

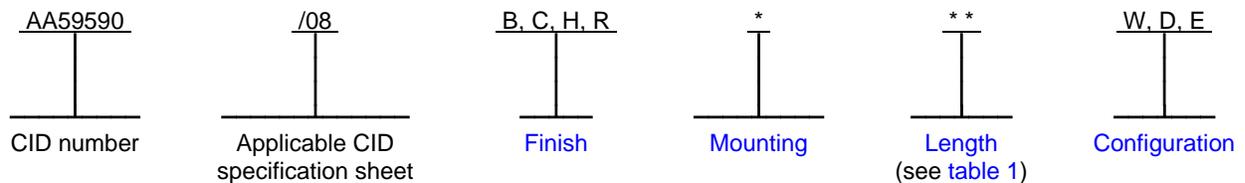
COMMERCIAL ITEM DESCRIPTION  
SPECIFICATION SHEET

HOLDER, ELECTRICAL CARD, WEDGE RETAINERS, 3 PIECE, SCREW ACTUATED DRIVE,  
.220 X .220 INCH BODY SIZE, WITH VISUAL LOCK INDICATION

The General Services Administration has authorized the use of this  
commercial item description for all federal agencies.

The complete requirements for procuring electrical card holders described herein shall consist of this document and  
the issue in effect of [A-A-59590](#).

CLASSIFICATION/PART IDENTIFICATION NUMBER (PIN). This commercial item description (CID) specification  
sheet uses a classification system which is included in the Part Identification Number (PIN) as shown in the following  
example (see [notes](#)).



Example: AA59590/08CM68W is the PIN for a chemical film finished, 6.8 inch (180.3 mm) long card holder with  
visual lock indication. The card holder also features three tapped mounting holes for use with M2.5 x.45 metric  
fasteners and a lockwasher and flat washer under the screw head for added resistance to loosening.

SALIENT CHARACTERISTICS.

Performance. Card holders shall hold the circuit card assembly firmly in its installed position. When the card holder  
is installed properly, it is capable of withstanding 60g/6ms of shock, 25 G-rms of vibration, and provides from 2 to 4  
degrees C/W/inch thermal resistance transfer between the circuit card assembly and the heat sink surfaces. Card  
holders shall have a visual indicator to show when the assembly is in its relaxed (unlocked) state.

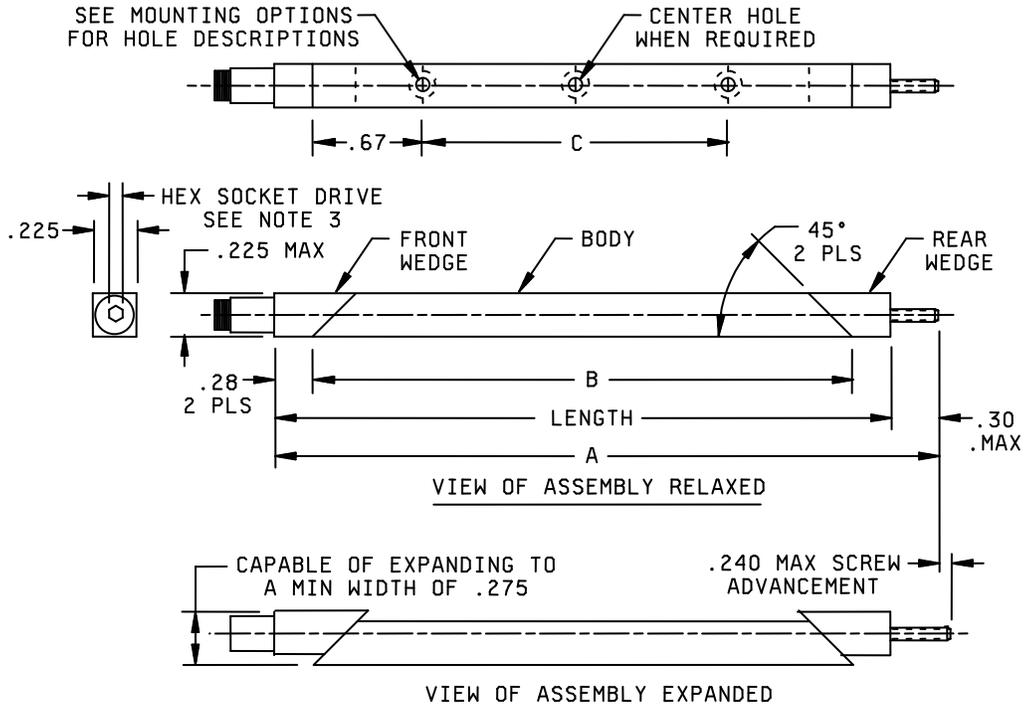
Interface and physical dimensions. The card holders supplied to this CID specification sheet shall be as specified on  
[figures 1, 2, 3, 4](#), in [table 1](#), and [A-A-59590](#).

