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**Part Number:** [0082245902](#)  
**Status:** **Active**  
**Description:** 2.54mm (.100") Pitch Round Conductor Flat Cable - 24 AWG (7 x 32) Stranded, Topcoat, 2 Circuits, Reel 30.48m (100.0' ) Length

**Documents:**

[Drawing \(PDF\)](#) [RoHS Certificate of Compliance \(PDF\)](#)

**Agency Certification**

CSA LR61126  
 UL E61522

**General**

Product Family Cable  
 Series [8997](#)  
 Crimp Quality Equipment Yes  
 Geographic Area Asia  
 Product Name Ribbon

**Physical**

Cable Length 30.48m (100.0' )  
 Circuits (Loaded) 2  
 Insulation PVC  
 Packaging Type Reel  
 Pitch - Term. Interface (in) 0.100 In  
 Pitch - Term. Interface (mm) 2.54 mm  
 Temperature Range - Operating -20°C to +105°C  
 Wire Size AWG 24  
 Wire/Cable Type (7x32) Stranded, Topcoat

**Electrical**

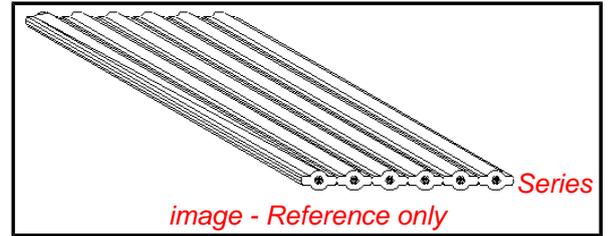
Current - Maximum per Contact N/A  
 Voltage - Maximum 300V

**Material Info**

Old Part Number 8997-02-100B

**Reference - Drawing Numbers**

Sales Drawing SD-8997-001



**EU RoHS**

**ELV and RoHS Compliant**  
**REACH SVHC**  
 Not Reviewed  
**Halogen-Free Status**  
 Not Reviewed

**China RoHS**



**Need more information on product environmental compliance?**

Email [productcompliance@molex.com](mailto:productcompliance@molex.com)  
 For a multiple part number RoHS Certificate of Compliance, [click here](#)

Please visit the [Contact Us](#) section for any non-product compliance questions.

**Search Parts in this Series**

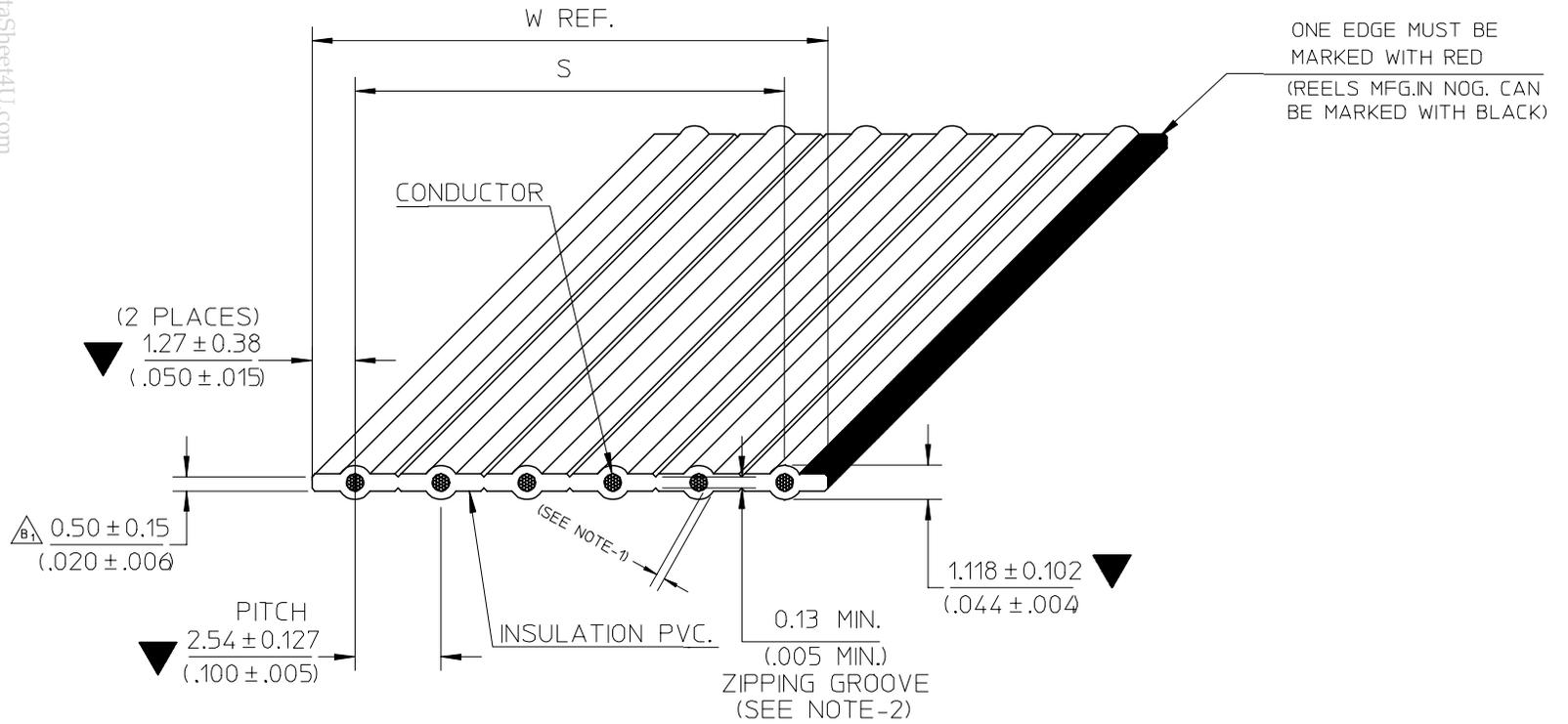
[8997Series](#)

