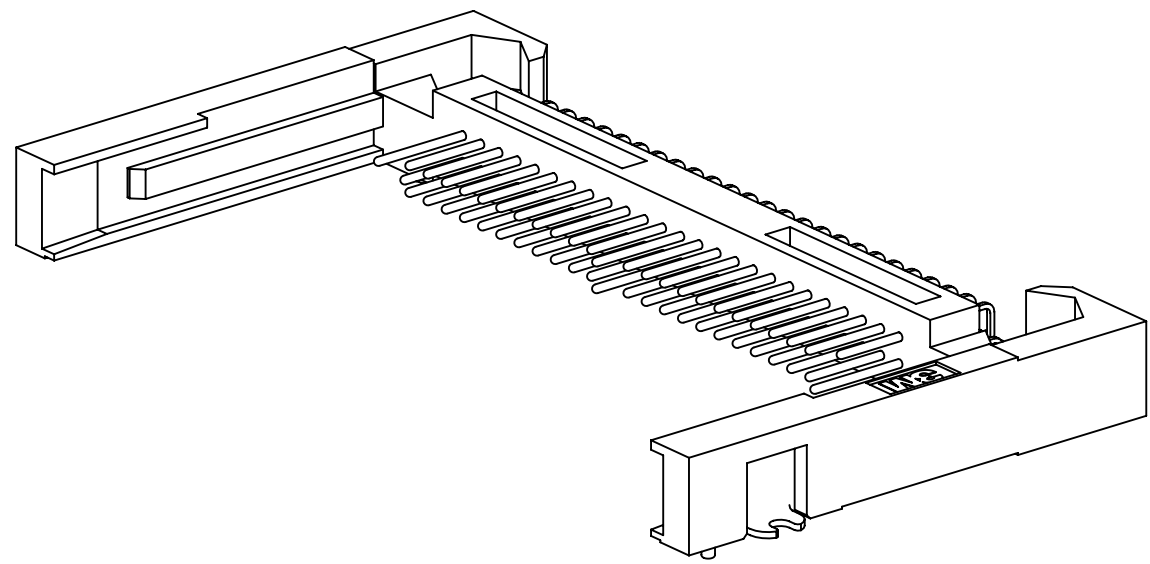
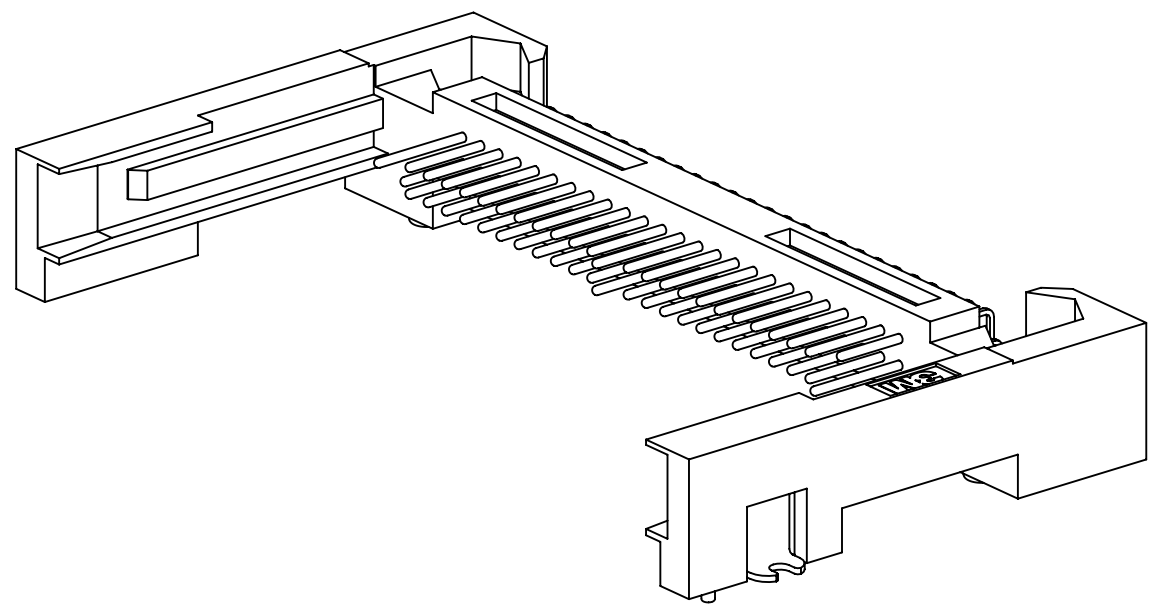


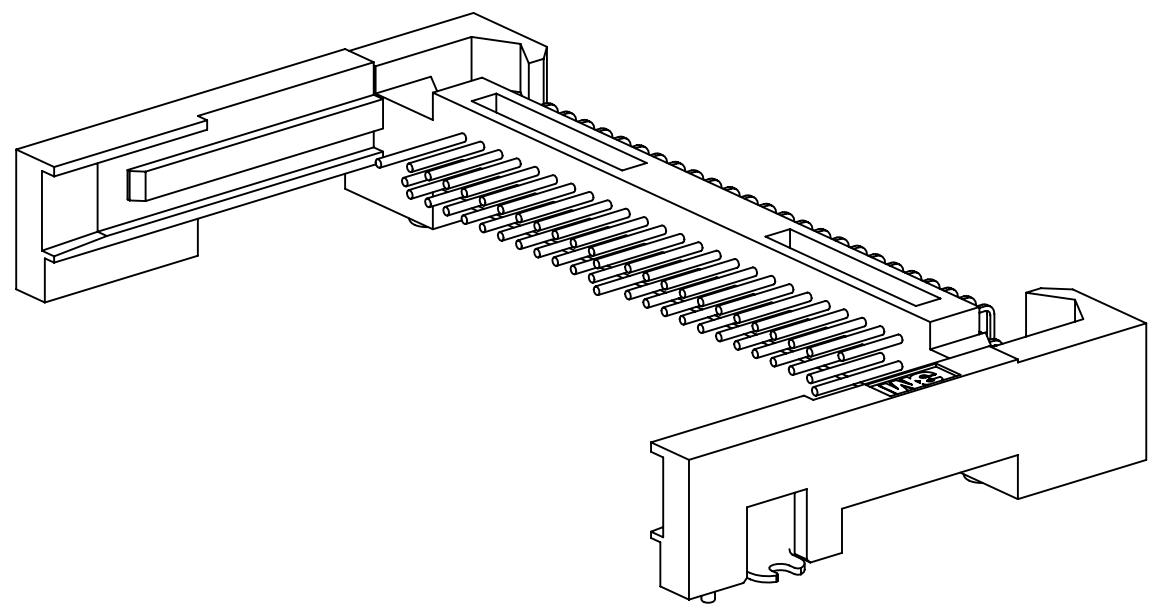
3M™ CF CARD HEADER, 7E50 SERIES
COMPACTFLASH™ TYPE II, SURFACE MOUNT



N7E50-Q516-XX-40
WITHOUT STANDOFF



N7E50-Q516-XX-50
WITH STANDOFF



N7E50-R516-XX-50
INVERSE
WITH STANDOFF

- * HEADERS MATE WITH BOTH COMPACTFLASH™ TYPE I AND TYPE II CARDS.
- * POLARIZATION OPTIONS FOR TOP OR BOTTOM BOARDMOUNT.
- * EXTENDED GUIDE RAILS ENABLE ACCURATE AND EASY CARD INSERTION.
- * SINGLE ROW SURFACE MOUNT SOLDER TAILS FACILITATE AUTO PLACEMENT AND IR SOLDERING.
- * OPTION 2mm BOARD STANDOFF ENABLES BOARD POPULATION.
- * MEETS CFA STANDARDS FOR KNOWN COMPATIBILTY AND RELIABILITY.



2 PHYSICAL :

INSULATION: HIGH TEMPERATURE THERMOPLASTIC
MATERIAL: UL94V-0
FLAMMABILITY: COLOR: BEIGE
CONTACT: MATERIAL: COPPER ALLOY
PLATING: UNDER PLATING: 2.03µm [80µ"] NICKEL-OVERALL
WIPING AREA: 0.38µm [15µ"] OR 0.76µm [30µ"] GOLD
SOLDER TAILS: 3.81µm [150µ"] MATTE TIN OR GOLD FLASH
MARKINGS: 3M LOGO

2 ELECTRICAL :

CURRENT RATING: 0.5 A
INSULATION RESISTANCE: 10⁹ MΩ AT 500 V_{DC}
WITHSTANDING VOLTAGE: 500V_{AC} FOR 1 MINUTE

2 ENVIRONMENTAL :

TEMPERATURE RATING: -40°C TO +85°C
PROCESS RATING: MAXIMUM 260°C, PER J-STD-020C
MOISTURE SENSITIVITY LEVEL: 1 (PER J-STD-020C)

ORDERING INFORMATION
N7E50-X516XX-XX-WF

Q = CF I & II, 18.70 mm, NORMAL TYPE, EJECTOR NOT ACCEPTABLE
R = CF I & II, 18.70 mm, INVERSE TYPE, EJECTOR NOT ACCEPTABLE