Actuating screw hex drive socket. The across flats dimension for the hex drive socket shall be as follows: .094 inch  
(2.38 mm) for mounting options "J", "K", "N", "T", "R", "V", and "S" and .098 inch (2.5 mm) for mounting options "G"  
and "M".

Material. Unless otherwise specified herein, the card holder materials shall be as specified in [A-A-59590](#).

Visual lock indicator. The visual lock indicator, intended to show when the card holder is in its relaxed unlocked state,  
shall be as specified in [figure 2](#). When the card holder is in the unlocked (relaxed) state, the end of the actuating  
screw shall display a red band on the side of the screw. When the actuating screw on the card holder has been  
tightened (assembly expanded) so that the assembly is in the locked position, this red band shall be concealed.

A-A-59590/8C



Inches	mm	Inches	mm	Inches	mm	Inches	mm
.225	5.72	.240	6.10	.28	7.1	.67	17.0
		.275	6.99	.30	7.62		

NOTES:

1. Dimensions are in inches. Millimeters are given for general information only.
2. Unless otherwise specified, tolerances are  $\pm 0.02$  inch (0.51 mm) for two place decimals and  $\pm 0.010$  inch (0.25 mm) for three place decimals.
3. The across flats dimension for hex drive socket shall be .094 inch (2.38 mm) for mounting options "J", "K", "N", "T", "R", "V", and "S". The across flats dimension for hex drive socket shall be a metric dimension of .098 inch (2.5 mm) across flats for mounting options "G" and "M".

FIGURE 1. Relaxed and expanded dimensions.

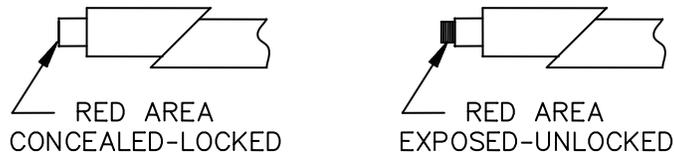


FIGURE 2. Visual lock indicator.

Nominal installation torque. When card holders are used in cold plate applications, the nominal installation torque of each card holder shall be as follows: 6 inch-pounds (0.68 N-m) for assemblies using no options or option "W" and 8 inch-pounds (0.90 N-m) for assemblies using options "E" or "D".

Cold plate slot width dimensions (when applicable). Recommend cold plate slot width to accommodate the circuit card assembly with attached card holder is .250 inch (6.35 mm) plus the thickness of the printed board of the circuit card assembly (see [A-A-59590](#)).

Finish. The finish designator shall be as specified in [A-A-59590](#). The wedge body finishes available for this CID specification sheet are as follows: "B" (black anodize), "C" (gold chemical film), "H" (hard black anodize), or "R" (clear chemical film).

Mounting. The mounting designators shall be as specified in [A-A-59590](#). The mounting options available for this CID specification sheet are as follows: "J" or "K" (rivet mounting holes), "N" (no mounting holes), "T" or "R" (tapped 0-80 UNF 2B holes), "V" or "S" (tapped 2-56 UNC 2B holes), or "G" or "M" (tapped M2.5 x.45 metric holes). Card holders using mounting option "J" may be shipped unassembled. See [figure 1](#) for mounting hole spacing requirements.

