

```
1  #ifndef __THREADSCORE_H
2
3  #include <stdint.h>
4  #include <stdio.h>
5  #include <LPC17xx.h>
6  #include <stdbool.h>
7
8  //function prototypes
9  uint32_t* getMSPInitialLocation (void); //obtains the initial location of MSP by looking it up in the
    vector table
10
11  uint32_t* getNewThreadStack (uint32_t offset); //returns address of new a PSP with offset of "offset"
    bytes from MSP.
12
13  //void setThreadingWithPSP (uint32_t* threadStack); //sets the value of PSP to threadStack and ensures
    that the microcontroller is using that value by changing the CONTROL register
14
15  void idleThread(void); //thread function for the idle thread
16
17  int osThreadNew(void (*fun_ptr)(void), int timeSlice, int sleepTime); //initializes the thread stack
    and its initial context in memory
18
19  #endif
```