

Hirose Korea I/F Connector

KQ04S*-Series

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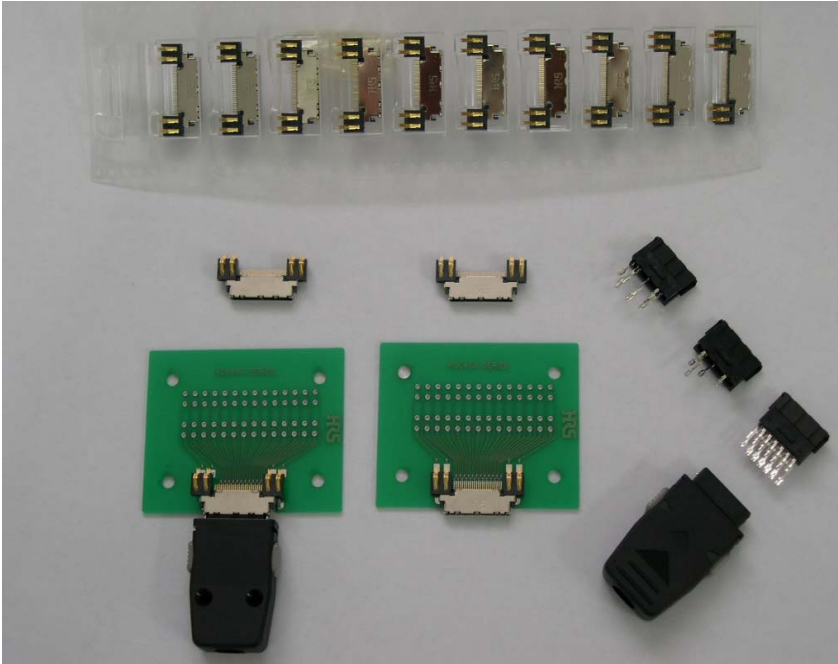
No.	제 품 명	Pin 수	Size (가로 * 세로 * 높이)	관련 page
1	KQ04SA-24P/4	24 / 4	22.8*11.3*4.8mm	5
2	KQ04SB-24P/4	24 / 4	22.8*11.3*4.8mm	5
3	KQ04SP-24S-CV	24	35.7*22.4*10mm	6
4	KQ04SB-24S-CV	24	35.7*22.4*10mm	6
5	KQ04SP-24(8)S-CV	8	35.7*22.4*10mm	7
6	KQ04SP-24(5)S-CV	5	35.7*22.4*10mm	8
7	KQ04SH-24P/3	24 / 3	21.2*11.3*4.88mm	9

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HHP I/F Connector

KQ04S* - Series



■ 특징

1.정통부 표준 Type의 HHP용 I/F Connector

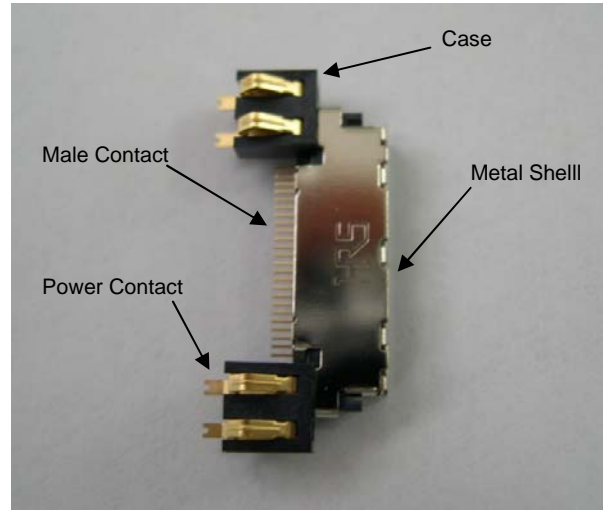
국내 정통부 표준 Type의 24 Pin Connector 로써 PCB 실장시 실장 높이를 최소화한 Offset Type으로 설계 되었으며 Metal Shell Key가 대칭 형상인 "SB" 사양품도 확보하고 있음

2.Slim화 된 Size

휴대전화등 이동통신 단말기의 소형화, Slim화에 대응하며 Battery 단자 4Pin 과 0.5mm Pitch 24Pin Signal 단자를 Mold와 일체화시킨 구조로 되어있습

3.Plug 24Pin 및 8Pin 까지 사양품 보유

Plug은 포크 단자 Type의 가이드부 없는 구조로 표준 Type의 24Pin 및 GSM/Charger 용으로 8Pin까지 대응 가능한 구조로 설계 되어있습



■ 제품 규격

Rating	Current (Signal : 0.5A) (Power : 3A)	Operating temperature range	Storage temperature range
	Voltage AC 100V	-30 °C ~ + 80 °C	-40 °C ~ + 85 °C (Include package)