Mounting holes and locations (when required). Two mounting holes are required on card holders less than 5.30 inches (134.6 mm) in length. Three mounting holes are required on card holders 5.30 inches (134.6 mm) or greater in length. The third mounting hole shall be centered on the mounting body. See [figure 1](#) and table I for mounting hole locations and spacing requirements.

Rivet mounting holes. The holes used for rivet mounting shall be .066 to .073 inch (1.68 to 1.85 mm) diameter through holes, countersunk 100 degrees by .140 inch (3.56 mm) diameter with an access/clearance counterbore hole of .156 inch (3.96 mm) diameter by .160 to .175 inch (4.06 to mm) deep.

Rivets. This card holder uses rivet type A as specified in [A-A-59590](#) when rivet mounting is used.

Length, expanded, and relaxed dimensions. The length, expanded, and relaxed dimensions shall be as specified on [figure 1](#). The length designator shall be as specified in [A-A-59590](#) and the available lengths for this specification sheet are listed in table I.

TABLE I. Additional assembly dimensions (see [figure 1](#)). 1/

PIN length designator	Dimension "LENGTH" ±.02 (0.5)	Dimension "A" (maximum)	Dimension "B" ±.03 (0.8)	Dimension "C" ±.005 (0.13)
18	1.8 (45.7)	2.10 (53.3)	1.24 (31.5)	.75 (19.1)
23	2.3 (58.4)	2.60 (66.0)	1.74 (44.2)	.40 (10.2)
28	2.8 (71.1)	3.10 (78.7)	2.24 (56.8)	.90 (22.9)
30	3.0 (76.2)	3.30 (83.8)	2.44 (62.0)	1.10 (27.9)
33	3.3 (83.8)	3.60 (91.4)	2.74 (69.6)	1.40 (35.6)
35	3.5 (88.9)	3.80 (96.5)	2.94 (74.7)	1.60 (40.6)
38	3.8 (96.5)	4.10 (104.1)	3.24 (82.3)	1.90 (48.3)
43	4.3 (109.2)	4.60 (116.8)	3.74 (95.0)	2.40 (61.0)
48	4.8 (121.9)	5.10 (129.5)	4.24 (107.7)	2.90 (73.7)
53	5.3 (134.6)	5.60 (142.2)	4.74 (120.4)	3.40 (86.4)
58	5.8 (147.3)	6.10 (154.9)	5.24 (133.1)	3.90 (99.1)

See footnote at end of table.

TABLE I. Additional assembly dimensions (see figure 1) – Continued. 1/

PIN length designator	Dimension "LENGTH" ±.02 (0.5)	Dimension "A" (maximum)	Dimension "B" ±.03 (0.8)	Dimension "C" ±.005 (0.13)
63	6.3 (160.0)	6.60 (167.6)	5.74 (145.8)	4.40 (111.8)
68	6.8 (172.7)	7.10 (180.3)	6.24 (158.5)	4.90 (124.5)
73	7.3 (185.4)	7.60 (193.0)	6.74 (171.2)	5.40 (137.2)
78	7.8 (198.1)	8.10 (205.7)	7.24 (183.9)	5.90 (149.9)
83	8.3 (210.8)	8.60 (218.4)	7.74 (196.6)	6.40 (162.6)
88	8.8 (223.5)	9.10 (231.1)	8.24 (209.3)	6.90 (175.3)

1/ Dimensions are in inches. Millimeters, in parenthesis, are given for general information only.

Configuration. The configuration of a card holder shall be as specified in [table II](#). The details of a particular configuration consist of those on [figures 1](#) and [2](#), and may include those on [figures 3](#) and [4](#). Card holders not requiring the following option shall leave the configuration position in the PIN blank.

TABLE II. Configuration.

Configuration	Applicable figures	Hardware options
	<a href="#">1</a> and <a href="#">2</a>	No added options
W	<a href="#">1</a> , <a href="#">2</a> , and <a href="#">3</a>	Lockwasher and flat washer
E	<a href="#">1</a> , <a href="#">2</a> , and <a href="#">4</a>	Screw self-locking element
D	<a href="#">1</a> , <a href="#">2</a> , <a href="#">3</a> , and <a href="#">4</a>	Lockwasher, flat washer and screw self-locking element

Lockwasher and flat washer (see figure 3). The use of a lockwasher and flat washer located under the screw head will provide additional resistance to loosening of the card holder assembly from shock and vibration. Card holders requiring a lockwasher and flat washer shall include a suffix "W" in the PIN (see [table I](#), [classification](#) and [notes](#)).

