

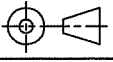
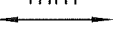
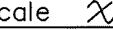


FCIconnect.com

Copyright FCI.

List of "HFW__R-1/2STAE1LF" customer document

DOCUMENT NO.	LIST
SC-HFWR03	SPEC.
JSA96453	CAT.NO.TABLE FOR 1mm SPACING SMT CONNECTOR (HFW__R-1/2STA__LF)
JSA96454	1mm SPACING SURFACE MOUNT FPC CONNECCTOR (HFW__R-1STA_LF)
JSA96455	1mm SPACING SURFACE MOUNT FPC CONNECCTOR (HFW__R-2STA_LF)
JSA96456	CAT.NO.TABLE FOR PLASTIC TAPE PACKAGED 1mm SPACING SMT CONN.(HFW__R-1/2STAE1LF)
JSA96457	1mm SPACING SMT CONNECTOR (HFW__R-1STAE1LF)
JSA96458	1mm SPACING SMT CONNECTOR (HFW__R-2STAE1LF)
JSA96459	RECOMMENDED CABLE (FPC) (HFW__R-1/2STA)
BJM-HFWR101	HANDLING PROCEDURES

mat'l. code				surface 58 / tolerance ISO 1302 ✓ / ISO 406 / ISO 1101		projection 		product family 58NF		CODE JP	
ltr	ecn no	dr	date	tolerances unless otherwise specified		mm 		title			
A	J05-0322	H.T	6/3/'05	angles	linear	scale 		1mm SPACING FPC/FFC CONNECTOR DOCUMENT LIST			
B	J06-0413	H.T	10/4/'06					(Cat. No. : HFW__R-1/2STAE1LF)			
C	J07-0161	H.T	3/15/'07								
		dr				FCI		dwg no		sheet 1 of 1	size
		enrg						JSA 96452			A4
		chr						type Product Customer Drawing			
		appd									
sheet index	revision	C									Rev C
sheet	1										

CAT. NO. & DIMENSIONS

(NOTE3)	NO. OF CONTACTS (n)	CAT. NO.	DIMENSIONS (NOTE2)		
			A ± 0.2	B ± 0.2	C ± 0.1
	4	HFW4R-1/2STA__LF	6.6	3	5.14
	5	HFW5R-1/2STA__LF	7.6	4	6.14
	6	HFW6R-1/2STA__LF	8.6	5	7.14
	7	HFW7R-1/2STA__LF	9.6	6	8.14
	8	HFW8R-1/2STA__LF	10.6	7	9.14
	9	HFW9R-1/2STA__LF	11.6	8	10.14
	10	HFW10R-1/2STA__LF	12.6	9	11.14
	11	HFW11R-1/2STA__LF	13.6	10	12.14
	12	HFW12R-1/2STA__LF	14.6	11	13.14
	13	HFW13R-1/2STA__LF	15.6	12	14.14
	14	HFW14R-1/2STA__LF	16.6	13	15.14
	15	HFW15R-1/2STA__LF	17.6	14	16.14
	16	HFW16R-1/2STA__LF	18.6	15	17.14
	17	HFW17R-1/2STA__LF	19.6	16	18.14
	18	HFW18R-1/2STA__LF	20.6	17	19.14
	19	HFW19R-1/2STA__LF	21.6	18	20.14
	20	HFW20R-1/2STA__LF	22.6	19	21.14
	21	HFW21R-1/2STA__LF	23.6	20	22.14
	22	HFW22R-1/2STA__LF	24.6	21	23.14
	23	HFW23R-1/2STA__LF	25.6	22	24.14
	24	HFW24R-1/2STA__LF	26.6	23	25.14
	25	HFW25R-1/2STA__LF	27.6	24	26.14
	26	HFW26R-1/2STA__LF	28.6	25	27.14
	27	HFW27R-1/2STA__LF	29.6	26	28.14
*	28	HFW28R-1/2STA__LF	30.6	27	29.14
*	29	HFW29R-1/2STA__LF	31.6	28	30.14
	30	HFW30R-1/2STA__LF	32.6	29	31.14

CAT. NO. HFW (n) R - 1 ST A __ LF

SERIES

NO. OF CONTACTS

RIGHT ANGLE TYPE

FOR FPC/FFC, CONTACT DIRECTION

1. LOWER CONTACT TYPE
2. UPPER CONTACT TYPE

FOR AUTOMATIC MOUNTING (SMT)

GOLD PLATING

PACKAGE STYLE

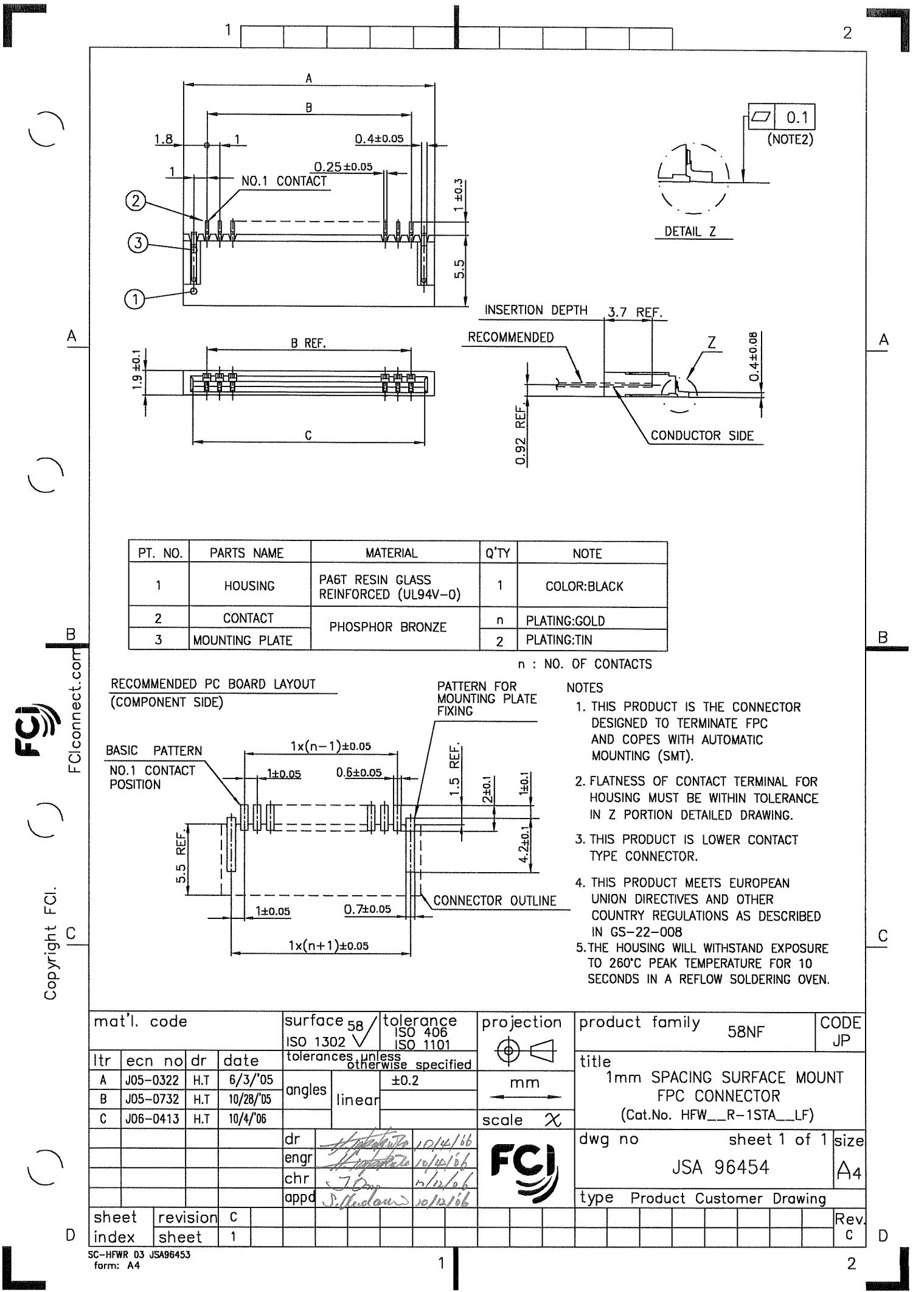
LEAD FREE

NOTES

- THIS PRODUCT IS THE CONNECTOR DESIGNED TO TERMINATE FPC AND COPE WITH AUTOMATIC MOUNTING (SMT).
- SEE PART DRAWINGS FOR DIMENSIONS A~C.
- PLEASE CONSULT US IN CASE OF USING PARTS WITH * MARK.

mat'l. code				surface 58/ISO 1302		tolerance ISO 406 ISO 1101		projection		product family 58NF		CODE JP	
ltr	ecn no	dr	date	tolerances unless otherwise specified		angles linear		mm		title CAT NO.TABLE FOR 1mm SPACING SMT CONNECTOR (Cat.No. HFW__R-1/2STA__LF)			
A	J05-0322	H.T	6/3/05										
B	J06-0413	H.T	10/4/06										
				dr		10/4/06		scale		sheet 1 of 1		size	
				enrg		10/4/06		FCJ		JSA 96453		A4	
				chr		12/12/06				type Product Customer Drawing			
				appd		12/12/06							
sheet index		revision B										Rev. B	
		sheet 1											

