

### Technical Capabilities Rigid PCB (All values are in mm)

Specification	Value
Max. no. of Layers	24
Max. Board Thickness	3.20
Min. Finished Board Thickness	0.20 (No HAL / Masking)

### Max. Board Size (LXW)

Material	Value
FR4	430 x 585 (For SS & DS) 420 x 570 (For Multi layers)
Roger	435 X 275
Itera	430 X 585
Polymide	415 X 565
MCPCB	430 X 585

### Base Materials

Specification	Value
Base Material	FR4
Inner Layer Copper Cladding	

*Max. Cu Wt. For Planes (oz.)	2
*Max Cu Wt. For Signals (oz.)	2
*Min.Cu Wt. (Oz.)	0.5
C)	Outer Copper Cladding
*Max Cu Wt. (Oz.)	3
*Min Cu Wt. (Oz.)	0.5

### Circuit Layers (All Values are in mm)

Specification	Value
For Start Copper thickness of 0.5 Oz.	
For outer Layer	Minimum Track Width 0.09
For outer Layer	Min Spacing 0.09
For Inner Layer	Min Track Width 0.125
For Inner Layer	Min. Spacing 0.125
For Start Copper thickness of 1.0 Oz.	
Minimum Track Width	0.15
Min Spacing	0.15
For Start Copper thickness of 2.0 Oz.	
Minimum Track Width	0.175
Min Spacing	0.20

### Drilling (All Values are in mm)

Specification	Value
Min. Finished via Hole Size	0.10
Min. Finished via Pad Size	
Outer Layers	0.40
Inner Layers	0.45
Min. Annular Ring	0.10
Drill to Drill Clearance	0.15
Min. Slot Size For PTH Slots (Tool Size)	0.50
Blind & Buried Vias Manufacturable	Yes

Drill to track Clearance for inner Layers (Upto 6 Layer)	0.25
Drill to track Clearance for inner Layers (>6 Layer)	0.35
Min. Drill Size For Plated Holes on Board Edge	0.80
Min. Drill to Drill Clearance For Plated Holes on Board Edge	0.80

## Surface Finish

Specification	Value
HASL (Lead free & PB/Sn both)	Yes
Electrolytic Gold	Yes
Electroless Nickel / Gold	Yes
Immersion Tin	Yes

## Layer Construction Impedance Design (All Value are in mm)

Specification	Value
Min. Core Thickness	0.15
Min. Possible Dielectric Thickness	0.15
Controlled Impedance Measurement	Yes

## Solder Mask (All Values are in mm)

Specification	Value
Mask Opening	
Green & Blue Masking	0.06
Min. Soldermask Web Width Between Pads	0.08
Mask Opening	
Other than Green & Blue Masking	0.120
Min. Soldermask Web Width Between Pads	0.120
SM to Trace Clearance	0.10
Via Fill Max Drill Size	0.40

### Legend (All Values are in mm)

Specification	Value
Legend Line Width	0.15 to 0.20
Min. Character Height	1.00

### Scoring

Specification	Value
Angle For V-Cut	30 degree
Jump Scoring	Yes

### Routing (All Values are in mm)

Specification	Value
Min. Router Size	0.80

### Copper Clearance From PCB Edge (All Values are in mm)

Specification	Value
For Routing	0.25
For Scoring	0.45
For Inner Layer	0.4

### Carbon (All Values are in mm)

Specification	Value
Min. Line Width	0.30

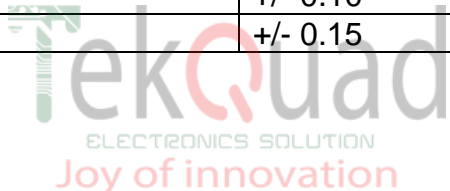
Min. Carbon – Carbon Spacing	0.25
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### Peelable (All Values are in mm)

Specification	Value
Minimum Width of Any Peel-off Element	0.50
Maximum Coverable Hole ENDSIZE	6.00
Minimum Overlap on Copper Pattern	0.254
Minimum Clearance to Free Copper	0.254
Minimum Distance From PCB Outline	0.50

### Drill Tolerances (All Values are in mm)

PTH Hole Size	PTH Tolerance	NPTH Hole Size	NPTH Tolerance
0.50-3.50	+/- 0.10	3	+/- 0.10
>3.50	+/- 0.15	>3	+/- 0.15



### Other Tolerances

PCB Size	PCB Thickness	Trace Width/ Spacing	Copper Thickness Inside Hole	Bow & twist tolerance
+/- 0.20 mm	+/- 20 % (Up to 0.8mm thickness)	+/- 0.20%	$\geq 0.0002$	+/-1%
	+/- 10% (Above 1.0 mm thickness)			

## Available Finishes

RoHS Compliances finishes	Non – RoHS Finish
Lead Free HAL	HAL(sn PB)
Immersion Tin	
Electroless Nickel Immersion Gold (0.075-0.1 um AU +3-5 um Ni)	

## Legend Colours

Colour	Value
White	Yes
Black	Yes
Yellow	Yes

## Solder Mask Colours

Colour	Value
Green	Yes
Black	Yes
White	Yes
Blue	Yes
Red	Yes
Purple	Yes
Yellow	Yes

## Technologies

Specification	Value
Impedance Control	Yes
Blind / Buried Vias	Yes

Carbon Printing	Yes
Hard Gold Tabs	Yes
Peelable Solder Mask	Yes