Item	Test Method	Condition
1. Insulation Resistance	DC 250V	1000MΩ Min
2. Voltage Proof	AC 350V for 1min	No Flashover or Breakdown
3. Contact Resistance	100mA (DC or 1000Hz)	50mΩ Max
4. Vibration	Frequency 10~55Hz Single Amplitude 0.76mm at 2Hr for 3Direction.	No Electrical Discontinuity of 10μs
5. Humidity	Temperature : 40±2 °C Relative Humidity : 90~95% Duration : 96Hr	Contact Resistance : 100mΩMax
		Insulation Resistance : 10MΩMin
6. Mechanical Operation	Mated 5000 Times	Contact Resistance : 100mΩMax

■ 부품별 적용 원재료

(SOCKET)

Part	Material	Finish	Remark
Case	LCP / PA	Black	UL94V-0
Male Contact	Copper Alloy	Gold plating	-
Power Contact	Copper Alloy	Gold plating	-
Metal Shell	Stainless Steel	NiP	-

※ Reflow 최대 온도 250 °C 를 만족시킴으로 Lead-free Soldering 의 요구조건에 적합한 제품이다.

(PLUG)

Part	Material	Finish	Remark
Insulation Case	LCP / PA	Black	UL94V-0
Cover Case	PC / PBT	Black	UL94V-HB
Button	ABS	Light Gray	-
Female Contact	Copper Alloy	AuP / SnPb	-
Lock Spring	Stainless Steel	-	-

■ Part Number 의 구성

(SOCKET)

KQ04 SA - 24P/4

① ② ③ ④

①	Serial Name	고유ID
②	SA	정통부 표준Type의 Offset Type
	SB	" (Metal Key 대칭형)
③	Contact 수	24pin
④	Power Contact 수	4pin

(PLUG)

KQ04 SP - 24(*)S - CV

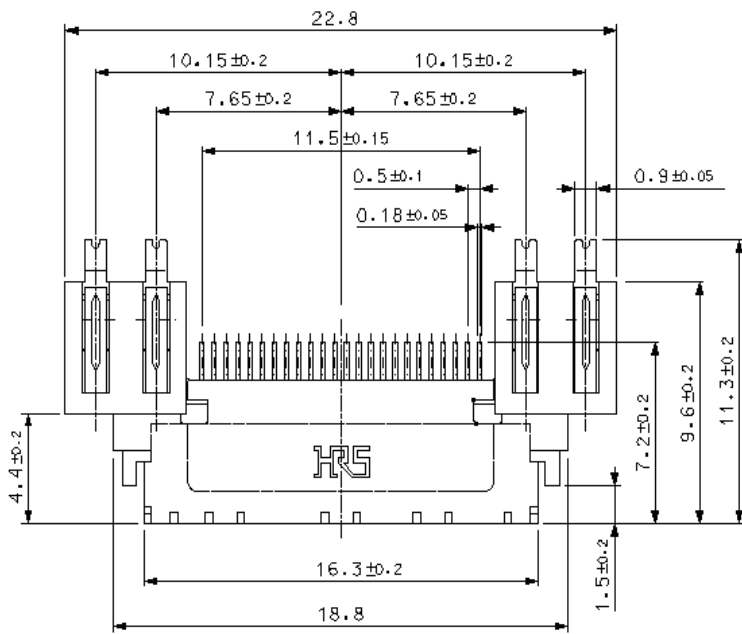
① ② ③ ④ ⑤

①	Serial Name	고유ID
②	SP	정통부 표준Type의 Plug
	SB	" (Metal Key 대칭형)
③	Contact 수	24pin
④	사양 Pin 수	1 ~ 8 Pin 사양 가능
⑤	Assembly 품	Cover Case / Lock Spring / Button

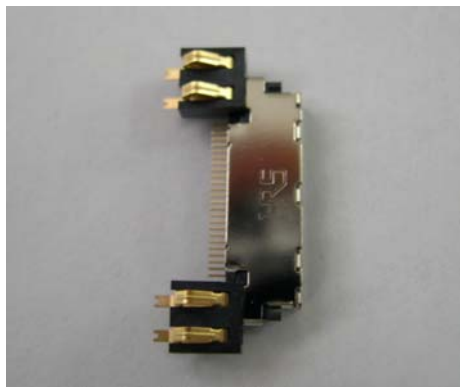
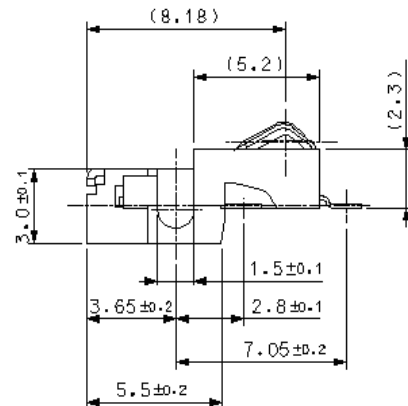
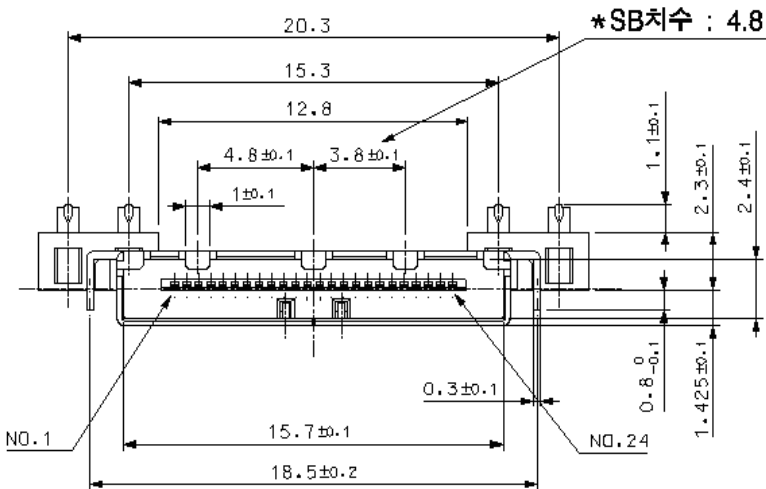
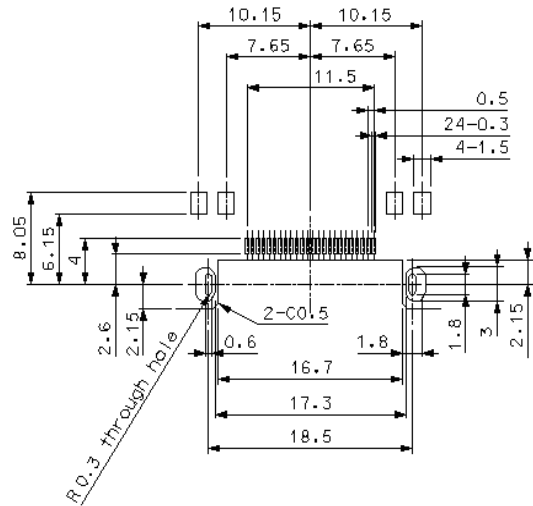
SOCKET(Offset Type)

■ KQ04SA-24P/4

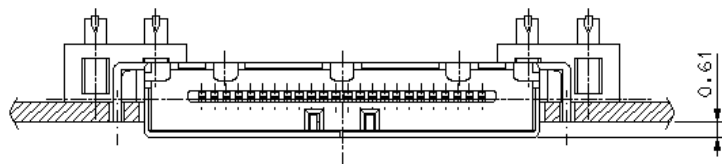
■ KQ04SB-24P/4



(PCB LAYOUT 참고도)



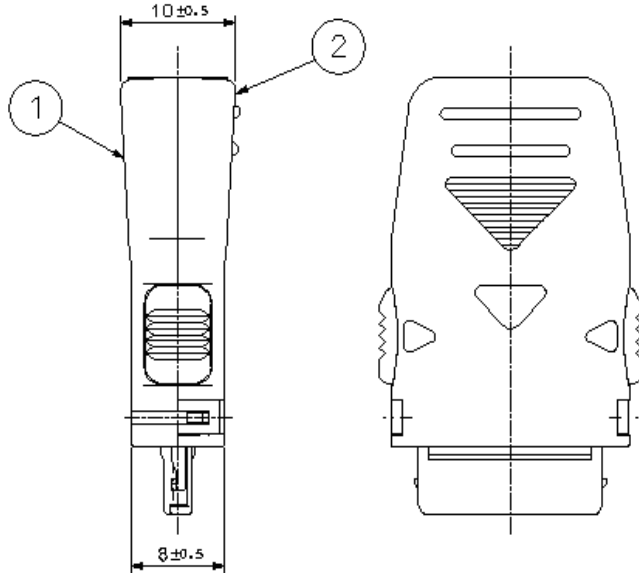
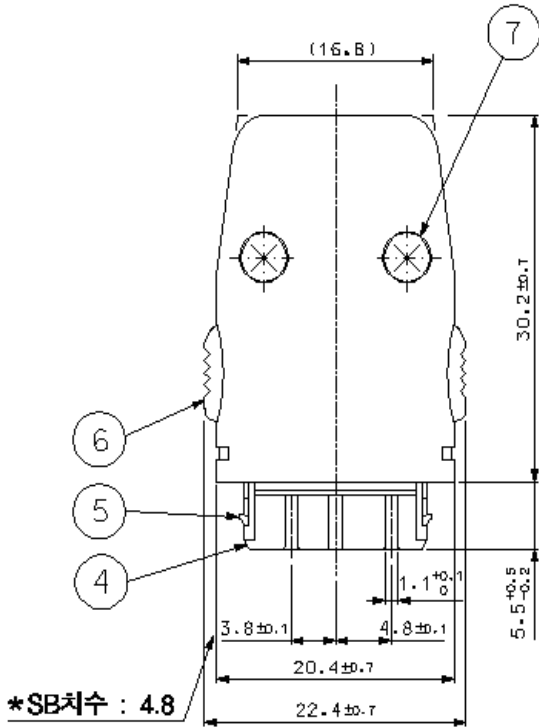
PCB 장착 상태도



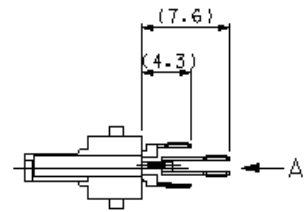
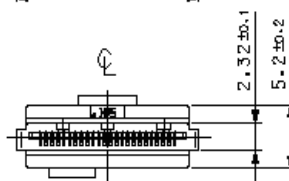
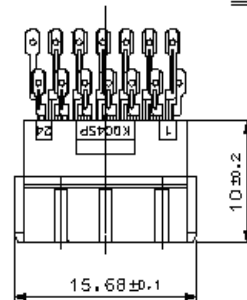
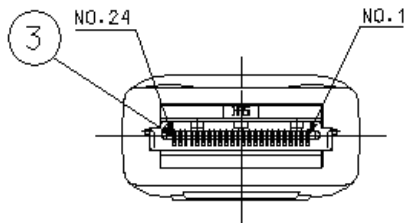
Hirose Part No.	Product Name	Contact	Package	Remark
CL 6226-0065-5	KQ04SA-24P/4	24P/4	Emboss Tape	500ea/Reel
CL 6226-0068-3	KQ04SB-24P/4	24P/4	Emboss Tape	500ea/Reel

PLUG

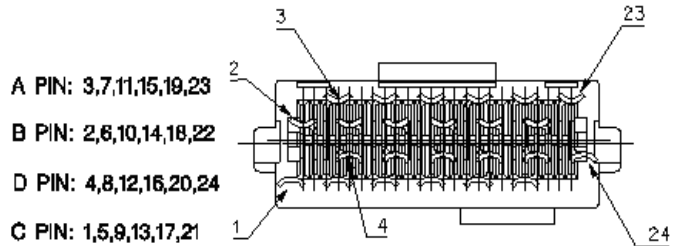
- KQ04SP-24S-CV
- KQ04SB-24S-CV



CONNECTOR UNIT



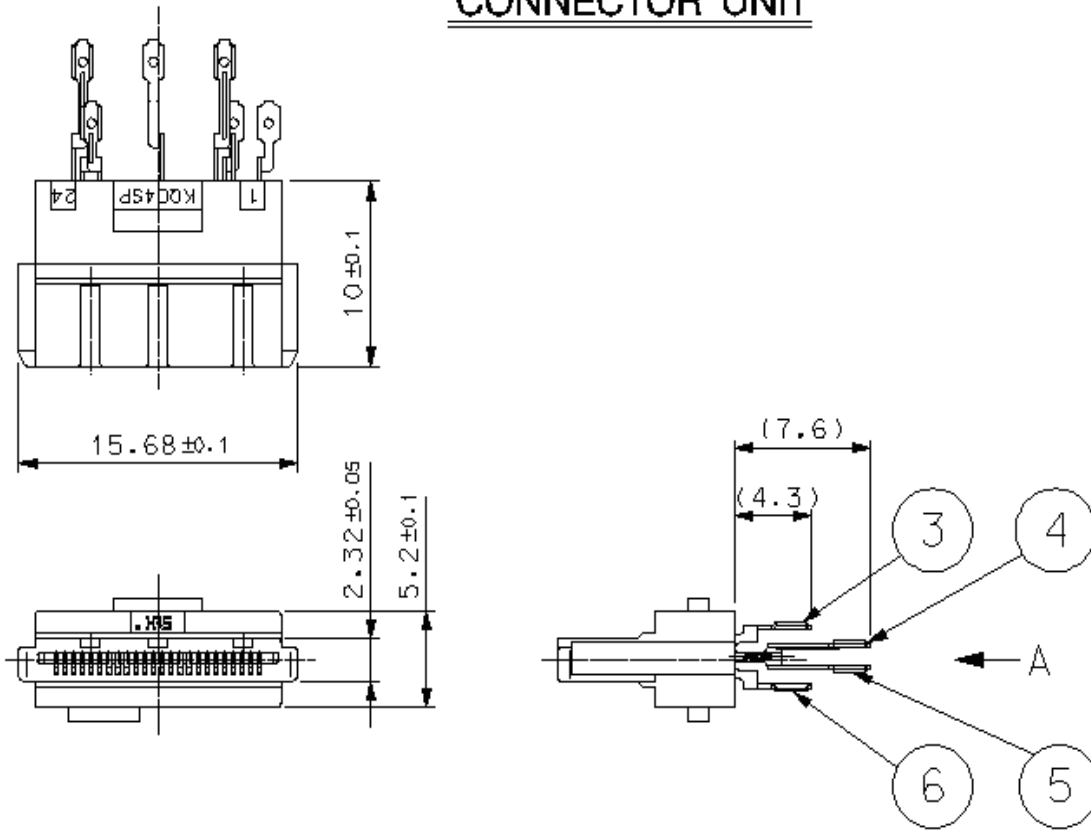
A(4:1)



