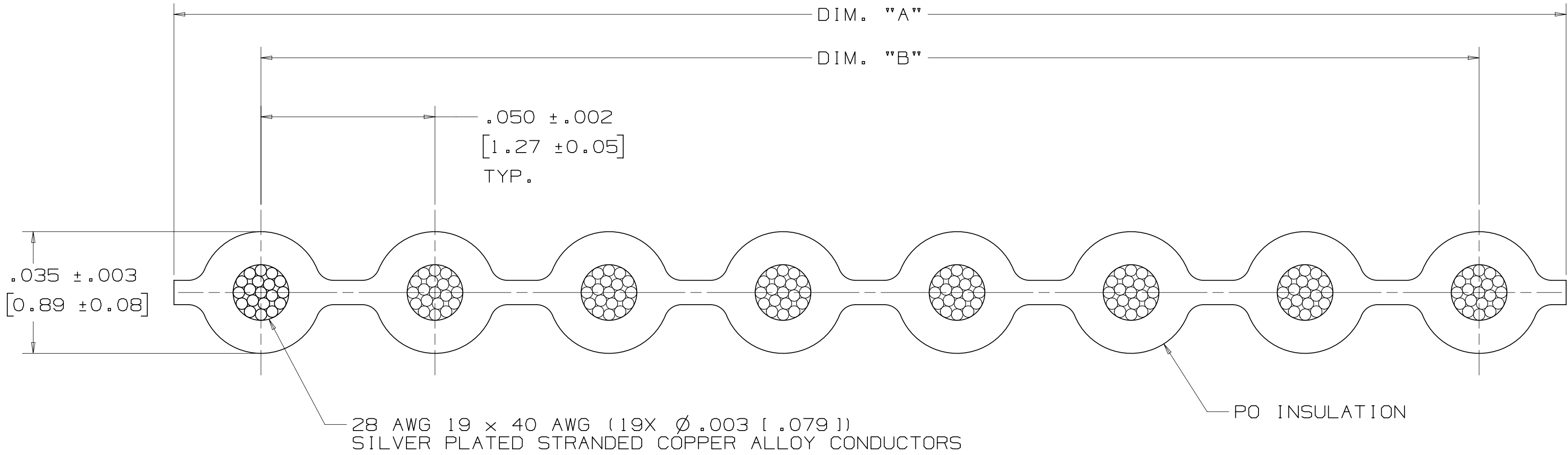


3M™ HIGH FLEX LIFE FLAT CABLE, HF319 SERIES
.050", 28 AWG STRANDED, HIGH FLEX LIFE, HALOGEN FREE PO



Note: Available in standard 100 ft and 300 ft rolls, please specify when ordering.
Contact 3M for availability of additional conductor counts and/or custom roll lengths.

ORDERING INFORMATION

X HF319/XX XX

BLANK = STANDARD
C = CANADIAN

NUMBER OF CONDUCTORS
(SEE TABLE 1)

BLANK = STANDARD
SF = SPLICE FREE

ROLLING FLEX CYCLES PER
EIA-364-41

RADIUS	MINIMUM CYCLES
1/2"	18 MILLION
3/4"	113 MILLION

ALL CYCLES WERE PERFORMED AT AMBIENT
CONDITIONS.

TABLE 1
DIMENSION CHART

NUMBER OF CONDUCTORS	3M PART NUMBER	DIMENSION "A" ± AS NOTED	DIMENSION "B" (SEE NOTE 2)
6	HF319/06	0.300"±0.010"	0.250"±0.007"
9	HF319/09	0.450"±0.010"	0.400"±0.007"
10	HF319/10	0.500"±0.010"	0.450"±0.007"
14	HF319/14	0.700"±0.010"	0.650"±0.007"
15	HF319/15	0.750"±0.010"	0.700"±0.007"
16	HF319/16	0.800"±0.015"	0.750"±0.011"
20	HF319/20	1.000"±0.015"	0.950"±0.011"
24	HF319/24	1.200"±0.015"	1.150"±0.011"
25	HF319/25	1.250"±0.015"	1.200"±0.011"
26	HF319/26	1.300"±0.015"	1.250"±0.011"
30	HF319/30	1.500"±0.020"	1.450"±0.015"
34	HF319/34	1.700"±0.020"	1.650"±0.015"
36	HF319/36	1.800"±0.020"	1.750"±0.015"
37	HF319/37	1.850"±0.020"	1.800"±0.015"
40	HF319/40	2.000"±0.020"	1.950"±0.015"
50	HF319/50	2.500"±0.020"	2.450"±0.015"
60	HF319/60	3.000"±0.020"	2.950"±0.015"
64	HF319/64	3.200"±0.020"	3.150"±0.015"

