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# **NEMA ETB Selector Chart**

# High Density Series 100

Medium Duty Series 900

	High	High	High		C.	17	
	Density Miniature	Density Single Tier	Density Double Tier			lium ıty	
Mounting	Direct Mount, Miniature Channel	Direct Mount, Standard & Breakaway Channel	Channel only: Standard & Breakaway		Standard, & Brea	Mount Miniature Ikaway nnels	
AWG Wire Range	#30-12	#30-12	#30-12	#22-8	#22-8	10*, #22-14	#22-10
Contact Types		Tubular Clamp		Tubular Clamp	Tubular Screw	Strap Screw	Plug-In
<ul> <li>R=Shipped with screws raised</li> <li>B=Shipped with screws bottomed</li> </ul>		E B		B	B	в	
Ampacity	28A	28A	25A	30A	50A	35A*, 15A	30A
Voltage	300 V 600 V (Limited Power Circuits)	600 V	600 V	600 V	600 V	600 V	600 V
Center-to- Center Spacing	.25" [6.35]	.25" [6.35]	.24" [6.10]	.375" [9.53]	.375" [9.53]	.375" [9.53]	.375" [9.53]
Housing Material	Nylon or Polypropylene	Nylon	Nylon	PCT	PCT	PCT	PCT
Flammability Rating	UL94V-2 or UL94V-0	UL94V-2	UL94V-2	UL94V-0	UL94V-0	UL94V-0	UL94V-0
Max. Service Temperature	125°C (257°F) or 105°C (222°F)	125°C (257°F)	125°C (257°F)	150°C (302°F)	150°C (302°F)	150°C (302°F)	150°C (302°F)
Pages		246	ing only when used w	250	250	250	251

\*Acceptable for 35A max. factory wiring only when used with 10AWG wire preterminated with suitable ring tongue terminals.



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**Note:** All part numbers are RoHS Compliant.

NEMA ETB Selector Chart (Continued) **Medium Duty ERT Series Heavy Duty Series 200** Series 900 411 2723 Medium Medium Duty Nylon or Duty **Radiation Resistant** Polypropylene **Direct Mount** Direct Mount or: Standard, Miniature Standard and Flat Base fits Miniature Channel. Dovetail Base fits Standard & Breakaway Channels Mounting & Breakaway Breakaway Channels Channels **AWG Wire** #18-6 #10 & #18-12 #22-8 #22-8 #10\*, #22-14 #18-4 #18-8 Range smaller smaller Quick Tubular Quick Connect Tubular Tubular Strap Tubular Tubular Strap Strap **Contact Types** Connect Combination Clamp Screw Screw Clamp Screw Clamp Screw R=Shipped with screws പ്പ H P raised E **B=**Shipped with P F 目 screws bottomed В В В В R В В B В Ampacity 20A 20A 30A 50A 35A\*, 15A 65A 85A 50A 35A Voltage 300 V 600 V 600 V Center-to-.375" .375' .50" Center [9.53] [9.53] [12.70] Spacing Housing PCT Nylon or Polypropylene RYTON Material Flammability UL94V-0 UL94V-0 UL94V-2 or UL94V-0 Rating Max. Service 125°C (257°F) or 200°C (392°F) 150°C (302°F) Temperature 105°C (222°F) 251 Pages 250 252 260-261



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**Note:** All part numbers are RoHS Compliant.

# NEMA ETB Selector Chart (Continued)

Heavy Duty Series 200         Intermediate HD Series 800         Ultra Heavy Duty Series 400           Phenolic         Intermediate Heavy Duty Duty         Ultra Heavy Duty         Ultra Heavy Duty           Mounting         Direct Mount of Standard & Biotadarey Duty         Direct Mount of Standard & