

##Aim :

###Write a C/C++ program to set up a real-time clock interval timer using the alarm API.

##Theory :

First, every signal has a name. These names all begin with the three characters SIG .For example,SIGABRT is the abort signal that is generated when a process calls the abort function.

SIGALRM is the alarm signal that is generated when the timer set by the alarm function goes off.

Use the alarm API for generating a signal after certain time interval as specified by the user.

##Code :

```
#include<stdio.h>
#include<stdlib.h>
#include<unistd.h>
#include<signal.h>
#define INTERVAL 5
void callme(int sig_no)
{
    alarm(INTERVAL);
    printf("Hello!!\n");
}
int main()
{
    struct sigaction action;
    action.sa_handler=(void(*)(int))callme;
    sigaction(SIGALRM,&action,0);
    alarm(2);
    sleep(5);
    return 0;
}
```

##Output :

Open a terminal.

Change directory to the file location in both the terminals.

Open a file using command followed by program_name <pre>vi 10_alarm_signal_handler.cpp </pre> and then enter the source code and save it.

Then compile the program using <pre>g++ 10_alarm_signal_handler.cpp</pre>

If there are no errors after compilation execute the program using <pre>./a.out</pre>

##Screenshot:-

![Not Available](Output.png)