TABLE 2
ELECTRICAL CHARACTERISTICS

VOLTAGE RATING	USA: 300V, CANADA: 150V, EU: 50V	
INSULATION RESISTANCE	PRIMARY CABLE >1 X 10 ¹⁰ Ω/10 FT [3 m]	
	UNBALANCED	BALANCED
CHARACTERISTIC IMPEDANCE	100 Ω	169 Ω
CAPACITANCE	15.0 pF/ft [49.2 pF/m]	8.4 pF/ft [27.7 pF/m]
INDUCTANCE	0.15 μH/ft [0.49 μH/m]	0.24 μH/ft [0.79 μH/m]
PROPAGATION DELAY	1.48 ns/ft [4.86 ns/m]	1.42 ns/ft [4.66 ns/m]
VELOCITY OF PROPAGATION	68%	72%

NOTE: UNBALANCED IS MEASURED BETWEEN GROUND-SIGNAL-GROUND CONDUCTORS.
BALANCED IS MEASURED WITHIN A PAIR.

"PRINTING ILLUSTRATION"



AWM 21682 105°C 300V HOR



AWM 1A 105°C 150V FT2 EU<50V



3M ELECTRONICS MATERIALS SOLUTIONS DIVISION
INTERCONNECT SOLUTIONS
<http://www.3Mconnectors.com>

3M IS A TRADEMARK OF 3M COMPANY.
FOR TECHNICAL, SALES OR ORDERING
INFORMATION CALL 800-225-5373

NOTES

- MATERIAL:
A) PRIMARY INSULATION: HALOGEN FREE POLYOLEFIN (PO).
B) CONDUCTORS: 28 AWG, 19 X 40 AWG SILVER PLATED STRANDED COPPER ALLOY
 - REGULATORY INFORMATION:
VISIT 3M.com/regs OR CONTACT YOUR 3M REPRESENTATIVE TO FIND THE RoHS COMPLIANCE STATUS OF THE 3M PART YOU ARE INTERESTED IN.

UL FILE NO: E42769.
UL STYLE NO: 21682.
 - MARKINGS:
STANDARD: NONE
CANADIAN: SEE "PRINTING ILLUSTRATION" VIEW
PRIMARY CABLE: BLUE MARK ON EDGES
DESIGNATES WIRE NUMBER 1.
 - ENVIRONMENTAL:
TEMP RATING: -40°C TO +105°C (EIA-364-32G, METHOD A, TEST CONDITION 2).

-10°C TO +105°C (UL TEMPERATURE RATING)
FLAMABILITY RATING: HORIZONTAL.
5. HALOGEN FREE IS DEFINED AS BOTH:
1) NO HALOGEN COMPOUNDS THAT ARE INTENTIONALLY ADDED TO THE PRODUCT OR USED IN THE MANUFACTURING PROCESS FOR THE PRODUCT.
2) ANY IMPURITIES PRESENT ARE LESS THAN 900 ppm BROMINE, LESS THAN 900 ppm CHLORINE AND/OR LESS THAN 1500 ppm TOTAL BROMINE AND CHLORINE. THE LATTER ARE THE LEVELS SET FORTH IN CERTAIN INDUSTRY STANDARDS FOR PRINTED CIRCUIT BOARDS, SUCH AS THE INTERNATIONAL ELECTROTECHNICAL COMMISSION (IEC) 61249-2-21 STANDARD. THIS INFORMATION REPRESENTS 3M/S KNOWLEDGE AND BELIEF WHICH MAY BE BASED IN WHOLE OR IN PART ON INFORMATION PROVIDED BY 3RD PARTY SUPPLIERS TO 3M.

