DS TUTORIAL 3

CODE:

```cpp
#include<iostream>
#include<string.h>
using namespace std;
int main(){
    static int s;
    static int r;
    //INPUT
    std::cout<<"Enter the number of servers :";
    std::cin>>s;
    int servers[s];
    cout<<"Enter the number of requests :";
    cin>>r;
    int requests[r];
    for(int i=0;i<r;i++){
        std::cout<<"Enter the request number "<<i+1<<" :";
        std::cin>>requests[i];
    }
    // Request processing
    for(int i=0;i<r;i++){
        string choice;
        std::cout<<"\nDo you want to process the request for ID
"<<requests[i]<<" (y/n) :";
        std::cin>>choice;
        if(choice=="y"){
            int serv_index=requests[i] %s;
            cout<<"The request "<<requests[i]<<" is being
processed at server number "<<serv_index;
            servers[serv_index]=requests[i];
        }else{
            cout<<"Exiting the system";
            break;
        }
    }
    return 0;
}
```

OUTPUT:

```
Enter the number of servers :10
Enter the number of requests :5
Enter the request number 1 :101
Enter the request number 2 :132
Enter the request number 3 :153
Enter the request number 4 :229
Enter the request number 5 :372

Do you want to process the request for ID 101 (y/n) :y
The request 101 is being processed at server number 1
Do you want to process the request for ID 132 (y/n) :y
The request 132 is being processed at server number 2
Do you want to process the request for ID 153 (y/n) :y
The request 153 is being processed at server number 3
Do you want to process the request for ID 229 (y/n) :y
The request 229 is being processed at server number 9
Do you want to process the request for ID 372 (y/n) :n
Exiting the system

=== Code Execution Successful ===
```