**Use With**

[70400](#) C-Grid SL™ IDT Connector Assembly.  
[70475](#) SL™ IDT Connector Assembly.  
[7720](#) KK® IDT Double Cantilever Contact

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- NOTE :**
1. THE CABLE SHALL HAVE A MINIMUM OF 0.178mm. (.007") THICKNESS INSULATION AT ANY POINT
  2. RIP TEST:
    - THE 0.13mm. (.005") ZIPPING GROOVE SHALL BE CAPABLE OF BEING RIPPED BY HAND WITHIN THE RECESS, WITHOUT EXPOSING THE ADJACENT CONDUCTORS
  3. RoHS AND LEAD FREE COMPLIANT
  4. SPECIAL REQUIREMENT: N/A

A	E-07-0748	B <sub>4</sub> : ADD NON-OPERATING TEMP.	07/09/26
		B <sub>3</sub> : ADD SOLDERING CONDITION	
B	N/A	B <sub>2</sub> : CHANGE ELECTRICAL	06/07/18
		B <sub>1</sub> : CHANGE WEB THICKNESS	
A	EC NO.	DETAIL	DATE

SEE CHANGE DETAIL EC NO: THL2008-0015 DRWN: CPANSAKHOM 2007/11/28 CHKD: DNARINTARA 2007/11/29 APPR: SVIRATJAPOL 2007/12/04	DESCRIPTION	QUALITY SYMBOLS	GENERAL TOLERANCES (UNLESS SPECIFIED)	DIMENSION STYLE		SCALE	DESIGN UNITS	THIRD ANGLE PROJECTION		
		▼=3 ▽=0		MM/IN		NTS	INCH			
				4 PLACES	± ---	± ---	DRAWN BY		DATE	TITLE
				3 PLACES	± ---	± ---	CPANSAKHOM		2006/07/18	FCB ROUND CONDUCTOR 2.54MM(.100)CENTER PVC. 24AWG STRANDED TOPCOATED
				2 PLACES	± ---	± ---	CHECKED BY		DATE	
1 PLACE	± ---	± ---	PMEECHAI	2006/07/18	APPROVED BY	DATE	MATERIAL NO.	DOCUMENT NO.	SHEET NO.	
ANGULAR ± ---°		DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS		SVIRATJAPOL 2006/07/18		MOLEX INCORPORATED		SD-8997-001	1 OF 3	

SPECIFICATIONS

PHYSICAL

CONDUCTOR SPACING ----- 2.54 (.100")  $\overline{C}$  TO  $\overline{C}$   
 WIRE GAUGE ----- 24 AWG(7/32) STRANDED TOPCOATED  
 INSULATION ----- P.V.C GRAY (LEAD FREE)

AGENCY

U.L. STYLE NO. ----- 2651  
 TEMPERATURE RATING ----- -20°C TO 105°C  
 VOLTAGE RATING ----- 300V.MAX.  
 FLAMMABILITY RATING ----- VW-1

$\triangle_{B_2}$  ELECTRICAL

CONDUCTOR RESISTANCE (D.C.) ----- 27m. OHMS/FT. MAX.  
 CHARACTERISTIC IMPEDANCE ----- 134 OHMS NOM. (GS)  
 ----- 114 OHMS NOM. (GSG)  
 CAPACITANCE ----- 6.6 pF/FT. NOM. (GS)  
 ----- 12.0 pF/FT. NOM. (GSG)  
 PROPAGATION DELAY ----- 1.4 ns/FT. NOM.  
 INSULATION RESISTANCE ----- 10M OHMS (10FT. SAMPLE)  
 DIELECTRIC WITHSTAND VOLTAGE ----- 2000 VRMS/MINUTE

GENERAL

$\triangle_{B_4}$  NON-OPERATING TEMPERATURE ----- -20°C TO 105°C  
 FAULTS AND/OR SPLICES ----- 1/REEL MAX. 100 $^{+3}_0$  FT. (30.48 $^{+0.914}_0$  M.)/REEL  
 $\triangle_{B_3}$  SOLDERING CONDITION ----- 20FT. (6.096M.) MIN. LENGTH

SOLDER TEMPERATURE ----- 260°C. MAX.  
 SOLDERING TIME ----- 3 SECOND, MAX.  
 INSULATION SHRINK ----- 2MM. NOM.