DESIGN REFERENCE	NEXT ASSEMBLY	REV	ECO	ISSUE DATE AND DESCRIPTION	DRFT	CHKD
80477				SEP 06, 2018		
				REVISED DATA AND NOTES	JNC	BPM
40826				MAY 22, 2012		
				REVISED AND REDRAWN	JNC	SN
CASTIGLIONE				MAY 15, 2012		
CHKD				DATE	APPR	DATE
					S. NEU	MAY 15, 2012
DIVISION				DIVISION CODE		
				EMSD		
DO NOT SCALE DRAWING	SCALE			TOLERANCES EXCEPT AS NOTED		
				INCHES		
				.0	±.1	
				.00	±.05	
				.000	±.010	
				.0000	±	
THIRD ANGLE PROJECTION				MILLIMETERS		
				0	±2.5	
				.0	±1.3	
				.00	±.25	
				.000	±	
MAX SURFACE ROUGHNESS				ANGLES		
✓				MARKED ONLY		
				TITLE		
				HIGH FLEX LIFE, FLAT CABLE, 28 AWG STRANDED, HF319		
				CAGE NUMBER	SIZE	DRAWING NO.
				D	78-5100-2342-3	C
				MODEL	HF319	
				DET	LISTS	YES
				NO	SHT	1 OF 2

3M™ HIGH FLEX LIFE FLAT CABLE, HF319 SERIES

.050", 28 AWG STRANDED, HIGH FLEX LIFE, HALOGEN FREE PO

Regulatory: For regulatory information about this product, visit 3M.com/regs or contact your 3M representative.

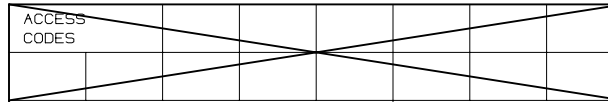
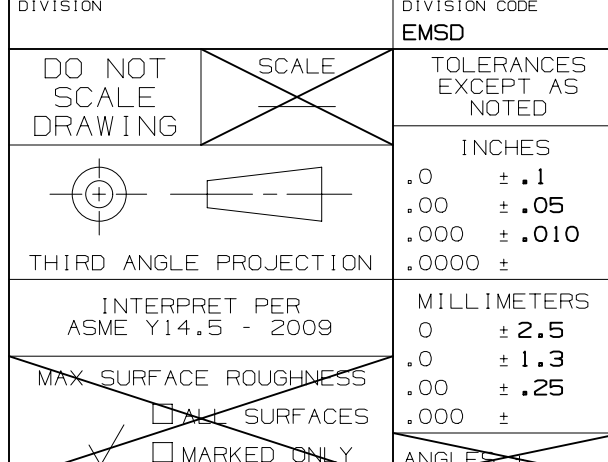
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www.3M.com/interconnect

C	80477	SEP 06,2018	JNC	BPM		
		REVISED DATA AND NOTES				
B	40826	MAY 22,2012	JNC	SN		
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DESIGN REFERENCE NEXT ASSEMBLY		REV	ECO	ISSUE DATE AND DESCRIPTION	DRFT	CHKD
		DRFT CASTIGLIONE		DATE MAY 15,2012	MFG DATE	
DIVISION		DIVISION CODE EMSD		APPROV S, NEU	DATE MAY 15,2012	
		 3M Center St. Paul, MN 55144		© 3M COPYRIGHT 2018 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.		
		TITLE		HIGH FLEX LIFE, FLAT CABLE, 28 AWG STRANDED, HF319		
		CAGE NUMBER	SIZE	DRAWING NO.	REV.	
		D	578-5100	2342-3	C	
		MODEL	HF319		DET. LISTS	YES ☒ NO ☐
				SHT 2 OF 2		



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- Поставка более 17-ти миллионов наименований электронных компонентов;
- Поставка сложных, дефицитных, либо снятых с производства позиций;
- Оперативные сроки поставки под заказ (от 5 рабочих дней);
- Экспресс доставка в любую точку России;
- Техническая поддержка проекта, помощь в подборе аналогов, поставка прототипов;
- Система менеджмента качества сертифицирована по Международному стандарту ISO 9001;
- Лицензия ФСБ на осуществление работ с использованием сведений, составляющих государственную тайну;
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- Подбор аналогов;
- Консультации по применению компонента;
- Поставка образцов и прототипов;
- Техническая поддержка проекта;
- Защита от снятия компонента с производства.



Как с нами связаться

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