#include <xc.h>

#include "digital\_keypad.h"

void init\_digital\_keypad(void)

{

/\* Set Keypad Port as input \*/

KEYPAD\_PORT\_DDR = KEYPAD\_PORT\_DDR | INPUT\_LINES; //TRISB = TRISB | 0x3F

}

unsigned char read\_digital\_keypad(unsigned char mode)

{

static unsigned char once = 1;

static unsigned char pre\_key;

static unsigned char longpress;

if (mode == LEVEL\_DETECTION)

{

return KEYPAD\_PORT & INPUT\_LINES; //PORTB & 0x3F

}

else

{

if (((KEYPAD\_PORT & INPUT\_LINES) != ALL\_RELEASED) && once)

{

once = 0;

longpress = 0;

pre\_key = KEYPAD\_PORT & INPUT\_LINES;

}

else if (!once && (pre\_key == (KEYPAD\_PORT & INPUT\_LINES)) && longpress < 50)

{

longpress++;

}

else if (longpress == 50)

{

longpress++;

return 0x80 | pre\_key;

}

else if ((KEYPAD\_PORT & INPUT\_LINES)== ALL\_RELEASED && ! once)

{

once=1;

if( longpress < 50)

{

return pre\_key;

}

}

}

return ALL\_RELEASED;

}