



## ROYAL CIRCUIT SOLUTIONS

### Online DFM Checks

#### Signal Checks

- Conductor Width
- Pad to Pad Spacing
- Pad to Trace Spacing
- Trace to Trace Spacing
- Annular Ring
- Plated Hole to Copper
- Non-plated Hole to Copper
- Rout to Copper
- Pad to Board Edge Spacing
- Track to Board Edge Spacing
- Copper Area to Board Edge Spacing
- Hole Registration
- Copper Area
- Missing Copper
- BGA Pitch
- BGA Tracks Centered
- BGA Drilled
- SMD Pitch
- SMD Drilled

#### Plane Checks

- Conductor Width
- Pad to Pad Spacing
- Pad to Trace Spacing
- Trace to Trace Spacing
- Annular Ring
- Plated Hole to Copper
- Non-plated Hole to Copper
- Rout to Copper
- Pad to Board Edge Spacing
- Track to Board Edge Spacing
- Copper Area to Board Edge Spacing
- Hole Registration

- Copper Area
- Thermal Air Gap / Spoke Width
- Missing Copper
- Copper Area

#### Solder Mask Checks

- Solder Mask Clearance
- Coverage
- Spacing
- Missing Solder Mask Clearance
- Exposed Lines
- Partial Clearances
- Soldermask Defined Pads
- Minimum Web

#### Silk Screen Checks

- Line Width
- Silk to Silk Clearance
- Silk Area

#### Drill Checks

- Hole Size
- Duplicate Holes
- Predrill Holes
- Hole Spacing Within Sequence
- Hole Spacing Between Sequences (through-drill to blind/buried)
- Overlapping Holes
- Hole to Board Edge
- Hole Quantities
- Aspect Ratio
- Drill Hole Density
- Stacked Vias