



**Top side:**

- |   |                              |
|---|------------------------------|
| 1. 5V DC In Jack (J24)                  | 17. Digital Audio Header     |
| 2. ON/OFF Button                        | 18. USB0 Host                |
| 3. Boot select switch (SW6)             | 19. Parallel Camera Header   |
| 4. Mini PCI Express Connector           | 20. USB1 Host                |
| 5. LVDS0 Header (Secondary Display)     | 21. 10/100/1000Mbps Ethernet |
| 6. RS232 Header                         | 22. USER Button1             |
| 7. LVDS1 Header (Primary Display) (J18) | 23. USER Button2             |
| 8. Miscellaneous Header                 | 24. USER Button3             |
| 9. MIPI CSI-2 Camera [optional add-on]  | 25. Reset Button             |
| 10. I2C/SPI Header                      | 26. PWR On Switch (SW5)      |
| 11. Capacitive Touch (J7)               |                              |
| 12. CAN Bus Header                      |                              |
| 13. Headphones Out                      |                              |
| 14. Line In                             |                              |
| 15. DSI Header                          |                              |
| 16. HDMI                                |                              |

**Bottom side:**

- |                               |
|-------------------------------|
| 27. USB Debug (J102)          |
| 28. micro SD Card slot (J101) |
| 29. RTC Battery Holder        |
| 30. USB0 OTG                  |

**Evaluation Kit initial Setup**

- Carefully remove the 7" LCD and VAR-DT6CustomBoard board from the package.
- Connect the 7" LCD Touch and Display cables to the Evaluation Kit connectors J7, J18 respectively as shown in the upper left picture.  
*Note: Display cable connector pins 1, 2 (colored in red) should be connected to J18 pins 1, 2 respectively.  
Touch cable – connect cable with metal contacts facing down.*
- Plug the USB type A to micro B cable between the USB debug connector (J102) and a PC USB port.
- Plug the wall adapter's pin into the VAR-DT6CustomBoard 5V power jack (J24) and to a 120VAC~240VAC power source.

## Setting the Host PC for Debug

1. Download any PC terminal program. Variscite suggests using [Putty](#)
2. Set PC terminal software parameters as follows:
  - Baud Rate: 115200
  - Data bits: 8
  - Stop bits: 1
  - Parity: None
  - Flow Control: None

## Using Default file System

1. Set Boot select switch (SW6) left to boot from DART-MX6 eMMC.
2. Switch ON (upwards) the PWR On switch (SW5).
3. Boot messages are printed within PC's terminal window.

## Bootting from micro SD Card

*The microSD card is supplied within the package. The image can be also downloaded from Variscite FTP site. Please refer to "Burning Recovery File System" section.*

1. Verify Switch SW5 is OFF (downwards).
2. Set Boot select switch (SW6) right to boot from microSD Card.
3. Push microSD card into the microSD card slot (J101) of the VAR-DT6CustomBoard.
4. Switch ON (upwards) the PWR On switch (SW5).
5. Boot messages are printed within PC's terminal window.

## Burning Recovery File System

Please refer to Variscite's wiki pages for preparing recovery SD card and burning internal storage (eMMC) at:  
[https://variwiki.com/index.php?title=Yocto\\_Recovery\\_SD\\_card\\_latest](https://variwiki.com/index.php?title=Yocto_Recovery_SD_card_latest)

## Additional Support Links

- Wiki pages:  
[https://variwiki.com/index.php?title=Main\\_Page](https://variwiki.com/index.php?title=Main_Page)
- Variscite Customers Portal:  
<https://varisciteportal.axosoft.com/login>
- DART-MX6 Evaluation Kits:  
<https://www.variscite.com/product/evaluation-kits/dart-mx6-kits>
- DART-MX6 System on Module:  
<https://www.variscite.com/product/system-on-module-som/cortex-a9/dart-mx6-cpu-freescale-imx6>
- VAR-DT6CustomBoard:  
<https://www.variscite.com/product/single-board-computers/var-dt6customboard>

**Thank you for purchasing Variscite's product.**

**For additional assistance please contact: [sales@variscite.com](mailto:sales@variscite.com)**