PLATING OPTIONS:
RA = 0.38µm [15µ"] GOLD WITH MATTE TIN TAIL
RB = 0.76µm [30µ"] GOLD WITH MATTE TIN TAIL
EA = 0.38µm [15µ"] GOLD WITH Au FLASH TAIL
EB = 0.76µm [30µ"] GOLD WITH Au FLASH TAIL

PACKAGING OPTIONS:
BLANK = TRAYS
WF = TAPE AND REEL

BOARD STANDOFF:
40 = NONE (NORMAL TYPE ONLY)
50 = 2.00 mm [.079"]

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NOTES

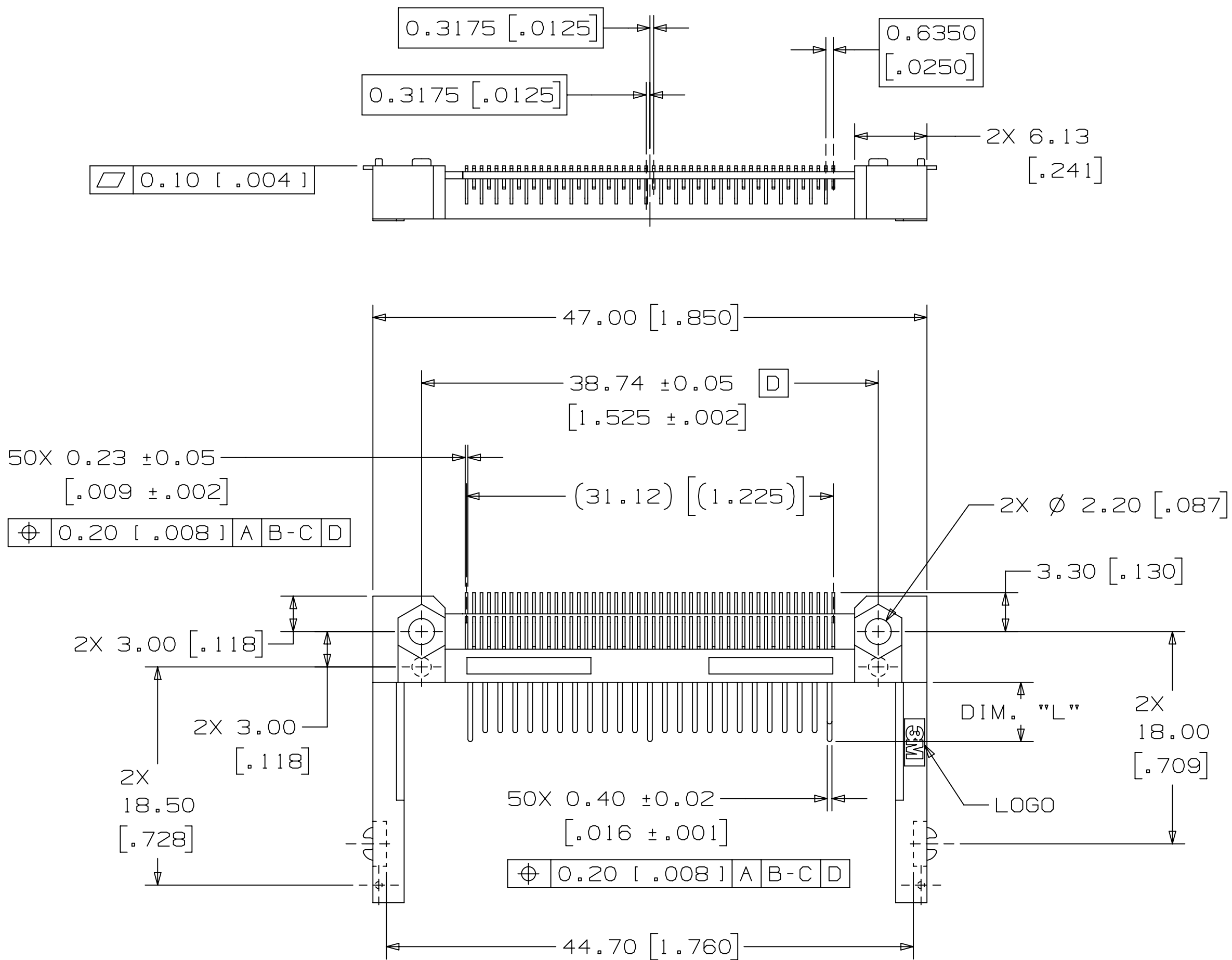
1. REGULATORY INFORMATION:
VISIT 3M.com/regs
2. UNLESS OTHERWISE NOTED,
REFERENCES TO INDUSTRY
SPECIFICATIONS ARE INTENDED
TO INDICATE SUBSTANTIAL
COMPLIANCE TO THE MATERIAL
ELEMENTS OF THE SPECIFICATION.
SUCH REFERENCES SHOULD NOT BE
CONSTRUED AS A GUARANTEE OF
COMPLIANCE TO ALL REQUIREMENTS
IN A GIVEN SPECIFICATION.

D	119747	FEB 13,2025	JNC	FJR
C	0016604	NOV 05,2007	MWL	SN
B	0014044	JUL 03,2007	ARM	
A	AT2248	MAR 24,2007		
REV	ECO	ISSUE DATE AND DESCRIPTION	DRFT	CHKD
DRFT	C	ASTIGLIONE	FEB 13,2025	MRS
CHKD		DATE	APPRV	DATE
			F. RODRIGUEZ	FEB 13,2025
© 3M COPYRIGHT 2025				
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TITLE				
CF CARD HEADER, COMPACTFLASH, TYPE II, SMT				
CAGE NUMBER	SIZE	DRAWING NO.	REV.	
D	7E50	78-5100-2082-5	D	
MODEL	7E50	DET	YES	NO
		SHT	1	OF 4

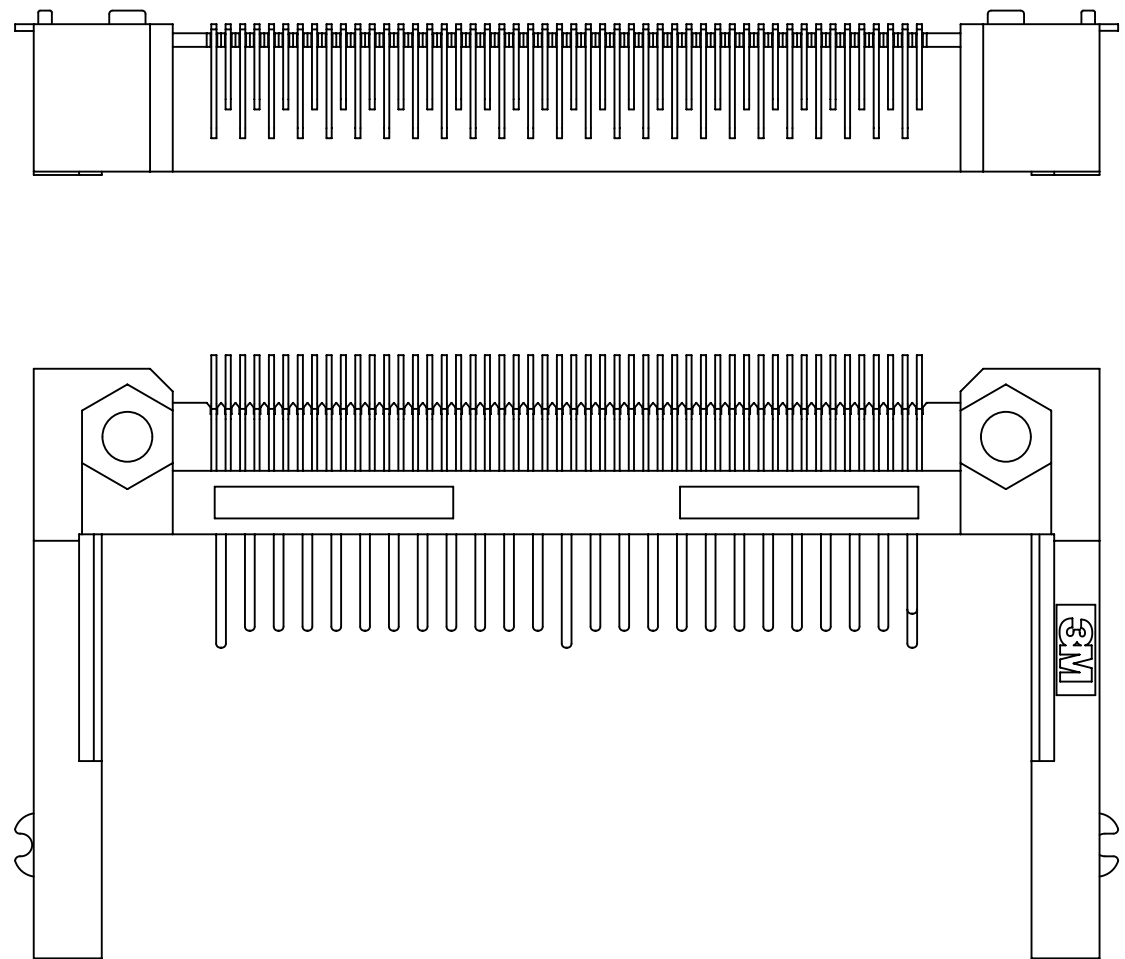
DIMENSIONS: MM [INCHES]
[INCHES] IS FOR REF. ONLY