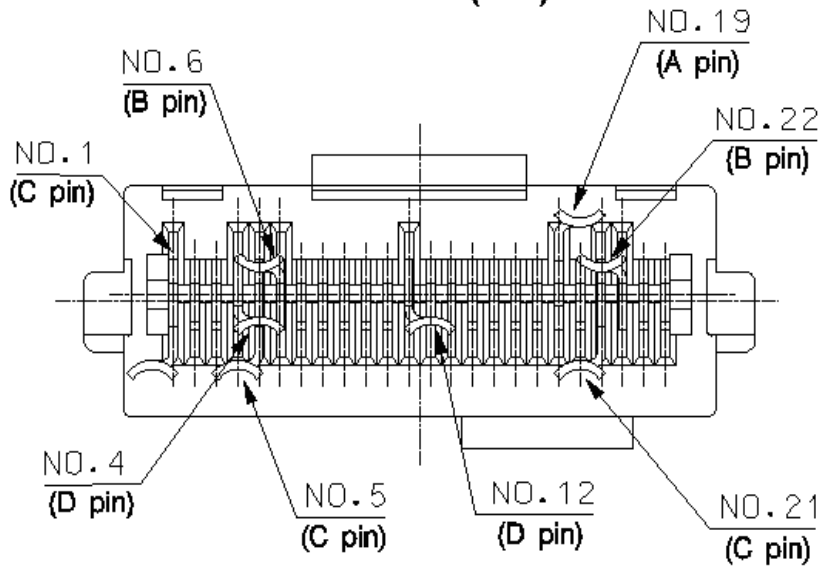
Hirose Part No.	Product Name	Contact	Package	Remark
CL 6226-0066-8	KQ04SP-24S-CV	24	Tray	500ea/Box
CL 6226-0072-0	KQ04SB-24S-CV	24	Tray	500ea/Box

■ KQ04SP-24(8)S-CV

CONNECTOR UNIT



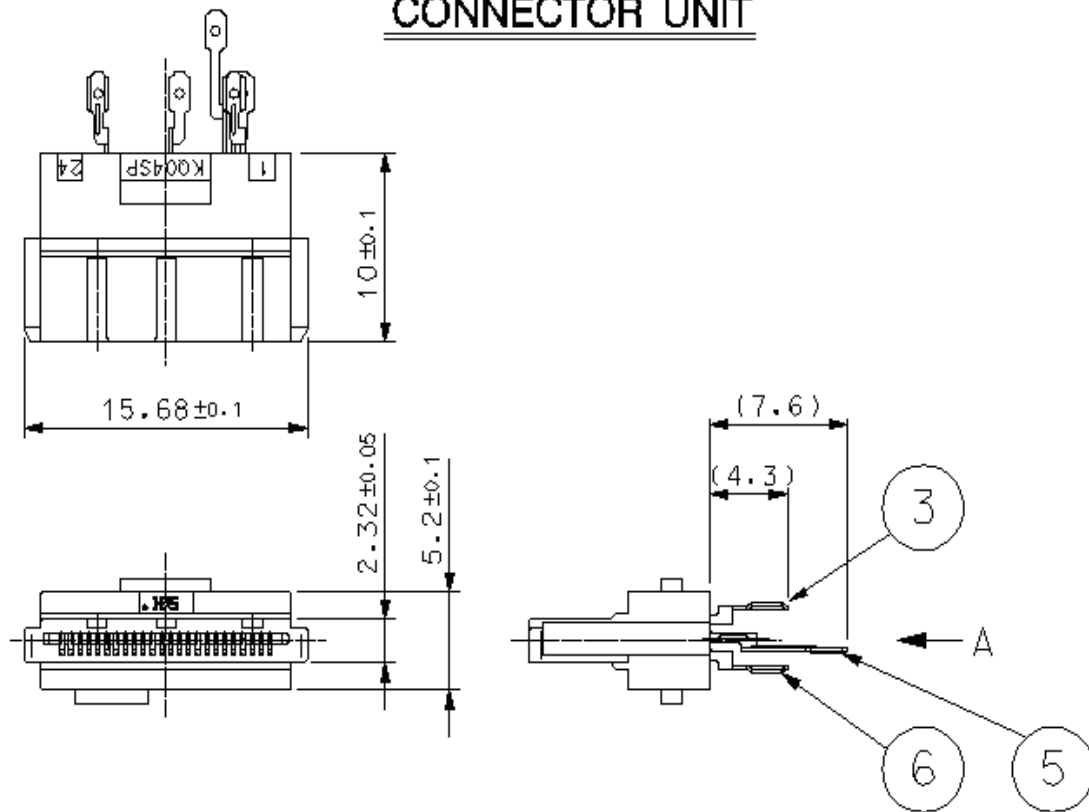
VIEW A(4:1)



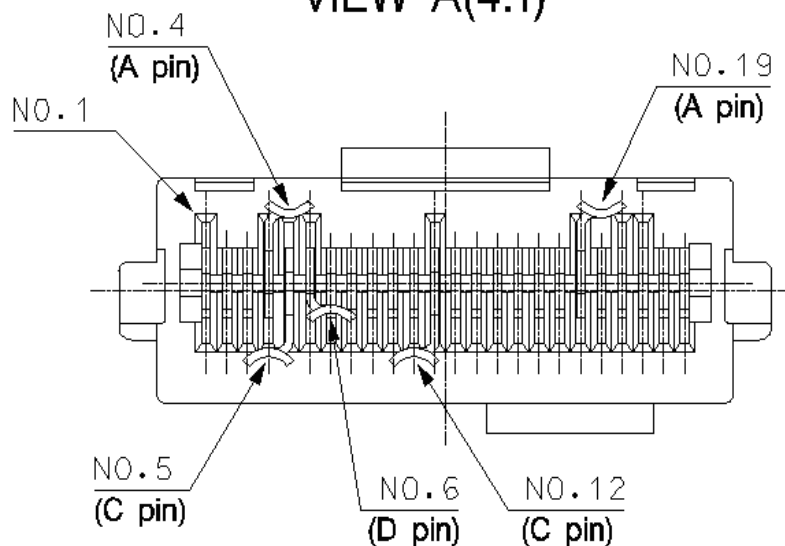
Hirose Part No.	Product Name	Contact	Package	Remark
CL 6226-0073-3	KQ04SP-24(8)S-CV	8	Tray	500ea/Box