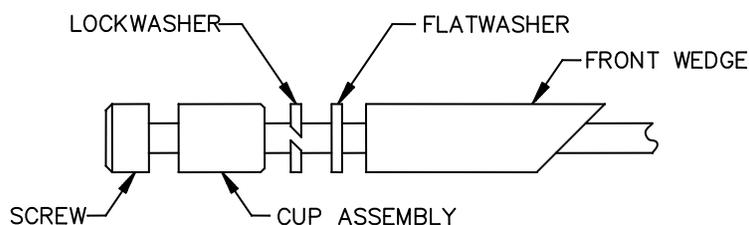


FIGURE 3. Lockwasher and flat washer details.

Screw self-locking element (see figure 4). The use of a self-locking element on the screw will provide a prevailing-torque for increased resistance to loosening of the card holder assembly from shock and vibration. The screw self-locking element shall be as specified in A-A-59590. Card holders requiring a screw self-locking element shall include configuration identifier "E" in the PIN (see table I, classification and notes).

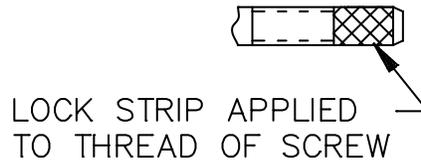


FIGURE 4. Screw self-locking element details.

Lockwasher, flat washer, and screw self-locking element. Card holders requiring a lockwasher, flat washer, and screw self-locking element configuration shall include a suffix "D" in the PIN (see table I, classification and notes).

NOTES.

PIN. The PIN should be used for Government purposes to buy commercial products to this CID specification sheet. See the classification section for PIN format example.

Source of documents.

Commercial Item Description

A-A-59590 – Holder, Electrical Card, Wedge Retainers, 3 Piece, Screw Actuated Drive, General Requirements For.

(Copies of these documents are available online at <http://quicksearch.dla.mil> or <https://assist.dla.mil> or from the Standardization Document Order Desk, 700 Robbins Avenue, Building 4D, Philadelphia, PA 19111-5094.)

Ordering data. Ordering data shall be as specified in A-A-59590.

Commercial products. As part of the market analysis and research effort, this CID specification sheet was coordinated with the following manufacturers of commercial products. At the time of CID specification sheet preparation and coordination, these manufacturers were known to have commercial products that would meet the requirements of this CID specification sheet. (NOTE: This information should not be considered as a list of approved manufacturers or be used to restrict procurement to only the manufacturers shown.)

<u>Manufacturer CAGE</u>	<u>Manufacturer name and address</u>	<u>Manufacturer contact information</u>
18915	Birtcher – A Division of Pentair Electronic Packaging 7238 Trade Street San Diego, CA 92121-3410	Telephone: (858) 740-2400 Toll Free: (800) 854-7086 Facsimile: (858) 679-4555 URL: <a href="http://www.birtcherproducts.com">www.birtcherproducts.com</a>
61081	Calmark – A Division of Pentair Electronic Packaging 7238 Trade Street San Diego, CA 92121-3410	Telephone: (858) 740-2400 Toll Free: (800) 854-7086 Facsimile: (858) 740-2430 Electronic mail: <a href="mailto:sales@calmark.com">sales@calmark.com</a> URL: <a href="http://www.calmark.com">www.calmark.com</a>
5BG68	American Circuit Card Retainers, Inc. 2310 E. Orangethorpe Avenue Anaheim, CA 92806-1231	Telephone: (714) 738-6194 Facsimile: (714) 446-0119 E-mail: <a href="mailto:sales@accrmfg.com">sales@accrmfg.com</a> URL: <a href="http://www.accrmfg.com">http://www.accrmfg.com</a>
3E7U8	Wakefield Solutions 200 Towerview Court Cary, NC 27513	Telephone: (919) 469-2004 Facsimile: (919) 469-2827 E-mail: <a href="mailto:wedgelocks@wakefield.com">wedgelocks@wakefield.com</a> URL: <a href="http://www.wakefield.com">www.wakefield.com</a>

Part number supersession data. These CID specification sheet part numbers supersede the following manufacturer's part numbers as shown in table III. The CID PINs listed in table III are only for length designator "28". See [table IV](#) for CID PIN construction using other available lengths for this specification sheet. This information is being provided to assist in reducing proliferation in the Government inventory system.