DESIGN REFERENCE	NEXT ASSEMBLY
AXIS CODES	
DIVISION	DIVISION CODE
DO NOT SCALE DRAWING	DEPP
THIRD ANGLE PROJECTION	TOLERANCES EXCEPT AS NOTED
INTERPRET PER ASME Y14.5 - 2018	INCHES
MAX SURFACE ROUGHNESS	MILLIMETERS
ALL SURFACES	0 ±.2
MARKED ONLY	0 ±0.3
	0.00 ±0.15
	0.000 ±0.005
	ANGLES

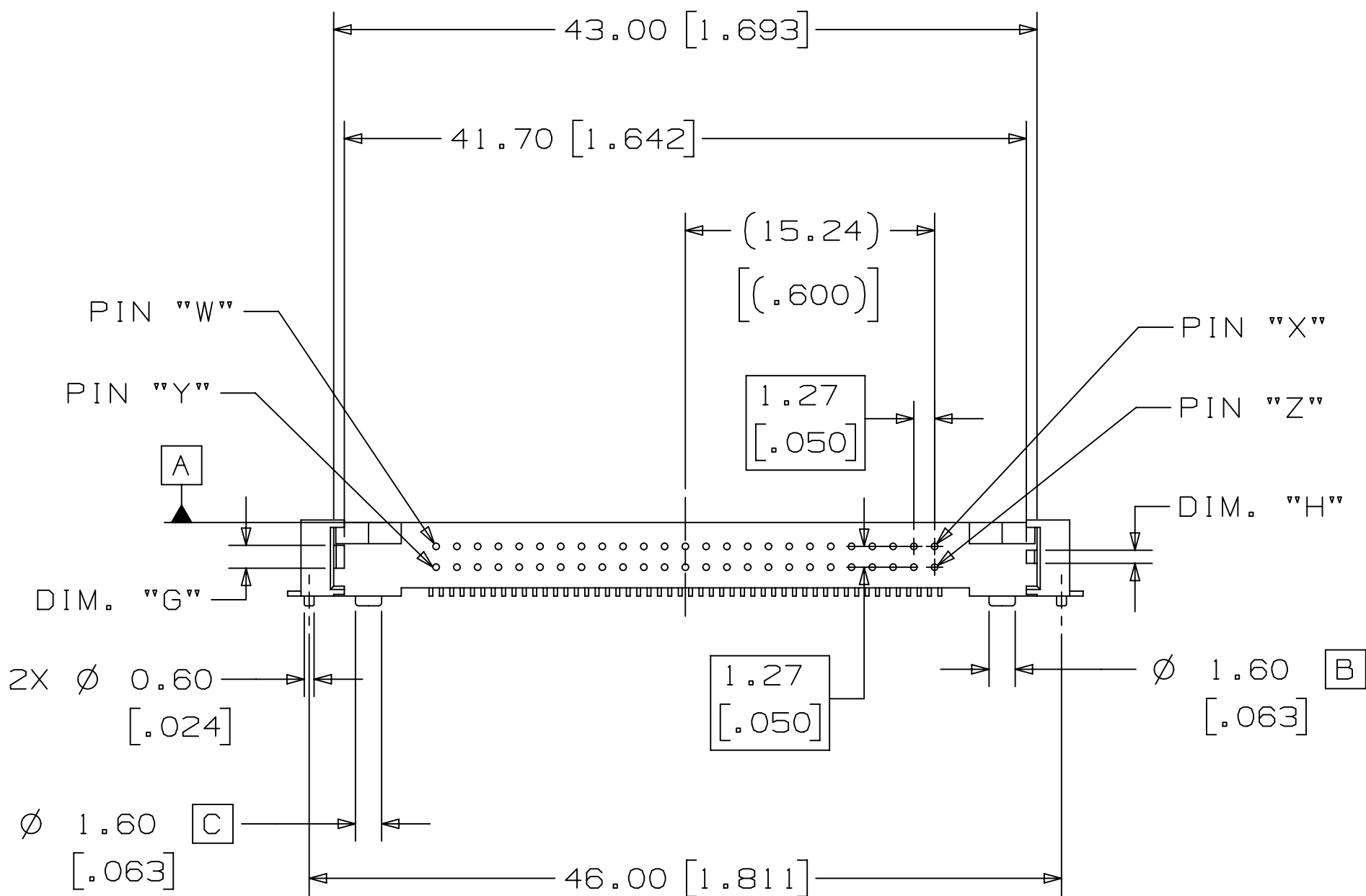
3M™ CF CARD HEADER, 7E50 SERIES
COMPACTFLASH™ TYPE II, SURFACE MOUNT



HEADER WITHOUT
STANDOFF



HEADER WITH
STANDOFF



PIN FUNCTION	DIM. "L" PIN LENGTH	PIN POSITION
DETECT	3.50 mm [.138]	25, 26
GENERAL USE	4.25 mm [.167]	ALL OTHER PINS
POWER	5.00 mm [.197]	1, 13, 38, 50

