# Gene-6350

**Intel LV Celeron SubCompact Board**

# Thermal Image Analysis Report

**Report NO: 06E080044**

**Release Date: Dec 14, 2006**

| *2006/12/14* | *Wenyuan Yang* | *Eva Yeh* |
|---|---|---|
| **Issue Stamp** | **Manager** | **Test Engineer** |



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# Thermal Image Analysis

**Ⅰ. Model Name: Gene-6350 Rev. A1.11**

**Ⅱ. Description: Intel LV Celeron SubCompact Board**

**Ⅲ. Date: Dec 14, 2006**

**Ⅳ. Measure Site: AAEON QE Dept.**

**Ⅴ. Issued by : Eva Yeh**

**Ⅵ.Equipment:**

**TVS-100 series by NIPPON AVIONICS CO., LTD.**

**Ⅶ. Simulation Environment:**

- **Temperature: Component Side-1 : 22.7℃ , Component Side-2 : 22.1℃,**
- **System Configuration :**
  **PCB Version : Gene-6350 Rev.A 1.11**
- **CPU : Intel Ultra Low Voltage Celeron (R) 650MHz CPU**
- **RAM : Transcend 512MB V58C2256804SAS6 P065397IJAPD**
- **BIOS : Gene-6350 BIOS Rev:1.5 (11/03/2006)**
- **CF Card : N/A**
- **HDD : Maxtor DiamondMax Plus 9 80GB / ATA133**
- **Application Software: Run Prime95 under Windows XP Professional V2002 Service Pack 2**
- **Take Picture Time: After Power on 2 hours.**


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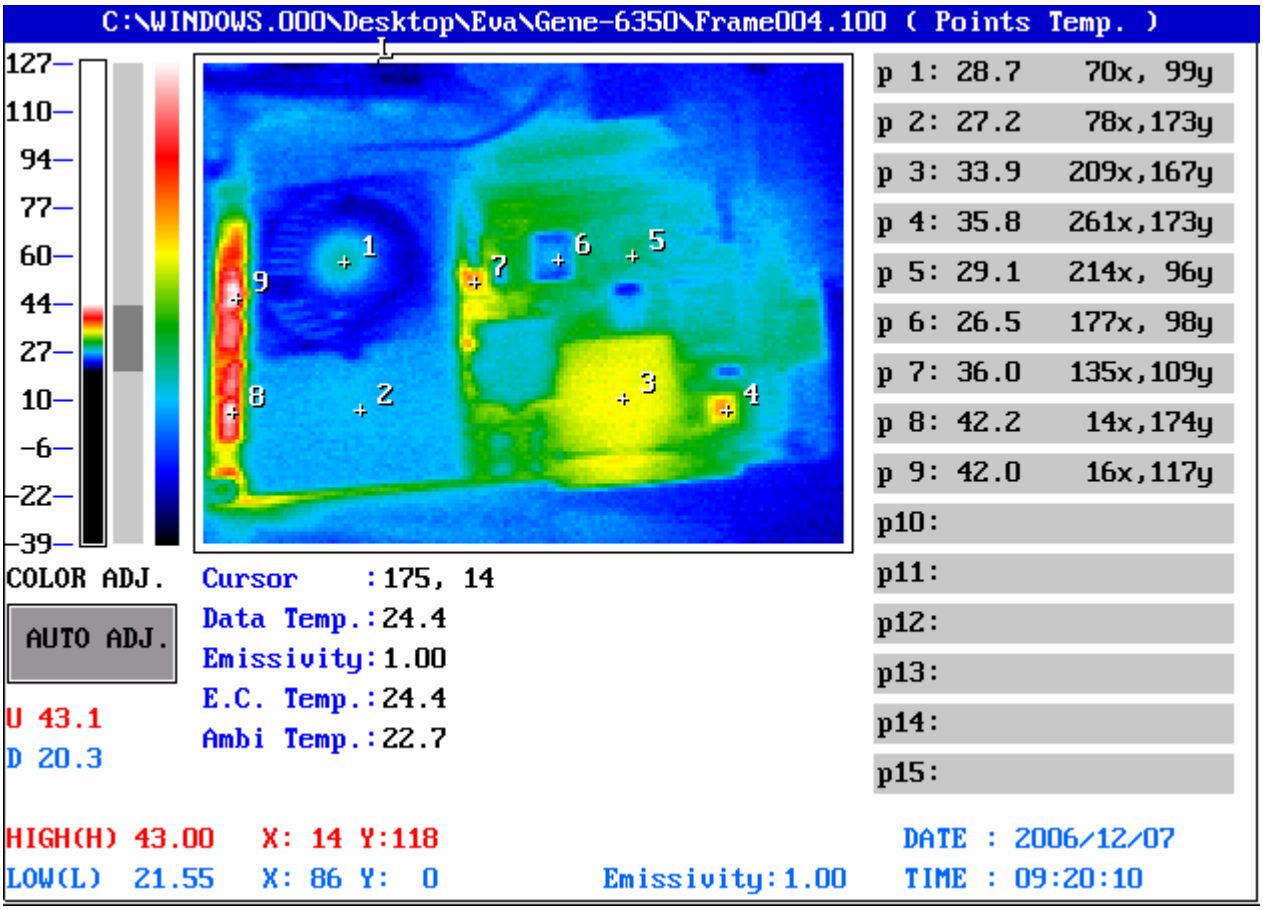
# Temperature Profile Test:

## Component Side-1:




| Point | Position | Describe | Tc (℃) | Tm (22.7 ℃) | Tm (60℃) | Note |
|---|---|---|---|---|---|---|
| 1 | U13 | (TF)IC.SMD.BGA.548P.Rev.CE.Noreh .Bridge Chipset. VIA.VT8623G(CLE266);EE-A050758;14S4862301;TWN | 85 | 28.7 | 66.0 | |
| 2 | U3 | (TF)INTEL CPU.Celeron.650MHz.Ultra Low Power.MicroFC-BGA.INTEL.NK80530VY650256SL7UJ;EE-A051594;14S4065001;TWN | 75 | 27.2 | 64.5 | |
| 3 | U2 | (TF)IC.SMD.BGA.487.South Bridge Chipset. VIA.VT8235MG-CD 版;EE-A051648;14S4823501;TWN | 85 | 33.9 | 71.2 | |
| 4 | U1 | (TF)IC.SMD LQFP 48Pin.6 Channel AC'97 Audio Codec. REALTEK.ALC650;EE-A030738;14S3065001;TWN | 85 | 35.8 | 73.1 | |
| 5 | U11 | (TF)IC.SMD.Status Monitoring 48Pin LQFP. WINBOND.W83781G;EE-A050824;14S4378101;TWN | 100 | 29.1 | 66.4 | |
| 6 | U10 | (TF)IC.SMD.LQFP 100P.PCI Ethernet CHIP.RELTEK.RTL8100BL-LF; EE-A050559;14S4810002;TWN | 100 | 26.5 | 63.8 | |
| 7 | U9 | (TF)IC.FTG for VIA Pro-266 DDR.CYPRESS.CYW311OXC; EE-A060028;14S3031101;TWN | 100 | 36.0 | 73.3 | |
| 8 | U5 | (TF)PWR.SMD.SO-8.N-Channel 30V 13.8A MOSFET.APEC. AP4424GM;EE-A051480;1315442410;TWN | 125 | 42.2 | 79.5 | |
| 9 | U8 | (TF)IC.SMD.SO-8P.Dual Operational Amplifiers. NS.LMV358M-NOPB;EE-A030570;14S1035800;TWN | 125 | 42.0 | 79.3 | |
| | | | | | | |
| | | | | | | |
| | | | | | | |

1. Tm (Measured operation temperature) must be less than Tc (Specified case temperature) +5 degree C
2. Any Tm value showed in red words which meaning the value is over the Tc+ 5 degree C of this device specification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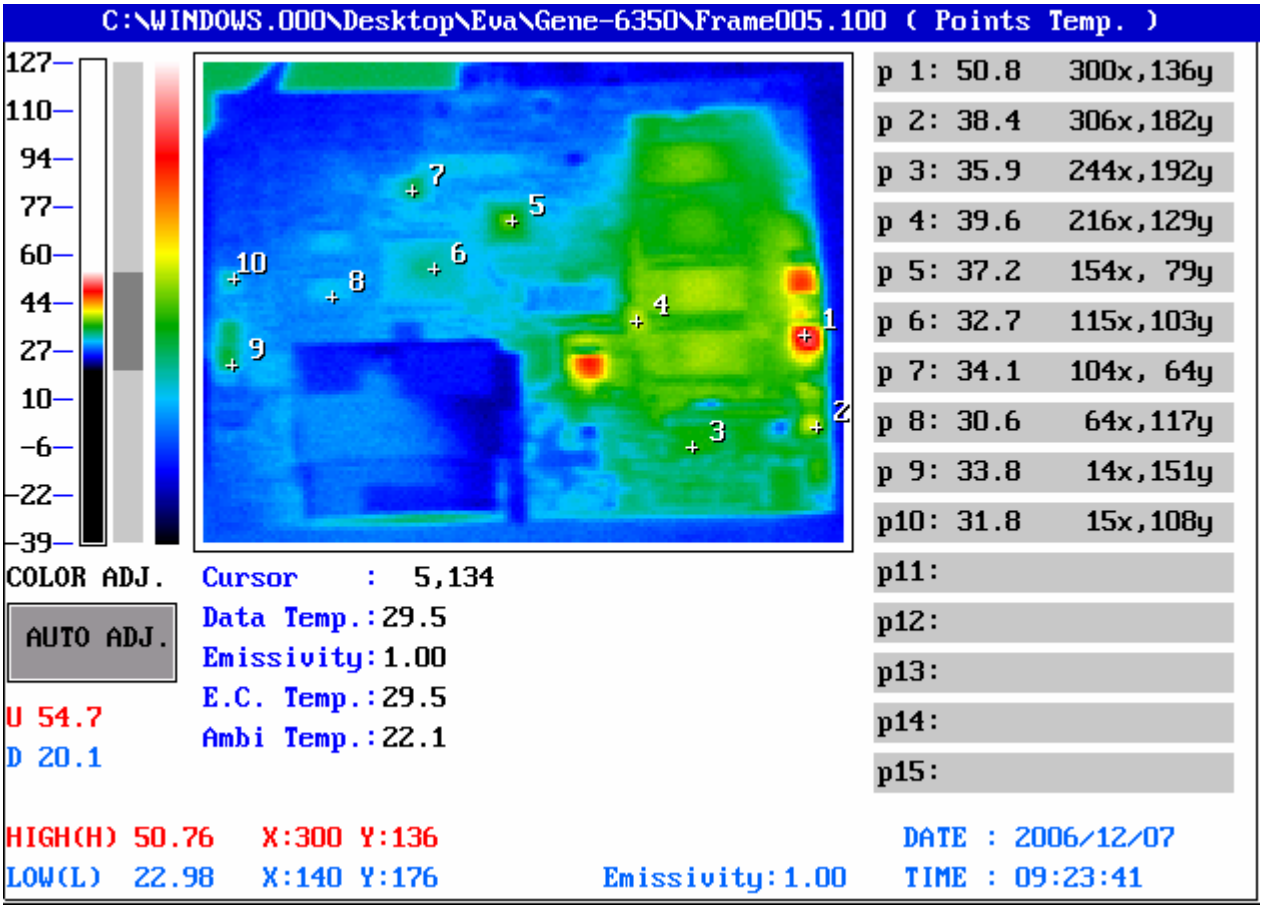
**Component Side-2:**




| Point | Position | Describe | Tc (℃) | Tm (22.1 ℃) | Tm (60℃) | Note |
|---|---|---|---|---|---|---|
| 1 | Q13 | (TF)PWR.SMD.TO-252.N-Channel Power MOSFET. APEC.AP9916GH;EE-A040445;1315991610;TWN | 125 | 50.8 | 88.7 | |
| 2 | U19 | (TF)IC.SMD SOP.8Pin Switching PWM Controller.Intersil. ISL6520ACBZ;EE-A020421;14S2652000;TWN | 100 | 38.4 | 76.3 | |
| 3 | C243 | (TF)SP CAP.[8.2μF～470μF].[2V～8V].20%.SMD.Panasonic. EEF/ECG 系列(耐溫 260℃);EE-A060158;118*****8*;TWN | 105 | 35.9 | 73.8 | |
| 4 | U23 | (TF)IC.SMD.SSOP 28P.12 Output Buffer.CYPRESS. CYW256OXC;EE-A060022;14S4025601;TWN | 100 | 39.6 | 77.5 | |
| 5 | U34 | (TF)IC.SMD.TQFP 64P.DVI Transmitter. VIA.VT1632G;EE-A040477;14S4163200;TWN | 85 | 37.2 | 75.1 | |
| 6 | U27 | (TF)IC.SMD.TQFP 128P.Super I/O. Winbond.W83697UG;EE-A050783;14S4369701;TWN | 100 | 32.7 | 70.6 | |
| 7 | D4 | (TF)D Schottky.20V.1A.SMAJ.MCC.SS12; EE-A990224;1300581740; | 100 | 34.1 | 72.0 | |
| 8 | U26 | (TF)IC.SMD SSOP 28P.RS232 Driver ESD 15KV.INTERSIL. HIN213ECAZ;EE-A000060;14S4021310;TWN | 125 | 30.6 | 68.5 | |
| 9 | U21 | (TF)PWR.SMD.SO-8 N-Channel 30V 10A MOSFET. CET.CEM4410A(Z);EE-A020990;1315441011;TWN | 125 | 33.8 | 71.7 | |
| 10 | U28 | (TF)IC.SMD SOP.8Pin Switching PWM Controller. IR.IRU3037CSPbF;EE-A020732;14S2303700;TWN | 100 | 31.8 | 69.7 | |
| | | | | | | |
| | | | | | | |

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