■ KQ04SP-24(5)S-CV

CONNECTOR UNIT

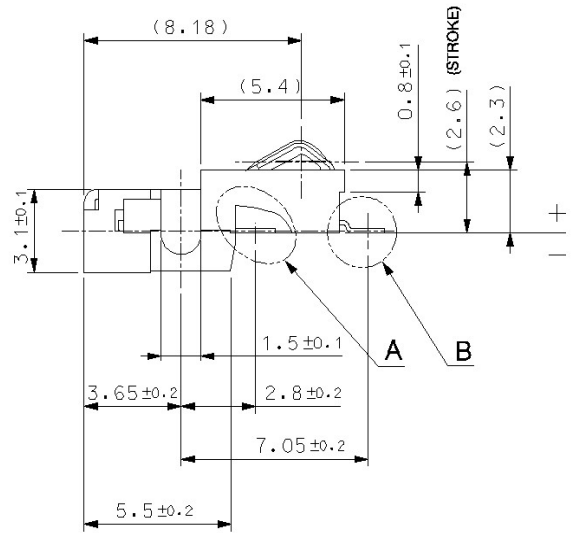
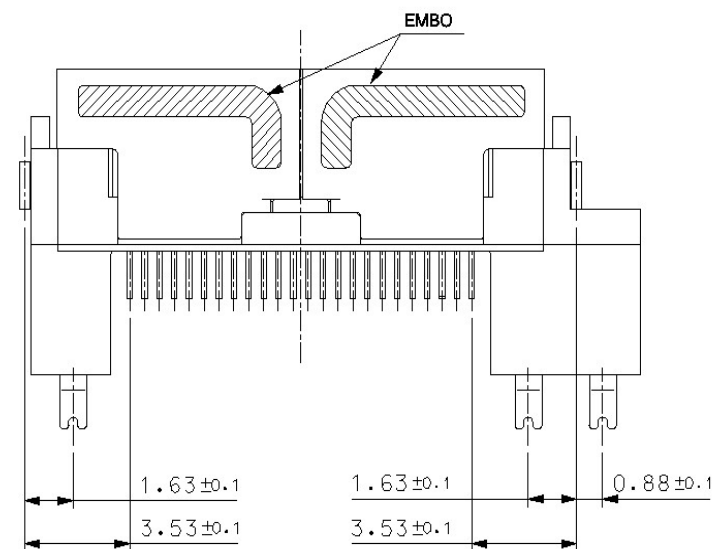
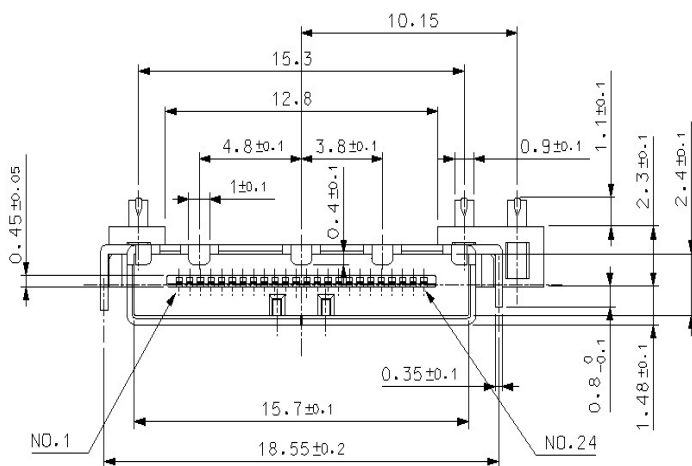
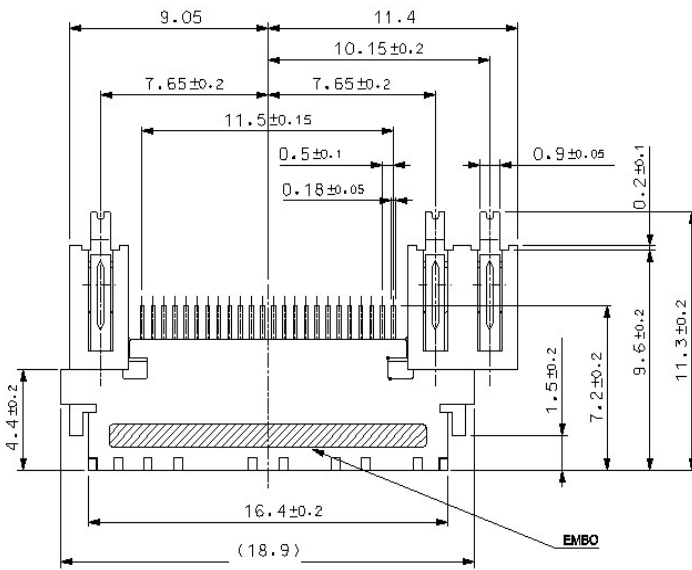


VIEW A(4:1)

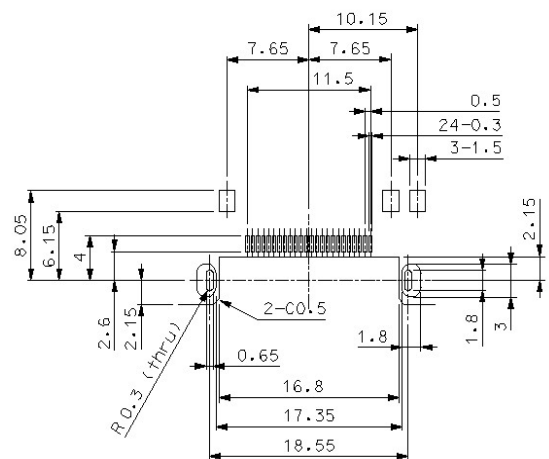


Hirose Part No.	Product Name	Contact	Package	Remark
CL 6226-0074-6	KQ04SP-24(5)S-CV	5	Tray	500ea/Box

KQ04SH-24P/3



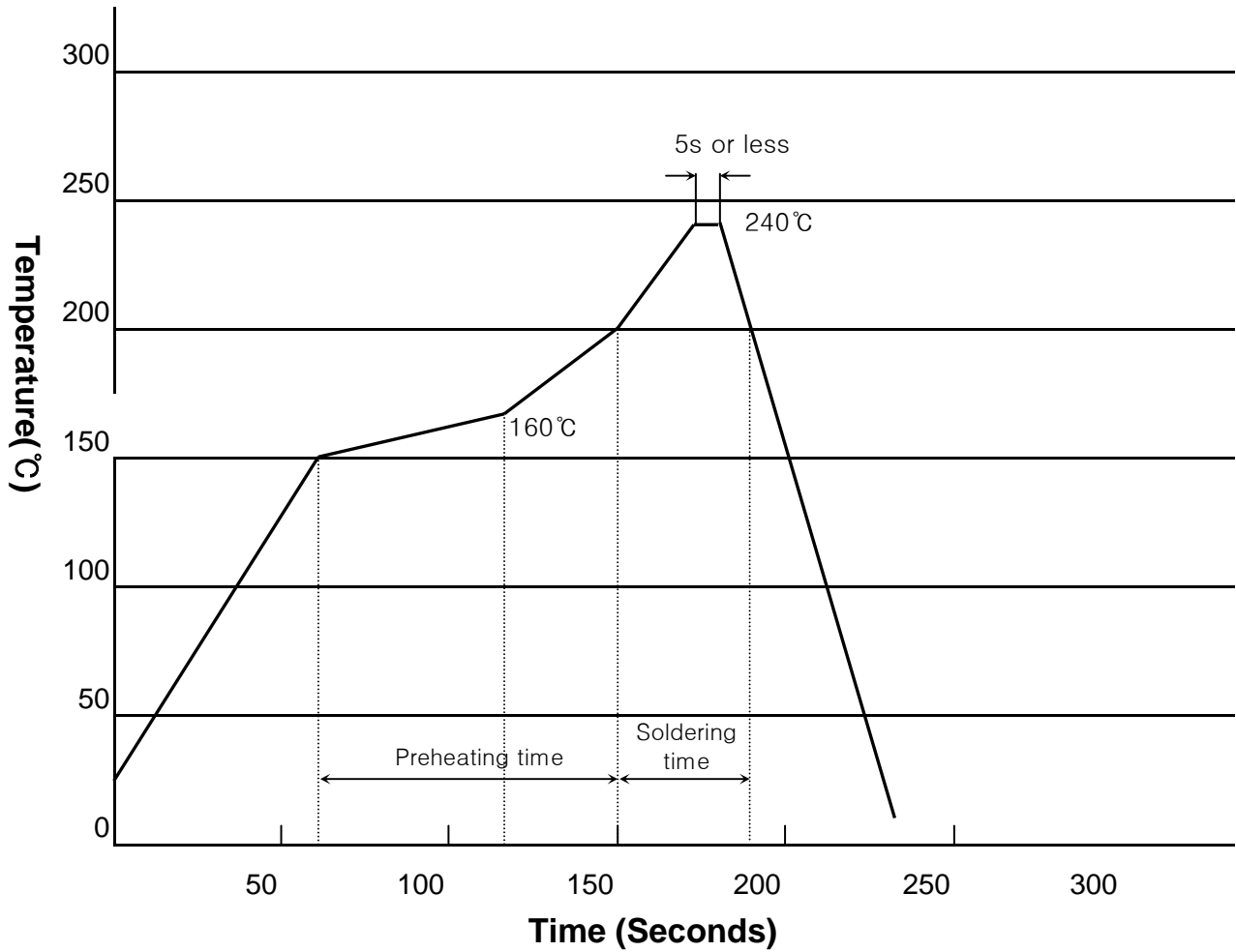
PCB PATTERN



Hirose Part No.	Product Name	Contact	Package	Remark
CL 6226-0081-1	KQ04SH-24P/3	24P/3	Emboss Tape	500ea/Reel

