MC3000 PDA OPERATING DESCRIPTION

1. CPU MODULE BLOCK

This Module consists of a CPU, two SDRAMs, a FLASH Memory, and a Power supply chip. Two crystals produce clocks for the CPU and two regulators provide power for it a CPU bus connects Two SDRAMs and a FLASH. This module can operate at rates up to 400- Mhz clock frequency.

2. LCD CONTROLLER BLOCK

This block consists of Media chip, Power supply and panel interface connector. Step-up regulator provides power for LCD panel back-light.
The Media chip and the CPU are connected by bus and a core power for this block is 1.5V.

3. CODEC BLOCK

The codec chip is connected with a amp, a touch panel and a keypad. This The CPU can communicate with this block by the AC'97 interface. This chip has ten general purpose i/o pins. These GPIO pins are used to implement key matrix mechanism.

4. CDMA MODULE BLOCK

This block is composed of a dual UART chip and a CDMA interface connector. The Dual UART is connected with a CPU by bus. This module is included in RF circuits.

5. CF MODULE BLOCK

This block is made up of two Buffer chip and a module interface connector. By the interface connector a WLAN chip is connected with the CPU. The WLAN module is included RF circuits.

6. SCANNER MODULE BLOCK

This block consists of a buffer chip and scanner interface connector. The CPU can control an operation of the scanner block by ffuart port of it

7. SD CARD SLOT BLOCK

This SD slot block supports SD card interface.

8. IRDA BLOCK

This block consists of an IRDA chip and additional circuits. The SIR is used with STUART port to manage the IRDA module.

9. BACK BATTERY CHARGER BLOCK

This block consists of a charger and a battery connector.
A battery is charged by a charger within 3 hours.

10. AUDIO AMP BLOCK

This block consists of a mono audio power amplifier and additional circuits. This amp can amplify original sound signals from CODECs about 15 times.

11. LCD BACK LIGHT BLOCK

This block is composed of a LED driver and additional circuits. The LED driver can be easily adjusted using pulse width modulated signal.

12. POWER SUPPLY BLOCK

This block consists of two steps down regulators and a step up regulator. These regulators supply power for each chip.

13. KEYPAD BLOCK

This block consists of 24 keys with led and a SIM card slot.