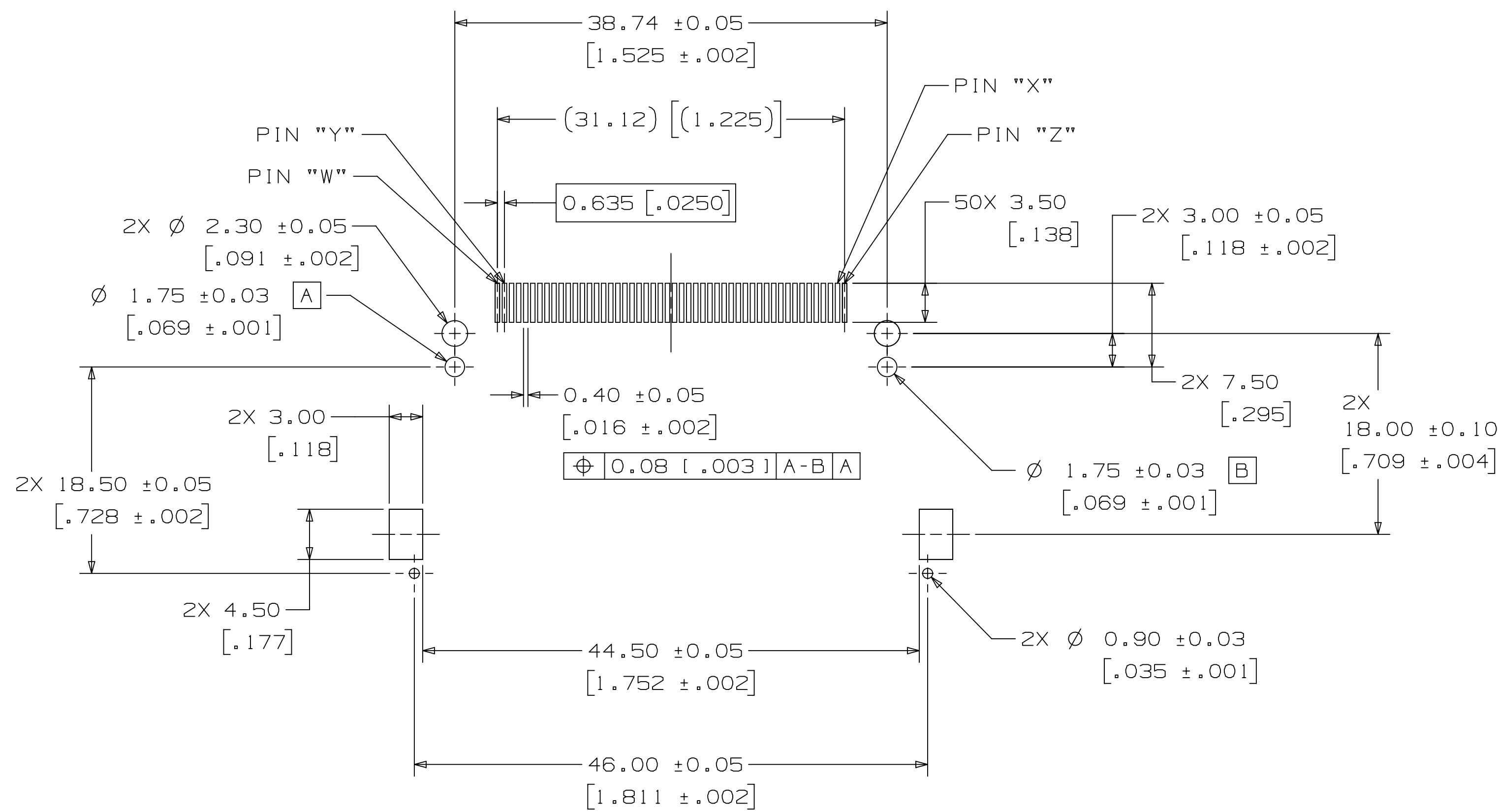
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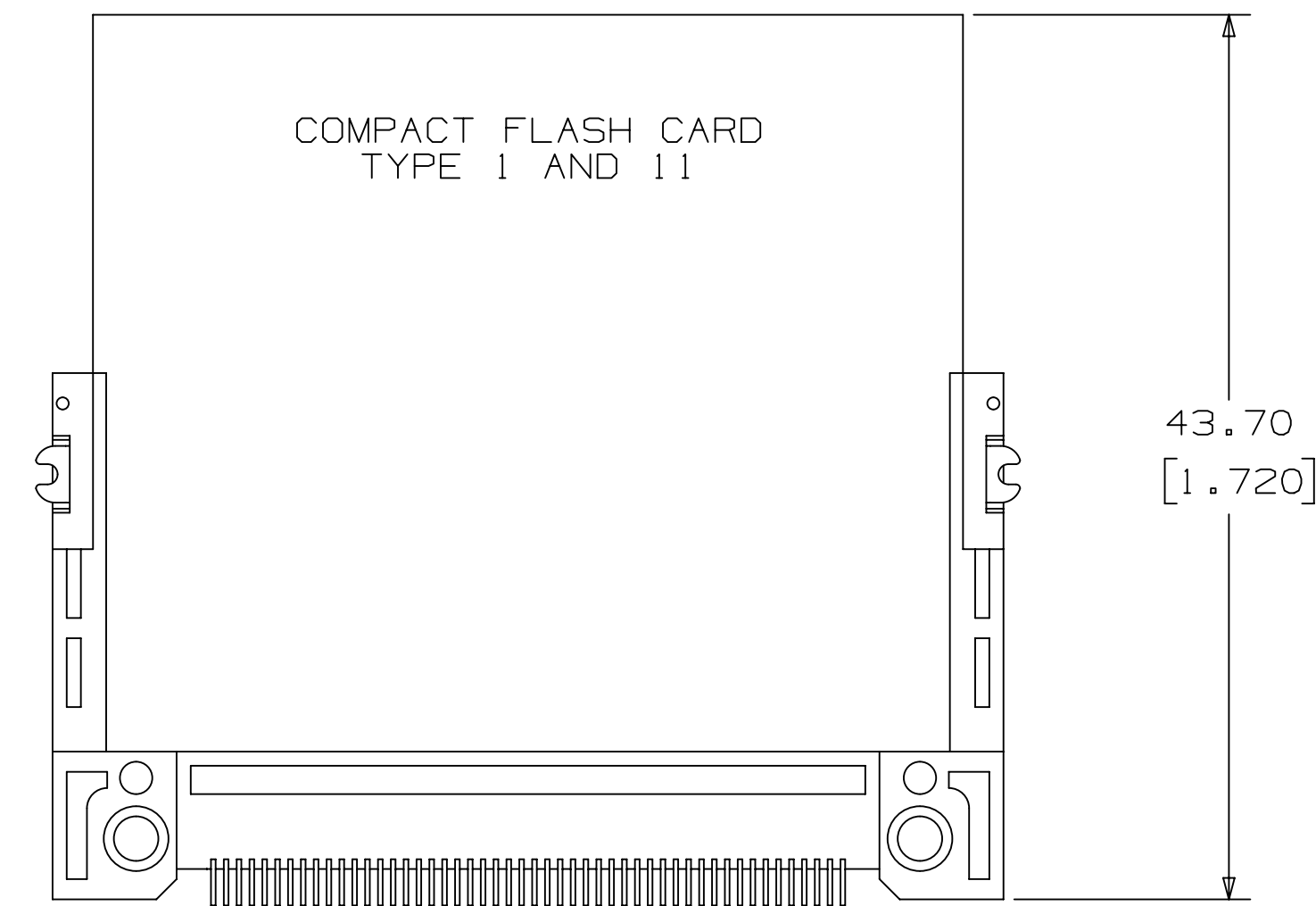
DESIGN REFERENCE		NEXT ASSEMBLY		REV	ECO	ISSUE DATE AND DESCRIPTION		DRFT	CHKD
XREF CODES		DIVISION CODE DEPP		DRFT	CASTIGLIONE	DATE	FEB 13, 2025	MFR	DATE
DIVISION		TOLERANCES EXCEPT AS NOTED		CHKD		DATE	FEB 13, 2025	APPRV	DATE
DO NOT SCALE DRAWING		THIRD ANGLE PROJECTION		3M		3M Center St. Paul, MN 55144		© 3M COPYRIGHT 2025	
MAX. SURFACE ROUGHNESS		INTERPRET PER ASME Y14.5 - 2018		TITLE		CF CARD HEADER, COMPACTFLASH, TYPE II, SMT		This document and the information it contains are 3M property and may not be reproduced or further distributed without 3M permission, or used or disclosed other than for 3M authorized purposes. All rights reserved.	
MARKED ONLY		CAGE NUMBER		SIZE		DRAWING NO.		REV.	
		D		7E50		78-5100-2082-5		D	
		MODEL		DET		LISTS		YES NO	
						SHT 2 OF 4			