SC-HFWR 03 JSA 96454 96455 96456 96457 96458 96459
form: A4



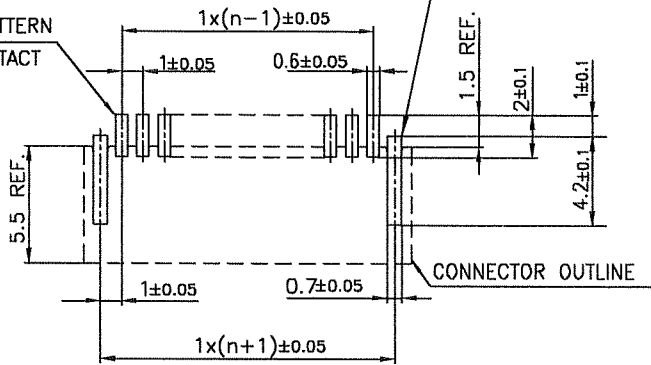
PT. NO.	PARTS NAME	MATERIAL	Q'TY	NOTE
1	HOUSING	PA6T RESIN GLASS REINFORCED (UL94V-0)	1	COLOR:BLACK
2	CONTACT	PHOSPHOR BRONZE	n	PLATING:GOLD
3	MOUNTING PLATE		2	PLATING:TIN

n : NO. OF CONTACTS

RECOMMENDED PC BOARD LAYOUT
(COMPONENT SIDE)

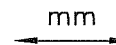
BASIC PATTERN
NO.1 CONTACT
POSITION

PATTERN FOR
MOUNTING PLATE
FIXING

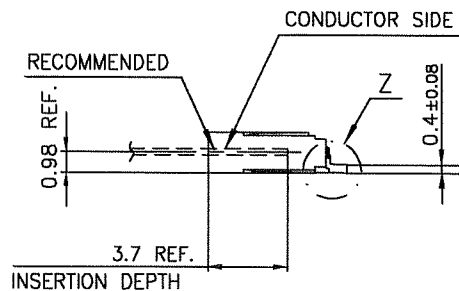
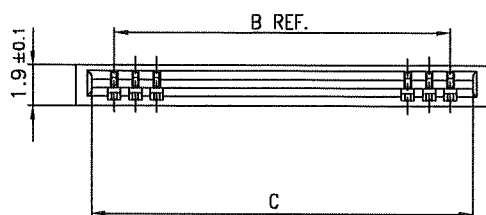
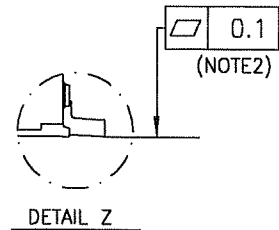
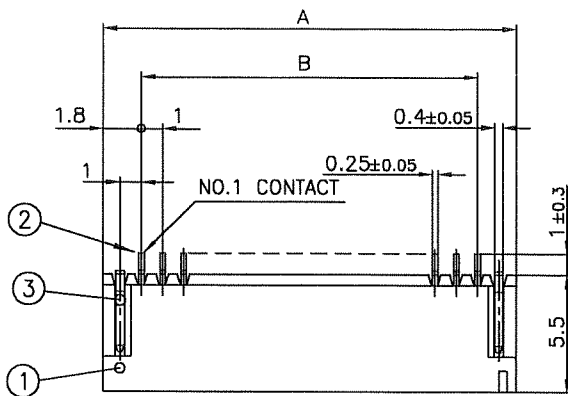


NOTES

1. THIS PRODUCT IS THE CONNECTOR DESIGNED TO TERMINATE FPC AND COPES WITH AUTOMATIC MOUNTING (SMT).
2. FLATNESS OF CONTACT TERMINAL FOR HOUSING MUST BE WITHIN TOLERANCE IN Z PORTION DETAILED DRAWING.
3. THIS PRODUCT IS LOWER CONTACT TYPE CONNECTOR.
4. THIS PRODUCT MEETS EUROPEAN UNION DIRECTIVES AND OTHER COUNTRY REGULATIONS AS DESCRIBED IN GS-22-008
5. THE HOUSING WILL WITHSTAND EXPOSURE TO 260°C PEAK TEMPERATURE FOR 10 SECONDS IN A REFLOW SOLDERING OVEN.

mat'l. code				surface 58 ISO 1302		tolerance ISO 406 ISO 1101		projection 		product family 58NF				CODE JP			
ltr	ecn no	dr	date	tolerances unless otherwise specified							title 1mm SPACING SURFACE MOUNT FPC CONNECTOR (Cat.No. HFW__R-1STA__LF)						
A	J05-0322	H.T	6/3/'05	angles	linear	±0.2											
B	J05-0732	H.T	10/28/'05														
C	J06-0413	H.T	10/4/'06							scale X							
				dr	<i>10/4/06</i>		<i>10/4/06</i>			dwg no				sheet 1 of 1		size	
				enrg	<i>10/4/06</i>		<i>10/4/06</i>			JSA 96454						A4	
				chr	<i>10/12/06</i>		<i>10/12/06</i>										
				appd	<i>10/12/06</i>		<i>10/12/06</i>										
sheet index		revision		C												Rev. C	
		sheet		1													