■ Reflow Profile

Using Conventional Solder Paste



Recommended Application Conditions

Reflow System: IR reflow

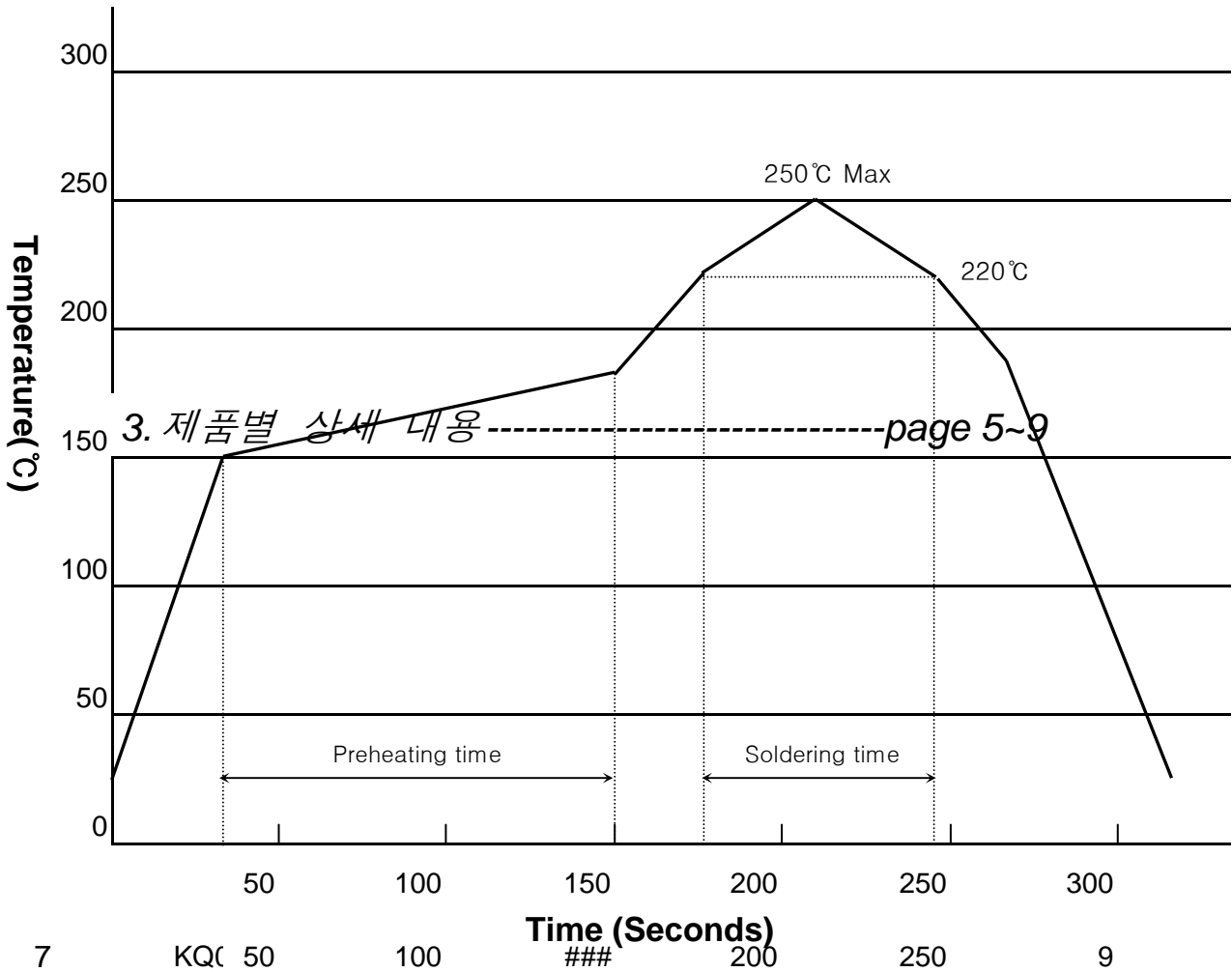
Solder: Cream type 63 Sn / 37 Pb

Flux content 11%wt

Metal mask thickness: 0.15mm

■ Reflow Profile

Using Lead-free Solder Paste



Re 4.Reflow profile (Conventional)-----page 10

Ref 5.Reflow profile (Lead-free)-----page 11

Solder: Cream type Sn / 0.3 Ag / 0.5 Cu

Flux content 11%wt

Metal mask thickness: 0.15mm

Preheating time: 150°C~180°C, 90±30seconds

Soldering time: 250°C Max

220°C Min, 60±10seconds