3M™ CF CARD HEADER, 7E50 SERIES
COMPACTFLASH™ TYPE II, SURFACE MOUNT

PART NUMBER	DIM. "E"	DIM. "F"	DIM. "G"	DIM. "H"	PIN "W"	PIN "X"	PIN "Y"	PIN "Z"
N7E50-Q516XX-40	NO STANDOFF	4.65 [.183]	1.40 [.055]	0.80 [.031]	PIN 1	PIN 25	PIN 26	PIN 50
N7E50-Q516XX-50	2.00 [.079]	6.65 [.262]	1.40 [.055]	0.80 [.031]	PIN 1	PIN 25	PIN 26	PIN 50
N7E50-R516XX-50	2.00 [.079]	6.65 [.262]	0.80 [.031]	1.40 [.055]	PIN 50	PIN 26	PIN 25	PIN 1



PC BOARD LAYOUT



CARD INSERTION

D	119747	FEB 13,2025	JNC	FJR
		REVISED & REDRAWN		
C	0016604	NOV 05,2007	MWL	SN
		REMOVE TIN LEAD & ADD GOLD FLASH		
B	0014044	JUL 03,2007	ARM	
		ADD NEW MATERIAL		
A	AT2248	MAR 24,2007		
		MIGRATED FROM DIFFERENT DATABASE		
REV	ECO	ISSUE DATE AND DESCRIPTION	DRFT	CHKD
DRFT	CAS1GLIONE	DATE FEB 13,2025	MFG	DATE
CHKD		DATE	APPR. F. RODRIGUEZ	DATE FEB 13,2025

DESIGN REFERENCE				NEXT ASSEMBLY				REV		ECO		ISSUE DATE AND DESCRIPTION				DRFT		CHKD	
ACROSS CODES								DRFT		CASTIGLIONE		DATE				FEB 13, 2025		MFG	
								CHKD				DATE						APPRV.	
																		F. RODRIGUEZ	
																		DATE	
																		FEB 13, 2025	
DIVISION				DIVISION CODE				DEPP											
DO NOT SCALE DRAWING				SCALE				TOLERANCES EXCEPT AS NOTED		3M		3M Center St. Paul, MN 55144				© 3M COPYRIGHT 2025 This document and the information it contains are 3M property and may not be reproduced or further distributed without 3M permission, or used or disclosed other than for 3M authorized purposes. All rights reserved.			
				INCHES				TITLE											
THIRD ANGLE PROJECTION				MILLIMETERS				CF CARD HEADER, COMPACTFLASH, TYPE I I, SMT											
INTERPRET PER ASME Y14.5 - 2018				MAX SURFACE ROUGHNESS				CAGE NUMBER		SIZE		DRAWING NO.				REV.			
☒ ALL SURFACES				0 .00 ±				D		D		5100-2082-5				D			
☐ MARKED ONLY				0 .00 ± 0.3				MODEL		7550						DET.			
				0 .00 ± 0.15												LISTS			
				0 .00 ± 0.005												YES			
				ANGLES ±												NO			
																SHT 3 OF 4			

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D	119747	FEB 13, 2025 REVISED & REDRAWN	JNC	FJR
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ADDRESS CODES				DRFT	CASTIGLIONE	DATE	FEB 13, 2025	WFO	DATE
				CHKD		DATE		F. RODRIGUEZ	DATE FEB 13, 2025
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THIRD ANGLE PROJECTION		TOLERANCES EXCEPT AS NOTED		INCHES		TITLE CF CARD HEADER, COMPACTFLASH, TYPE II, SMT			
INTERPRET PER ASME Y14.5 - 2018		MILLIMETERS		DIN 9137					
MAX SURFACE ROUGHNESS		FLAT SURFACES		ANGLES		CAGE NUMBER		SIZE	DRAWING NO.
MATCHED SURFACES		MARKED SURFACES		MODEL		7E50		D 78-5100-2082-5	REV.
MARKED SURFACES		MARKED SURFACES		7E50		DET LISTS		YES YES NO	SHT 4 OF 4

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