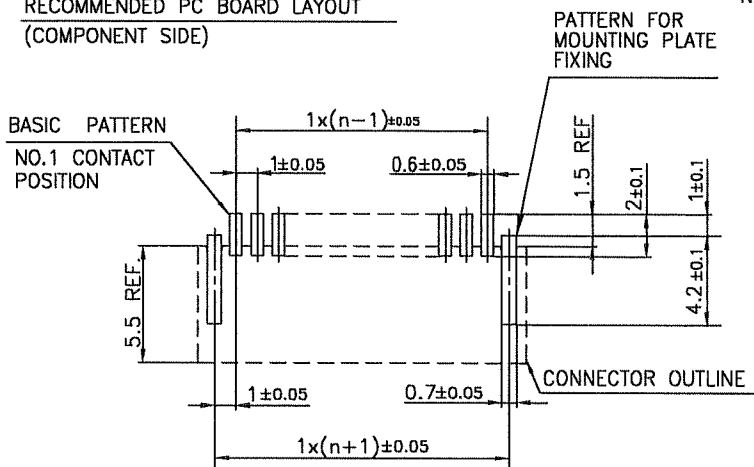
SC-HFWR 03 JSA96453
form: A4



PT. NO.	PARTS NAME	MATERIAL	Q'TY	NOTE
1	HOUSING	PA6T RESIN GLASS REINFORCED (UL94V-0)	1	COLOR:BLACK
2	CONTACT	PHOSPHOR BRONZE	n	PLATING:GOLD
3	MOUNTING PLATE		2	PLATING:TIN

n : NO. OF CONTACTS

RECOMMENDED PC BOARD LAYOUT (COMPONENT SIDE)



NOTES

- THIS PRODUCT IS THE CONNECTOR
- DESIGNED TO TERMINATE FPC AND COPS WITH AUTOMATIC MOUNTING (SMT).
- FLATNESS OF CONTACT TERMINAL FOR HOUSING MUST BE WITHIN TOLERANCE IN Z PORTION DETAILED DRAWING.
- THIS PRODUCT IS UPPER CONTACT TYPE CONNECTOR.
- THIS PRODUCT MEETS EUROPEAN UNION DIRECTIVES AND OTHER COUNTRY REGULATIONS AS DESCRIBED IN GS-22-008
- THE HOUSING WILL WITHSTAND EXPOSURE TO 260°C PEAK TEMPERATURE FOR 10 SECONDS IN A REFLOW SOLDERING OVEN.

mat'l. code				surface 58	tolerance ISO 406	projection	product family 58NF	CODE JP
ltr	ecn no	dr	date	ISO 1302	ISO 1101		title 1mm SPACING SURFACE MOUNT FPC CONNECTOR (Cat.No. HFW_R-2STA_LF)	
A	J05-0322	H.T	6/3/'05	tolerances unless otherwise specified		mm		
B	J05-0732	H.T	10/28/'05	angles	linear	mm		
C	J06-0413	H.T	10/4/'06			scale X		
				dr	10/4/06		dwg no	sheet 1 of 1 size
				enr	10/4/06		JSA 96455	A4
				chr	10/12/06		type Product Customer Drawing	
				appd	10/12/06			
sheet index	revision	C						Rev. C

SC-HFWR 03 JSA96453
form: A4

CAT. NO. & DIMENSIONS

(NOTE4)	NO. OF CONTACTS (n)	CAT. NO. (NOTE2)	DIMENSIONS (NOTE3)		
			E ± 5	F ± 0.3	G ± 0.1
	4	HFW4R-1/2STAE1LF	28.4	24	—
	5	HFW5R-1/2STAE1LF	28.4	24	—
	6	HFW6R-1/2STAE1LF	28.4	24	—
	7	HFW7R-1/2STAE1LF	28.4	24	—
	8	HFW8R-1/2STAE1LF	28.4	24	—
	9	HFW9R-1/2STAE1LF	28.4	24	—
	10	HFW10R-1/2STAE1LF	28.4	24	—
	11	HFW11R-1/2STAE1LF	28.4	24	—
	12	HFW12R-1/2STAE1LF	28.4	24	—
	13	HFW13R-1/2STAE1LF	28.4	24	—
	14	HFW14R-1/2STAE1LF	28.4	24	—
	15	HFW15R-1/2STAE1LF	36.4	32	28.4
	16	HFW16R-1/2STAE1LF	36.4	32	28.4
	17	HFW17R-1/2STAE1LF	36.4	32	28.4
	18	HFW18R-1/2STAE1LF	36.4	32	28.4
	19	HFW19R-1/2STAE1LF	48.4	44	40.4
	20	HFW20R-1/2STAE1LF	48.4	44	40.4
	21	HFW21R-1/2STAE1LF	48.4	44	40.4
	22	HFW22R-1/2STAE1LF	48.4	44	40.4
	23	HFW23R-1/2STAE1LF	48.4	44	40.4
	24	HFW24R-1/2STAE1LF	48.4	44	40.4
	25	HFW25R-1/2STAE1LF	48.4	44	40.4
	26	HFW26R-1/2STAE1LF	48.4	44	40.4
	27	HFW27R-1/2STAE1LF	48.4	44	40.4
*	28	HFW28R-1/2STAE1LF	48.4	44	40.4
*	29	HFW29R-1/2STAE1LF	48.4	44	40.4
	30	HFW30R-1/2STAE1LF	60.4	56	52.4

