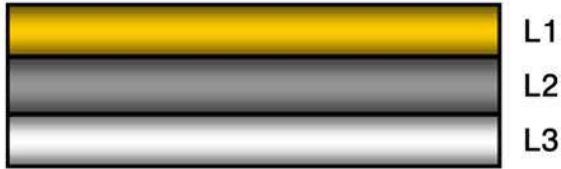


MBCCL (Metal Base CCL)



L1 : Copper Foil Layer
 L2 : Insulating / Adhesive Layer
 L3 : Metal Base Layer

L3 : Metal Base Layer



Specification (SMC - 1)

| Item | Unit | Spec | Remark |
|--------------------------------------|---------------------|---------------|-----------------------|
| Thickness | mm | 0.6 | |
| - L1 | μm | 36, 72 | |
| - L2 | μm | 50 | |
| - L3 | mm | 0.5 | |
| Heat Transfer Coefficient, h | W/°C m ² | 20 | ** |
| Peel Strength | Kgf/cm | | |
| - Interlayer L1-L3 | | 1.5 | JIS C 6471 |
| Breakdown voltage | KV(AC) | > 8 | 10 sec |
| Solder float heat resistance | | > 260 °C 1min | |
| Chemical Resistance | | | |
| L2 | % | 95 | IPC-TM-650-2.3.2 |
| L3 | | | |
| - 10% H ₂ SO ₄ | min | > 15 | |
| - 10% NaOH | min | > 15 | |
| - MEK | min | > 15 | |
| Dielectric Constant of L2 | | 3.7 | 1 MHz |
| Thermal Conductivity of L2 | W / m.K | 2 | |
| Elongation of L2 | % | 0.028 | 110 °C 1Kg / 250mm |

**) $T_{mb} = T_a + P_d / h A$

h : Value measured on the metal base size 12 * 9 * and 50W LED

total power dissipation of the metal base size.

T_{mb} = Metal base temperature (°C)

T_a = Ambient temperature (°C)

P_d = Total LED power dissipation of the metal base [W]

h = Heat transfer coefficient [w/°Cm²]

A = Area of the metal base

* The above specification can be changed without any advanced notice.