TABLE III. Commercial part number supersession data.

PIN designator AA59590/08	Vendor similar designator or type part number <a href="#">1/</a> <a href="#">2/</a>			
	CAGE 18915	CAGE 61081	CAGE 5BG68	CAGE 3E7U8
BJ28	42VI-6-B	VA230-2.80H	3220VBA-2.80H	422B-280RSB-V
BN28	42VI-6-B-A	VA230-2.80	3220VBA-2.80	422B-280ASB-V
BT28	42VI-6-B-T	VA230-2.80T0	3220VBA-2.80T0	422B-280TSB-V
BV28	42VI-6-B-S	VA230-2.80T2	3220VBA-2.80T2	422B-280SSB-V
BG28	42VI-6-B-M	MVA230-2.80TM2.5	3220MVBA-2.80TM2.5	422B-280MMB-V
BJ28W	42VI-6-B-LF	WVA230-2.80H	3220VWBA-2.80H	422B-280RSB-WV
BN28W	42VI-6-B-LF-A	WVA230-2.80	3220VWBA-2.80	422B-280ASB-WV
BT28W	42VI-6-B-LF-T	WVA230-2.80T0	3220VWBA-2.80T0	422B-280TSB-WV
BV28W	42VI-6-B-LF-S	WVA230-2.80T2	3220VWBA-2.80T2	422B-280SSB-WV
BG28W	42VI-6-B-LF-M	MWVA230-2.80TM2.5	3220MVWBA-2.80TM2.5	422B-280MMB-WV
BJ28E	42VI-6-B-L	VA230-2.80HL	3220VBA-2.80HL	422B-280RSB-PV
BN28E	42VI-6-B-A-L	VA230-2.80L	3220VBA-2.80L	422B-280ASB-PV
BT28E	42VI-6-B-T-L	VA230-2.80T0L	3220VBA-2.80T0L	422B-280TSB-PV
BV28E	42VI-6-B-S-L	VA230-2.80T2L	3220VBA-2.80T2L	422B-280SSB-PV
BG28E	42VI-6-B-M-L	MVA230-2.80TM2.5L	3220MVBA-2.80TM2.5L	422B-280MMB-PV

See footnotes at end of table.

TABLE III. Commercial part number supersession data – Continued.

PIN designator AA59590/08	Vendor similar designator or type part number <a href="#">1/</a> <a href="#">2/</a>			
	CAGE 18915	CAGE 61081	CAGE 5BG68	CAGE 3E7U8
BJ28D	42VI-6-B-LF-L	WVA230-2.80HL	3220VWBA-2.80HL	422B-280RSB-WPV
BN28D	42VI-6-B-LF-A-L	WVA230-2.80L	3220VWBA-2.80L	422B-280ASB-WPV
BT28D	42VI-6-B-LF-T-L	WVA230-2.80T0L	3220VWBA-2.80T0L	422B-280TSB-WPV
BV28D	42VI-6-B-LF-S-L	WVA230-2.80T2L	3220VWBA-2.80T2L	422B-280SSB-WPV
BG28D	42VI-6-B-LF-M-L	MWVA230-2.80TM2.5L	3220MVWBA-2.80TM2.5L	422B-280MMB-WPV
CJ28	42VI-6	V230-2.80H	3220VCG-2.80H	422B-280RSG-V
CN28	42VI-6-A	V230-2.80	3220VCG-2.80	422B-280ASG-V
CT28	42VI-6-T	V230-2.80T0	3220VCG-2.80T0	422B-280TSG-V
CV28	42VI-6-S	V230-2.80T2	3220VCG-2.80T2	422B-280SSG-V
CG28	42VI-6-M	MV230-2.80TM2.5	3220MVCG-2.80TM2.5	422B-280MMG-V
CJ28W	42VI-6-LF	WV230-2.80H	3220VWCG-2.80H	422B-280RSG-WV
CN28W	42VI-6-LF-A	WV230-2.80	3220VWCG-2.80	422B-280ASG-WV
CT28W	42VI-6-LF-T	WV230-2.80T0	3220VWCG-2.80T0	422B-280TSG-WV
CV28W	42VI-6-LF-S	WV230-2.80T2	3220VWCG-2.80T2	422B-280SSG-WV
CG28W	42VI-6-LF-M	MWV230-2.80TM2.5	3220MVWCG-2.80TM2.5	422B-280MMG-WV
CJ28E	42VI-6-L	V230-2.80HL	3220VCG-2.80HL	422B-280RSG-PV
CN28E	42VI-6-A-L	V230-2.80L	3220VCG-2.80L	422B-280ASG-PV
CT28E	42VI-6-T-L	V230-2.80T0L	3220VCG-2.80T0L	422B-280TSG-PV
CV28E	42VI-6-S-L	V230-2.80T2L	3220VCG-2.80T2L	422B-280SSG-PV
CG28E	42VI-6-M-L	MV230-2.80TM2.5L	3220MVCG-2.80TM2.5L	422B-280MMG-PV
CJ28D	42VI-6-LF-L	WV230-2.80HL	3220VWCG-2.80HL	422B-280RSG-WPV
CN28D	42VI-6-LF-A-L	WV230-2.80L	3220VWCG-2.80L	422B-280ASG-WPV
CT28D	42VI-6-LF-T-L	WV230-2.80T0L	3220VWCG-2.80T0L	422B-280TSG-WPV
CV28D	42VI-6-LF-S-L	WV230-2.80T2L	3220VWCG-2.80T2L	422B-280SSG-WPV
CG28D	42VI-6-LF-M-L	MWV230-2.80TM2.5L	3220MVWCG-2.80TM2.5L	422B-280MMG-WPV
HJ28	42VI-6-B3	VHA230-2.80H	3220VBH-2.80H	422B-280RSH-V
HN28	42VI-6-B3-A	VHA230-2.80	3220VBH-2.80	422B-280ASH-V
HT28	42VI-6-B3-T	VHA230-2.80T0	3220VBH-2.80T0	422B-280TSH-V
HV28	42VI-6-B3-S	VHA230-2.80T2	3220VBH-2.80T2	422B-280SSH-V
HG28	42VI-6-B3-M	MVHA230-2.80TM2.5	3220MVBH-2.80TM2.5	422B-280MMH-V

See footnotes at end of table.

TABLE III. Commercial part number supersession data – Continued.

PIN designator AA59590/08	Vendor similar designator or type part number <a href="#">1/</a> <a href="#">2/</a>			
	CAGE 18915	CAGE 61081	CAGE 5BG68	CAGE 3E7U8
HJ28W	42VI-6-B3-LF	WVHA230-2.80H	3220WVBH-2.80H	422B-280RSH-WV
HN28W	42VI-6-B3-LF-A	WVHA230-2.80	3220WVBH-2.80	422B-280ASH-WV
HT28W	42VI-6-B3-LF-T	WVHA230-2.80T0	3220WVBH-2.80T0	422B-280TSH-WV
HV28W	42VI-6-B3-LF-S	WVHA230-2.80T2	3220WVBH-2.80T2	422B-280SSH-WV
HG28W	42VI-6-B3-LF-M	MWVHA230-2.80TM2.5	3220MVVBH-2.80TM2.5	422B-280MMH-WV
HJ28E	42VI-6-B3-L	VHA230-2.80HL	3220VBH-2.80HL	422B-280RSH-PV
HN28E	42VI-6-B3-A-L	VHA230-2.80L	3220VBH-2.80L	422B-280ASH-PV
HT28E	42VI-6-B3-T-L	VHA230-2.80T0L	3220VBH-2.80T0L	422B-280TSH-PV
HV28E	42VI-6-B3-S-L	VHA230-2.80T2L	3220VBH-2.80T2L	422B-280SSH-PV
HG28E	42VI-6-B3-M-L	MVHA230-2.80TM2.5L	3220MVBH-2.80TM2.5L	422B-280MMH-PV
HJ28D	42VI-6-B3-LF-L	WVHA230-2.80HL	3220VVBH-2.80HL	422B-280RSH-WPV
HN28D	42VI-6-B3-LF-AL	WVHA230-2.80L	3220VVBH-2.80L	422B-280ASH-WPV
HT28D	42VI-6-B3-LF-TL	WVHA230-2.80T0L	3220VVBH-2.80T0L	422B-280TSH-WPV
HV28D	42VI-6-B3-LF-SL	WVHA230-2.80T2L	3220VVBH-2.80T2L	422B-280SSH-WPV
HG28D	42VI-6-B3-LF-ML	MWVHA230-2.80TM2.5L	3220MVVBH-2.80TM2.5L	422B-280MMH-WPV
RJ28	42VI-6-CC	VR230-2.80H	3220VCC-2.80H	422B-280RST-V
RN28	42VI-6-CC-A	VR230-2.80	3220VCC-2.80	422B-280AST-V
RT28	42VI-6-CC-T	VR230-2.80T0	3220VCC-2.80T0	422B-280TST-V
RV28	42VI-6-CC-S	VR230-2.80T2	3220VCC-2.80T2	422B-280SST-V
RG28	42VI-6-CC-M	MVR230-2.80TM2.5	3220MVCC-2.80TM2.5	422B-280MMT-V
RJ28W	42VI-6-CC-LF	WVR230-2.80HL	3220WVCC-2.80H	422B-280RST-WV
RN28W	42VI-6-CC-LF-A	WVR230-2.80L	3220WVCC-2.80	422B-280AST-WV
RT28W	42VI-6-CC-LF-T	WVR230-2.80T0L	3220WVCC-2.80T0	422B-280TST-WV
RV28W	42VI-6-CC-LF-S	WVR230-2.80T2L	3220WVCC-2.80T2	422B-280SST-WV
RG28W	42VI-6-CC-LF-M	MWVR230-2.80TM2.5L	3220MVVCC-2.80TM2.5	422B-280MMT-WV
RJ28E	42VI-6-CC-L	WVR230-2.80H	3220VCC-2.80HL	422B-280RST-PV
RN28E	42VI-6-CC-A-L	WVR230-2.80	3220VCC-2.80L	422B-280AST-PV
RT28E	42VI-6-CC-T-L	WVR230-2.80T0	3220VCC-2.80T0L	422B-280TST-PV
RV28E	42VI-6-CC-S-L	WVR230-2.80T2	3220VCC-2.80T2L	422B-280SST-PV
RG28E	42VI-6-CC-M-L	MWVR230-2.80TM2.5	3220MVCC-2.80TM2.5L	422B-280MMT-PV

See footnotes at end of table.

TABLE III. Commercial part number supersession data – Continued.

PIN designator AA59590/08	Vendor similar designator or type part number <u>1/</u> <u>2/</u>			
	CAGE 18915	CAGE 61081	CAGE 5BG68	CAGE 3E7U8
RJ28D	42VI-6-CC-LF-L	WVR230-2.80HL	3220VWCC-2.80HL	422B-280RST-WPV
RN28D	42VI-6-CC-LF-AL	WVR230-2.80L	3220VWCC-2.80L	422B-280AST-WPV
RT28D	42VI-6-CC-LF-TL	WVR230-2.80T0L	3220VWCC-2.80T0L	422B-280TST-WPV
RV28D	42VI-6-CC-LF-SL	WVR230-2.80T2L	3220VWCC-2.80T2L	422B-280SST-WPV
RG28D	42VI-6-CC-LF-ML	MWVR230-2.80TM2.5L	3220MVWCC-2.80TM2.5L	422B-280MMT-WPV

1/ The CID PINs listed are only for length designator "28".

2/ The manufacturer's part number shall not be used for procurement to the requirements of this CID specification sheet. At the time of preparation of this CID specification sheet, the aforementioned commercial products were reviewed and could be replaced by the CID PIN shown. For actual part marking requirements, see the marking paragraph in [A-A-59590](#).