CAT. NO.

HFW (n) R - 1 ST A E1 LF
 SERIES
 NO. OF CONTACTS
 RIGHT ANGLE TYPE
 FOR FPC/FFC, CONTACT DIRECTION
 1. LOWER CONTACT TYPE
 2. UPPER CONTACT TYPE
 FOR AUTOMATIC MOUNTING (SMT)
 GOLD PLATING
 TAPE PACKAGING
 LEAD FREE

NOTES

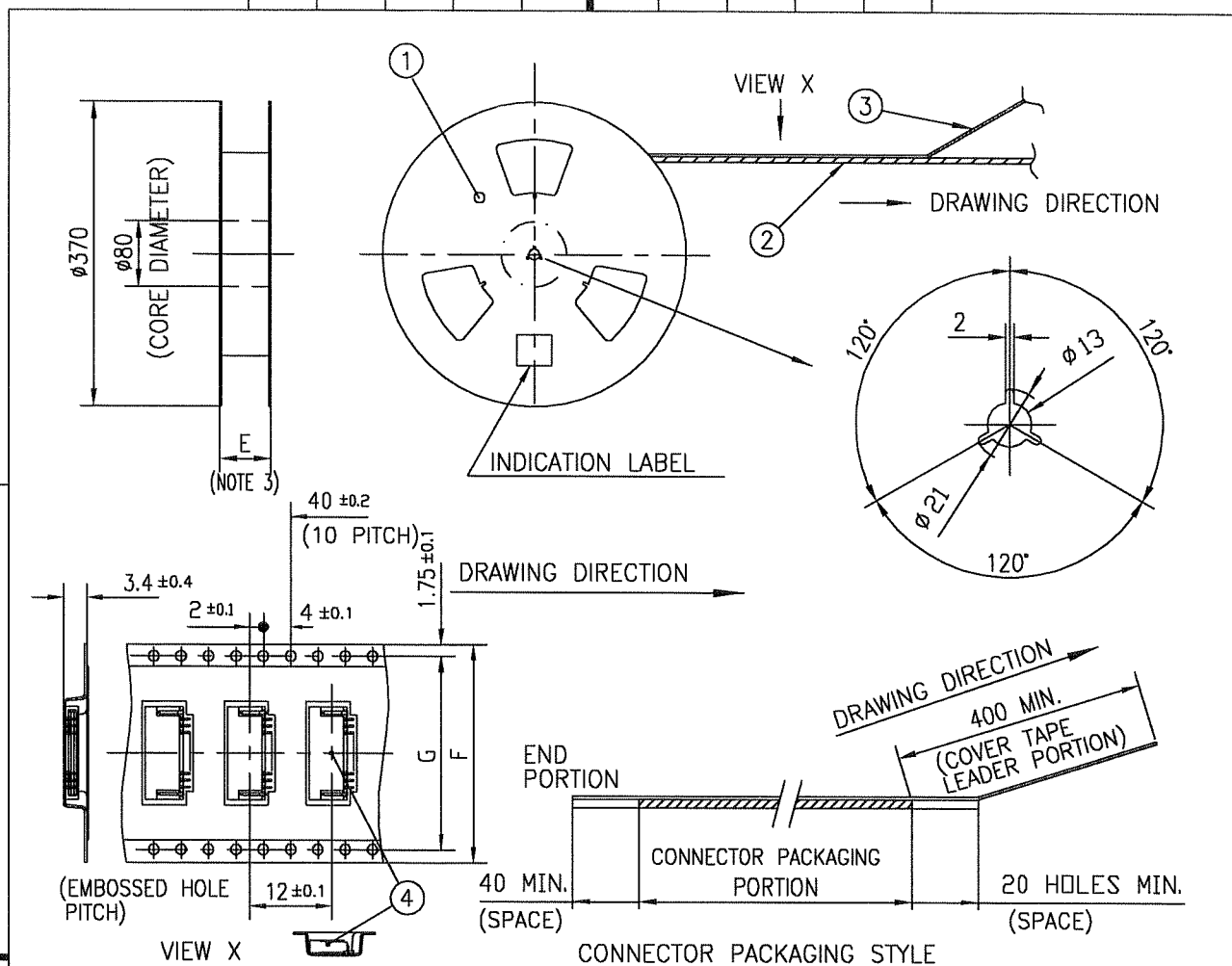
- THIS PRODUCT IS THE CONNECTOR DESIGNED TO TERMINATE FPC AND COPE WITH AUTOMATIC MOUNTING (SMT).
- THIS CATALOG NO. INDICATES PLASTIC TAPE PACKAGED CONNECTOR.
- SEE PART DRAWINGS FOR DIMENSIONS E~G.
- PLEASE CONSULT US IN CASE OF USING PARTS WITH * MARK.