SEE CHANGE DETAIL EC NO: THL2008-0015 DRWN: CPANSAKHOM 2007/11/28 CHKD: DNARINTARA 2007/11/29 APPR: SVIRATJAPOL 2007/12/04	DESCRIPTION REV	QUALITY SYMBOLS		GENERAL TOLERANCES (UNLESS SPECIFIED)		DIMENSION STYLE		SCALE	DESIGN UNITS	THIRD ANGLE PROJECTION		
		$\nabla =$ $\triangle =$		mm	INCH	MM/IN		NTS	INCH			
		4 PLACES	±----	±----	DRAWN BY		DATE	TITLE				
		3 PLACES	±----	±----	CPANSAKHOM		2006/07/18	FCB ROUND CONDUCTOR 2.54MM(.100)CENTER PVC. 24AWG STRANDED TOPCOATED MOLEX INCORPORATED				
		2 PLACES	±----	±----	CHECKED BY		DATE					
1 PLACE	±----	±----	PMEECHA I		2006/07/18	APPROVED BY		DATE	DOCUMENT NO.			
ANGULAR ±----°			SVIRATJAPOL		2006/07/18	MATERIAL NO.		SD-8997-001		SHEET NO.		
DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS						SEE CHART		2 OF 3				
						SIZE $\triangle_{A_4}$		THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION				

CHART A  
DIMENSIONS MM. (INCHES)

ENGINEERING NO.	ORDER NO.	NO. OF CONDUCTOR	DIMENSION S	DIM. W (REF.)
8997-02-100B	82-24-5902	2	2.54±0.127(.100±.005)	5.08 (.200)
↑ -03- ↑	↑ 03	3	5.08±0.20 (.200±.008)	7.62 (.300)
-04-	04	4	7.62±0.30 (.300±.012)	10.16 (.400)
-05-	05	5	10.16±0.33 (.400±.013)	12.70 (.500)
-06-	06	6	12.70±0.33 (.500±.013)	15.24 (.600)
-07-	07	7	15.24±0.33 (.600±.013)	17.78 (.700)
-08-	08	8	17.78±0.33 (.700±.013)	20.32 (.800)
-09-	09	9	20.32±0.33 (.800±.013)	22.86 (.900)
-10-	10	10	22.86±0.33 (.900±.013)	25.40 (1.000)
-11-	11	11	25.40±0.33 (1.000±.013)	27.94 (1.100)
-12-	12	12	27.94±0.33 (1.100±.013)	30.48 (1.200)
-13-	13	13	30.48±0.33 (1.200±.013)	33.02 (1.300)
-14-	14	14	33.02±0.33 (1.300±.013)	35.56 (1.400)
-15-	15	15	35.56±0.33 (1.400±.013)	38.10 (1.500)
-16-	16	16	38.10±0.33 (1.500±.013)	40.64 (1.600)
-17-	17	17	40.64±0.33 (1.600±.013)	43.18 (1.700)
-18-	18	18	43.18±0.33 (1.700±.013)	45.72 (1.800)
↓ -19- ↓	↓ 19	19	45.72±0.33 (1.800±.013)	48.26 (1.900)
8997-20-100B	82-24-5920	20	48.26±0.33 (1.900±.013)	50.80 (2.000)

ENGINEERING NO.

8997-XX-XXXX  
A B C D

A : CABLE 2.54mm. (.100") CENTERS 24AWG STRANDED TOPCOATED  
 B : CONDUCTOR SIZE ( AVAILABILITY 2 THROUGH 20 )  
 C : CABLE LENGTH 100FT. (30.48M.)  
 D : A = INCHES  
 B = FEET

SEE CHANGE DETAIL EC NO: THL2008-0015 DRWN: CPANSAKHOM 2007/11/28 CHKD: DNARINTARA 2007/11/29 APPR: SVIRATJAPOL 2007/12/04	QUALITY SYMBOLS 	GENERAL TOLERANCES (UNLESS SPECIFIED)		DIMENSION STYLE MM/IN	SCALE NTS	DESIGN UNITS INCH	THIRD ANGLE PROJECTION		
			mm	INCH	DRAWN BY CPANSAKHOM	DATE 2006/07/18	TITLE FCB ROUND CONDUCTOR 2.54MM(.100)CENTER PVC. 24AWG STRANDED TOPCOATED		
		4 PLACES	± ---	± ---	CHECKED BY PMEECHAI	DATE 2006/07/18	MOLEX INCORPORATED		
		3 PLACES	± ---	± ---	APPROVED BY SVIRATJAPOL	DATE 2006/07/18	DOCUMENT NO. SD-8997-001	SHEET NO. 3 OF 3	
		2 PLACES	± ---	± ---	DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS				
1 PLACE	± ---	± ---	ANGULAR ± ---°		MATERIAL NO. SEE CHART				
			SIZE THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION						