

Test Procedure for the STK984-091AGEVB Evaluation Board

[Supply Voltage] VB1 (8 to 18V): Power Supply for 3-phase motor & Driver IC

Vcc (5V): Pull up Power Supply for DIAG1, DIAG2

[Operation Guide]

1. Motor Connection:

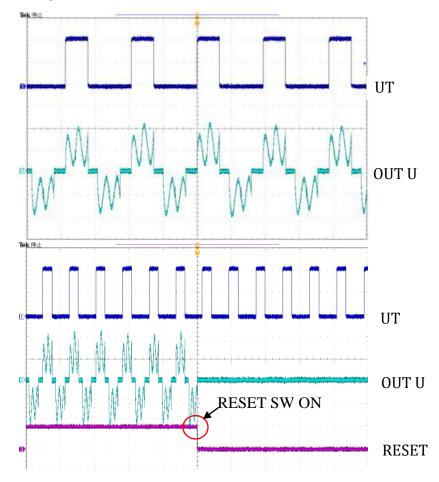
Connect the motor to OUT U and OUT V and OUT W.

2. Power Supply:

At first, supply DC voltage to VB. Next, supply DC voltage to Vcc.

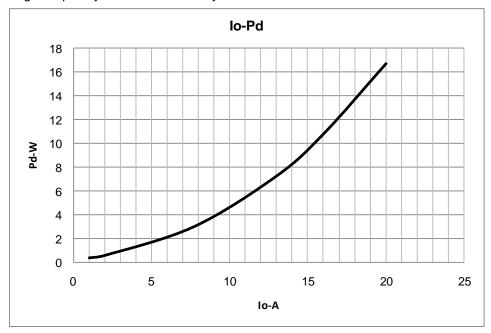
3. Motor Operation

Waveform example



Heat radiation fin design

- 120-degree energization PWM frequency:20kHz
- · Phase change frequency:400Hz · ON Duty:90%



Thermal resistance calculation formula for Heat sink is as follows: Rth = (Tc-Ta)/Pd