mat'l. code				surface 58/ISO 1302		tolerance ISO 406/ISO 1101		projection		product family 58NF				CODE JP	
ltr	ecn no	dr	date	tolerances unless otherwise specified		mm		scale		title					
A	J05-D322	H.T	6/3/'05	angles	linear	mm		X		CAT. NO. TABLE FOR PLASTIC TAPE PACKAGED 1mm SPACING SMT CONN (Cat.No. HFW__R-1/2STAE1LF)					
B	J06-D413	H.T	10/4/'06							dwg no sheet 1 of 1 size					
				dr	10/10/06					JSA 96456 A4					
				enr	10/10/06					type Product Customer Drawing					
				chr	10/12/06										
				appd	10/12/06										
sheet index		revision sheet		B	1									Rev. B	

SC-HFWR03 JSA96453
form: A4

1

2



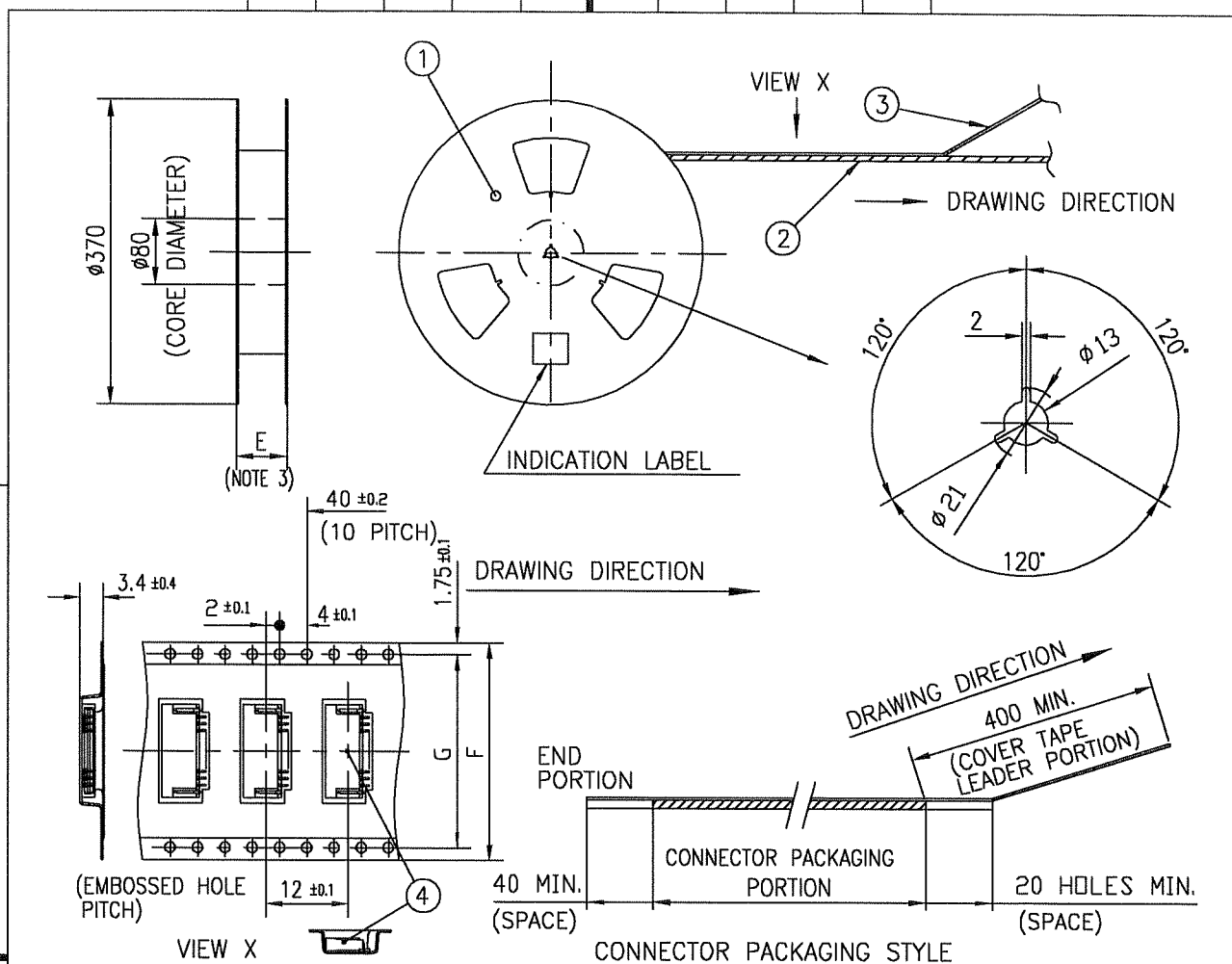
PT. NO.	PARTS NAME	CAT. NO.	MATERIAL	Q'TY	NOTE
1	REEL	_____	CARDBOARD	1	COLOR:WHITE
2	PLASTIC (EMBOSSD) TAPE	_____	PET	_____	COLOR:TRANSPARENCY
3	COVER	_____	POLYESTER	_____	COLOR:TRANSPARENCY
4	CONNECTOR	HFW__R-1STA__LF	SEE ATTACHED DWG.	2000	LOWER CONTACT TYPE

