

## Use Serial Port Baud Rate 230400/460800bps on M6117D Series

2004-08-16

The multi-I/O chipset on M6117D series is ALi M5113. It supports fast UART baud rate up to 460800 bps. Here is DOS C example code to enable this feature:

```
/* ALi M5113 super I/O controller example code for DM&P/ICOP M6117D boards */
#include <conio.h>
void M5113_Write(unsigned char cIdx, unsigned char cData)
  outportb(0x3f1, 0x51);
  outportb(0x3f1, 0x29);
 inportb(0x3f1);
 outportb(0x3f1, cIdx);
 outportb(0x3f1, cData);
}
unsigned char M5113_Read(unsigned char cIdx)
 outportb(0x3f1, 0x51);
  outportb(0x3f1, 0x29);
 inportb(0x3f1);
 outportb(0x3f1, cIdx);
 return inportb(0x3f1);
void main()
  unsigned char cTemp;
   Refer to ALi M5113 data sheet at
   http://www.dmp.com.tw/tech/dmp-hw/misc/m5113.pdf
   CR8 and CR9 on page 16, 17.
  * /
  /* Enable UART1 hi-speed baud rate */
  cTemp = M5113_Read(0x88);
```



```
cTemp |= 0x20; /* set CR8 bit5 to 1 */
M5113_Write(0x88, cTemp);

/* Enable UART2 hi-speed baud rate */
cTemp = M5113_Read(0x99);
cTemp |= 0x20; /* set CR9 bit5 to 1 */
M5113_Write(0x99, cTemp);

/*
    Refer to table 5-5, in user's initial procedure to program UART:
        Use 32770 as clock divisor to set 230400 baud rate.
        Use 32769 as clock divisor to set 460800 baud rate.

*/
}
```

Download M5113 data sheet from <a href="http://www.dmp.com.tw/tech/dmp-hw/misc/m5113.pdf">http://www.dmp.com.tw/tech/dmp-hw/misc/m5113.pdf</a> to get more detail.

## **Technical Support**

For more technical support, please visit <a href="http://www.dmp.com.tw/tech">http://www.dmp.com.tw/tech</a> or mail to <a href="tech@dmp.com.tw/tech">tech@dmp.com.tw/tech</a> or mail to <a href="tech@dmp.com.tw/tech">tech@dmp.com.tw/tech</a>.