TABLE IV. Example of PIN with available length designators.

PIN designator AA59590/08	Vendor similar designator or type part number <u>1/</u> <u>2/</u>			
	CAGE 18915	CAGE 61081	CAGE 5BG68	CAGE 3E7U8
CG18W	42VI-4-LF-M		3220WCG-1.80HL	422B-180MMG-WV
CG23W	42VI-5-LF-M	MWV230-2.30TM2.5	3220WCG-2.30HL	422B-230MMG-WV
CG28W	42VI-6-LF-M	MWV230-2.80TM2.5	3220MVWCG-2.80TM2.5	422B-280MMG-WV
CG30W	<u>3/</u>	MWV230-3.00TM2.5	3220WCG-3.00HL	422B-300MMG-WV
CG33W	42VI-7-LF-M	MWV230-3.30TM2.5	3220WCG-3.30HL	422B-330MMG-WV
CG35W	<u>3/</u>	MWV230-3.50TM2.5	3220WCG-3.50HL	422B-350MMG-WV
CG38W	42VI-8-LF-M	MWV230-3.80TM2.5	3220WCG-3.80HL	422B-380MMG-WV
CG43W	42VI-9-LF-M	MWV230-4.30TM2.5	3220WCG-4.30HL	422B-430MMG-WV
CG48W	42VI-10-LF-M	MWV230-4.80TM2.5	3220WCG-4.80HL	422B-480MMG-WV
CM53W	42VI-11-LF-M	MWV230-5.30ETM2.5	3220WCG-5.30EHL	422B-530MMG-CWV
CM58W	42VI-12-LF-M	MWV230-5.80ETM2.5	3220WCG-5.80EHL	422B-580MMG-CWV
CM63W	42VI-13-LF-M	MWV230-6.30ETM2.5	3220WCG-6.30EH	422B-630MMG-CWV
CM68W	42VI-14-LF-M	MWV230-6.80ETM2.5	3220WCG-6.80EHL	422B-680MMG-CWV
CM73W	42VI-15-LF-M	MWV230-7.30ETM2.5	3220WCG-7.30EHL	422B-730MMG-CWV
CM78W	42VI-16-LF-M	MWV230-7.80ETM2.5	3220WCG-7.80EHL	422B-780MMG-CWV
CM83W	42VI-17-LF-M	MWV230-8.30ETM2.5	3220WCG-8.30EHL	422B-830MMG-CWV
CM88W	42VI-18-LF-M	MWV230-8.80ETM2.5	3220WCG-8.80EHL	422B-880MMG-CWV

See footnotes at end of table.

TABLE IV. Example of PIN with available length designators – Continued.

- 1/ The manufacturer's part number shall not be used for procurement to the requirements of this CID specification sheet. At the time of preparation of this CID specification sheet, the aforementioned commercial products were reviewed and could be replaced by the CID PIN shown. For actual part marking requirements, see the marking paragraph in [A-A-59590](#).
- 2/ Other lengths are available on request.
- 3/ Consult manufacturer for part number.

Guidance on use of alternative parts with less hazardous or non-hazardous materials. This CID specification sheet provides for a number of alternative plating materials via the PIN. Users should select the PIN with the least hazardous material that meets the form, fit, and function requirements of their application.

Changes from previous issue. The margins of this specification are marked with vertical lines to indicate where changes from the previous issue were made. This was done as a convenience only and the Government assumes no liability whatsoever for any inaccuracies in these notations. Bidders and contractors are cautioned to evaluate the requirements of this document based on the entire content irrespective of the marginal notations and relationship to the last previous issue.

MILITARY INTERESTS:

Custodians:  
Army – CR  
Navy – EC  
Air Force – 85  
DLA – CC

Review activities:  
Army – MI  
Air Force – 99

CIVIL AGENCY COORDINATING ACTIVITY:

GSA – FAS  
Preparing activity:  
DLA – CC  
Project 5998-2012-048

NOTE: The activities listed above were interested in this document as of the date of this document. Since organizations and responsibilities can change, you should verify the currency of the information above using the ASSIST Online database at <https://assist.dla.mil>.