NOTES

- THIS IS PLASTIC TAPE PACKAGED CONNECTOR DESIGNED TO TERMINATE FPC AND COPELS WITH AUTOMATIC MOUNTING (SMT).
- SEE JIS C 0806 (PACKING OF ELECTRONIC COMPONENTS ON CONTINUOUS TAPES (SURFACE MOUNTING DEVICES)) FOR SHAPE AND DIMENSIONS OF PLASTIC (EMBOSSD) TAPE AND REEL.
- E DIMENSION IS PORTION OF THE CORE.

mat'l. code				surface 58 / tolerance ISO 1302 ✓		tolerance ISO 406 ISO 1101		projection		product family 58NF		CODE JP	
ltr	ecn no	dr	date	tolerances unless otherwise specified				mm		title			
A	J05-0322	H.T	6/3/'05	angles linear				mm		1mm SPACING SMT CONNECTOR			
B	J06-0413	H.T	10/4/'06	±5'				scale X		(Cat.No. HFW__R-1STAE1LF)			
				dr				10/4/06		dwg no sheet 1 of 1 size			
				enr				10/4/06		JSA 96457 A4			
				chr				10/12/06		type Product Customer Drawing			
				appd				10/12/06					
sheet index		revision sheet		B 1								Rev. B	

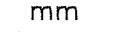
SC-HFWR 03 JSA96453
form: A4



PT. NO.	PARTS NAME	CAT. NO.	MATERIAL	Q'TY	NOTE
1	REEL	_____	CARDBOARD	1	COLOR:WHITE
2	PLASTIC (EMBOSSED) TAPE	_____	PET	_____	COLOR:TRANSPARENCY
3	COVER	_____	POLYESTER	_____	COLOR:TRANSPARENCY
4	CONNECTOR	HFW__R-2STA__-LF	SEE ATTACHED DWG.	2000	UPPER CONTACT TYPE

