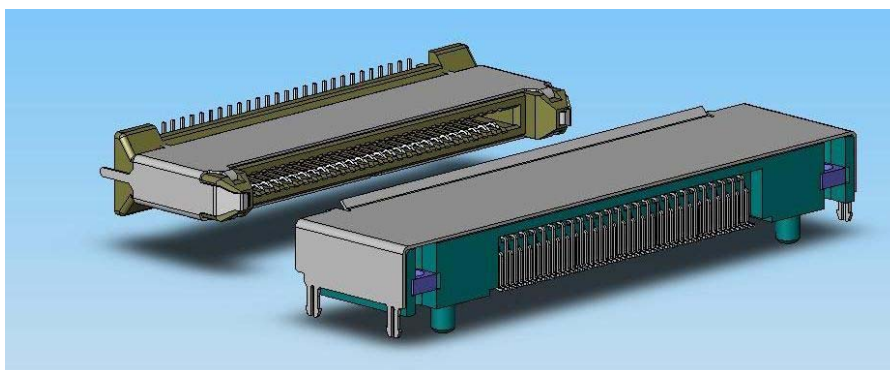**JAE**

NEW

Board to Board Connector Compatible to SATA

WM2 Series

CONNECTOR

MB-0139-1

August 2005

WM2 Series are USB2.0 and SATA (Serial ATA) compatible and can be used for the bay unit connection of notebook PCs.

Features

- Compatible to SATA and USB 2.0 transmission.

- With shell compatible to EMI
  The shells (ground portion) will connect first when mating.

- Strong durability, 10,000 times mating and unmating cycle guaranteed

- Two-step live insertion structure is employed for contact.

- Comes with enough guide for blind mating. Length of guide: ±17mm (each direction)
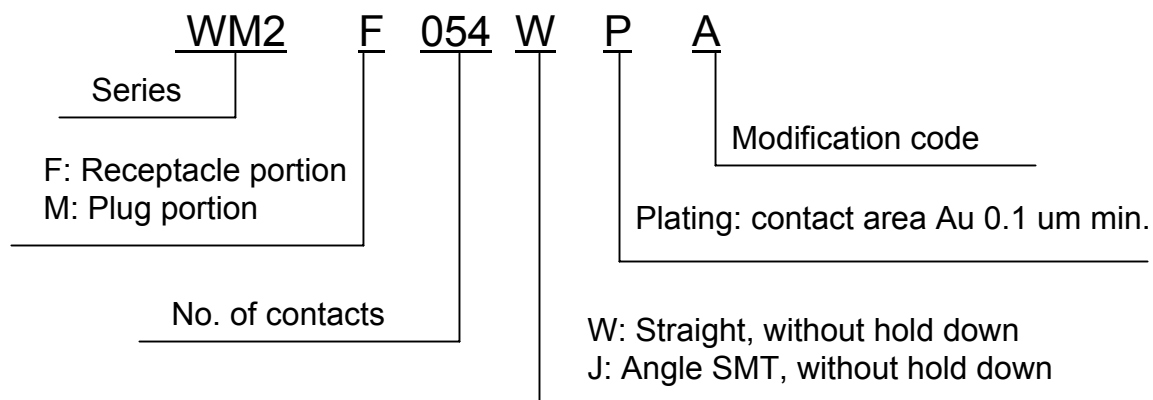
General Specifications

- No. of contacts: 54 pos.

- Contact resistance: 50m ohm max.

- Dielectric withstanding voltage : AC250 per minute

- Operating temperature: -40 Deg. C to +85 Deg. C

- Rated voltage: 0.5A/ per pin
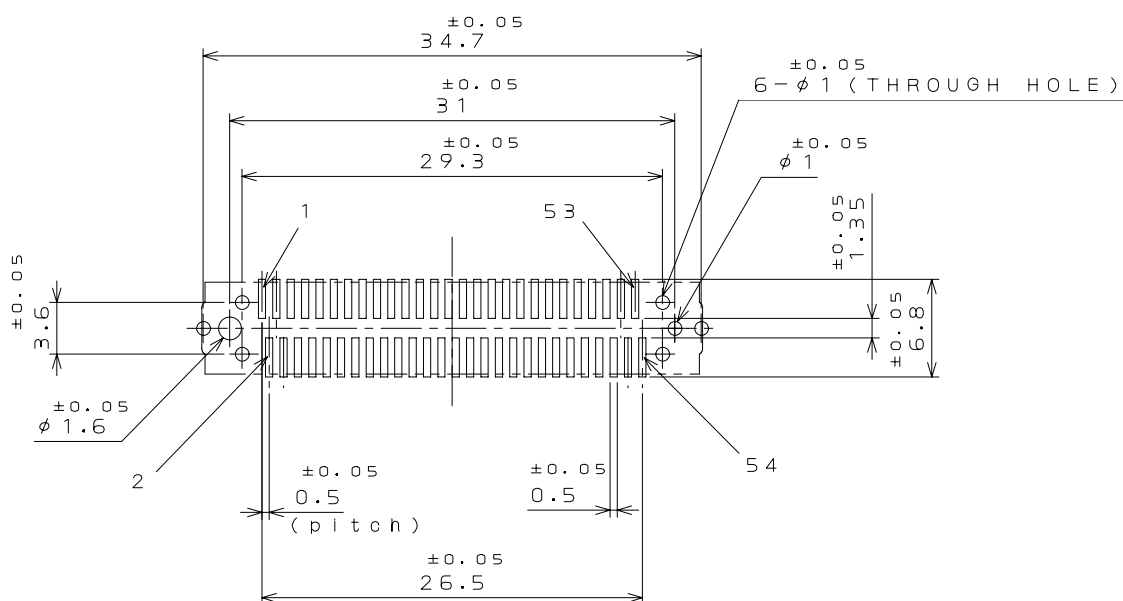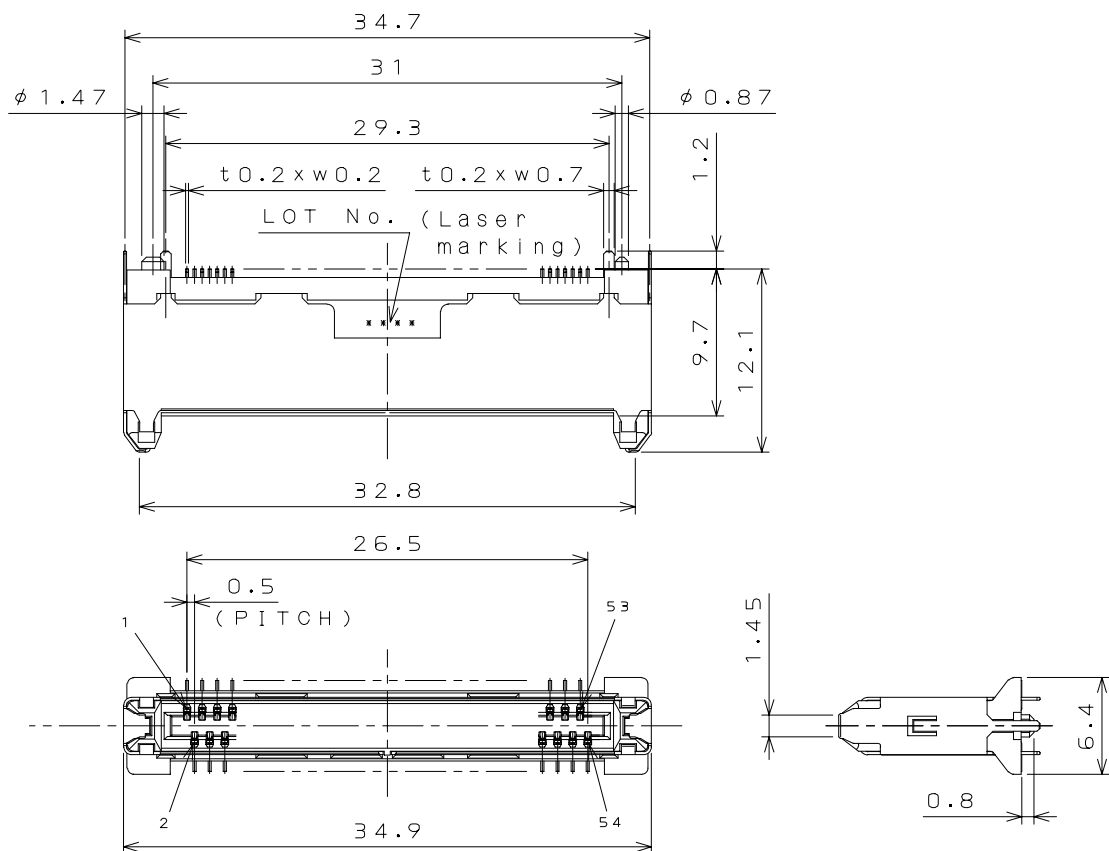
- Durability: 10,000 cycle

Materials and Finishes

Components	Materials /Finishes
Receptacle	
Contact	Copper Alloy/ Contact: 0.1um min. Au plating over Ni Terminal: Au flash plating over Ni
Insulator	Glass filled LCP (UL94V-0)
Shell	Stainless steel
Plug	
Contact	Copper Alloy/ Contact: 0.1um min. Au plating over Ni Terminal: Au flash plating over Ni
Insulator	Glass filled LCP
Shell	Stainless steel
Nut	Steel/ Ni plating M2

Ordering Information

WM2   F   054   W   P   A

Series

F: Receptacle portion
M: Plug portion

No. of contacts

W: Straight, without hold down
J: Angle SMT, without hold down

Plating: contact area Au 0.1 um min.

Modification code

Receptacle side: WM2F054WPA (SJ100657)

Applicable P.C.B dimension

Plug side: WM2M054JPA　(SJ100658)

44

LOT No.
(STAMP)

****

36.2

35

28.6

26.5

0.5

(PITCH)

53

1

54

φ1.87

2

t0.2×w0.2

38.9

43.75

12.2

3.5

4.85

3.5

4.5

1.2

1.35

6.5

±0.1
36

±0.05
26.5

2-φ2.2
±0.05

±0.05
0.5

(PITCH)

54

2 1

±0.05
0.25

±0.1
1.7

±0.05
4.5

±0.05
3.5

(6.5)

±0.1
1.2

±0.05
38.9

±0.1
3.6

MAX
5

±0.05
4.2

±0.05
3.5

P.C.B LINE

±0.05
4-φ1.2
(THROUGH HOLE)

±0.1
42

±0.05
43.75

±0.05
2-φ2
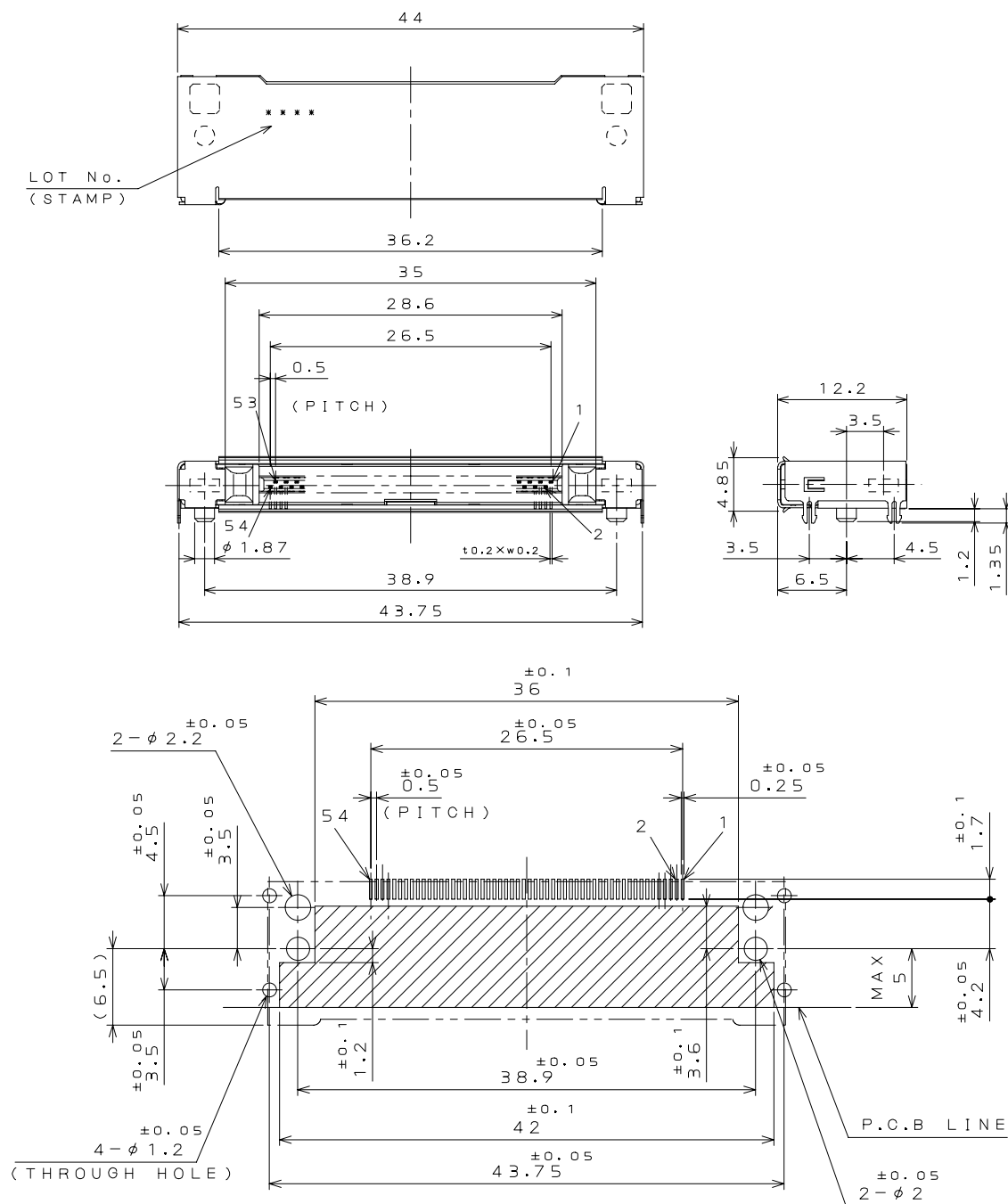
Applicable P.C.B dimension

Notice: Products shown in this leaflet are made for the applications listed below. However, if the above-mentioned products are to be used in aerospace devices, marine cable-connection devices, atomic power control systems, medical equipment for life-support systems, or any other specific application requiring extremely high reliability, please contact JAE for further information.
Recommended applications: computers, office machines, measuring devices, telecommunication devices (terminals, mobile devices), AV devices, household applications, FA devices, etc.

* The specifications in this brochure are subject to change without notice.