

Producing Method of Printed Circuit Board

Introduction.

The process of manufacturing substrates varies depending on the layer composition of the substrate and its specifications. Four broad categories are described below.

Both side Board (2layer)

- Conductor layers on both sides of the substrate.
- Conductivity between the front and back sides is achieved by using vias.

Penetrated Board (2, 4, 10layer)

- A substrate that is stacked and has multiple layers of conductors.
- Via formed by through-drilling to establish continuity between layers.

Build Up Board (BU)

- Four or more layers are formed in the form of stacked substrates.
- Unlike penetrated board, laser vias are stacked on top of each other to provide continuity between each layer.

Flex Rigid Board

- A substrate that combines a flexible (bendable) substrate with a rigid substrate.
- Used for special applications, such as in narrow enclosures.

基板のつくりかた

はじめに

基板の製造方法は、基板の層構成やその仕様によって工程が異なります。下記に大まかな4分類を記載します。

両面基板(2層板)

- 基板の両面に導体層をもつ。
- ビアにて表裏の導通をとる。

貫通基板(4層、6層、10層～)

- 基板を積み重ね、複数層の導体を形成した基板。
- 貫通ドリルにて形成したビアにて層間の導通を取る。

ビルドアップ基板(BU基板)

- 4層以上の層を、基板を積み重ねる形式で形成する。
- 貫通基板とは異なり、レーザービアを積み重ね各層との導通を図る。

フレックスリジッド基板

- フレックス(湾曲可能)な基板とリジッド(硬質)な基板を組み合わせた基板。
- 狭小な筐体内など、特殊な用途に用いられる。