, relevance and the results of the list of five indicators, there are a lot of different indicators of specific indicators.[7]
Summary

At present, the construction of our country in the Internet industry, the Internet technology has already made some achievements, the Internet has increasingly become an indispensable part of social production and people's daily life. The development and application of search engine technology are an important part of the Internet system, the research and development of this technology have a very important significance for the user's Internet use. Therefore, we are required to pay attention to the development and promotion of search engine technology in the new market demand. At present, provides important technical support for the development of Java search engine in China, Java technology based search engine will become an important part of the future of the Internet system, we need to do a good job on the basis of practical technology innovation.

References