NOTES

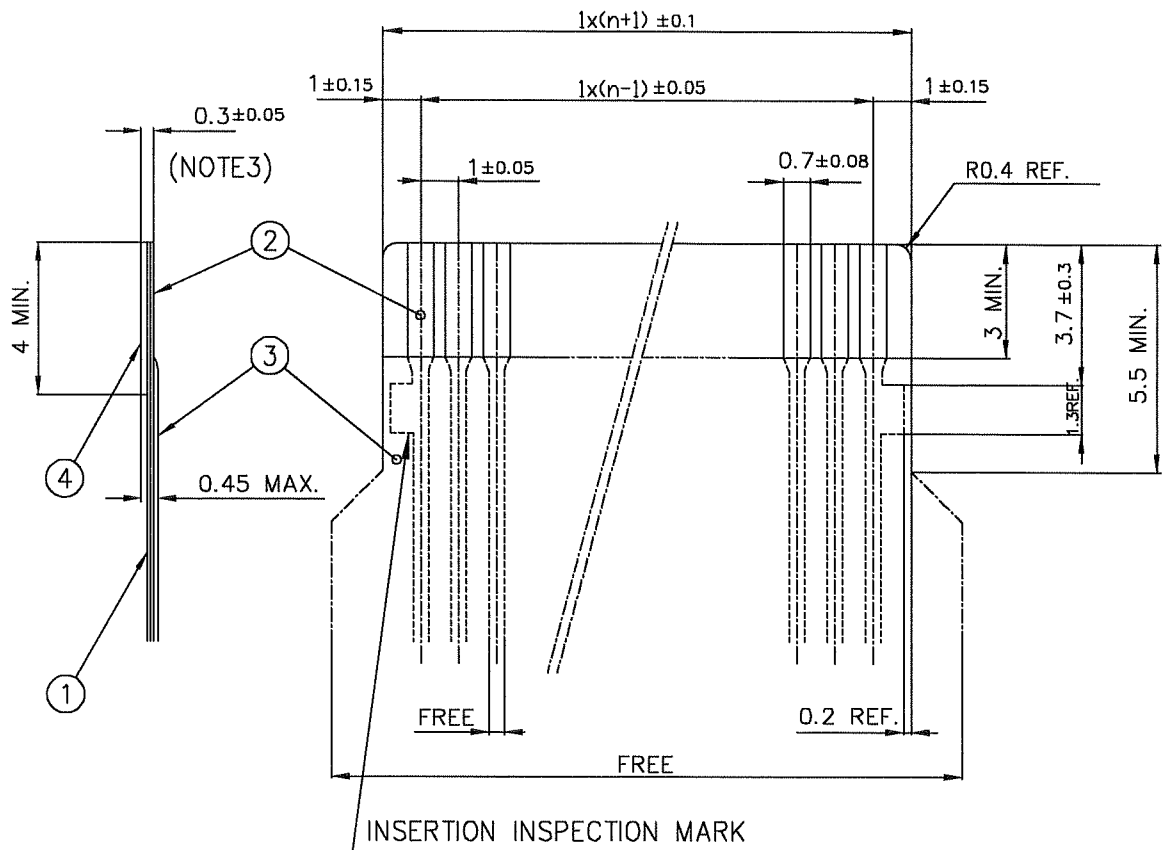
1. THIS IS PLASTIC TAPE PACKAGED CONNECTOR DESIGNED TO TERMINATE FPC AND COPES WITH AUTOMATIC MOUNTING (SMT).
2. SEE JIS C 0806 (PACKING OF ELECTRONIC COMPONENTS ON CONTINUOUS TAPES (SURFACE MOUNTING DEVICES)) FOR SHAPE AND DIMENSIONS OF PLASTIC (EMBOSSED) TAPE AND REEL.
3. E DIMENSION IS PORTION OF THE CORE.

mat'l. code				surface 58 ✓ ISO 1302		tolerance ISO 406 ISO 1101		projection 		product family 58NF				CODE JP							
ltr	ecn no	dr	date	tolerances unless otherwise specified							title 1mm SPACING SMT CONNECTOR (Cat.No. HFW__R-2STAE1LF)										
A	J05-0322	H.T	6/3/'05	angles	linear ±5																
B	J06-0413	H.T	10/4/'06																		
				±5'						scale X	dwg no JSA 96458 sheet 1 of 1 size A4										
				dr	 10/4/06																
				enr	 10/4/06																
				chr	 10/12/06																
				appd	 10/12/06					type Product Customer Drawing											
sheet index	revision	B																			Rev B
	sheet	1																			

SC-HFWR 03 JSA96453
form: A4

RECOMMENDED CABLE (FPC)

n : NO. OF CONDUCTORS



PT. NO.	DESCRIPTION	MATERIAL	THICKNESS (μm)
1	BASE FILM	POLYIMIDE OR POLYESTER OR EQUIVALENT	25
2	CONDUCTOR	COPPER FOIL(PLATING : GOLD)	35
3	OVERLAY	POLYIMIDE OR POLYESTER OR EQUIVALENT	—
4	SUPPORTING TAPE	POLYESTER OR POLYIMIDE OR EQUIVALENT	188

NOTES

1. NO BURR AT EACH PORTION.
2. NO PEELING IN COMMON USE.
3. TOTAL THICKNESS LIMIT OF EACH MATERIAL (INCLUDING ADHESIVE AGENT) IS SPECIFIED.

mat'l. code				surface 58 / tolerance ISO 1302 ✓		tolerance ISO 406 ISO 1101		projection		product family 58NF		CODE JP	
ltr	ecn no	dr	date	tolerances, unless otherwise specified				mm		title			
A	J05-0322	H.T	6/2/'05	angles linear				mm		RECOMMENDED CABLE			
B	J06-0078	H.T	3/1/'06					mm		HFW__R-1/2STA__			
C	J06-0413	H.T	10/4/'06					scale X		dwg no sheet 1 of 1 size			
				dr				FCI		JSA 96459 A4			
				enr						type Product Customer Drawing			
				chr									
				appd									
sheet index	revision	c								Rev. c			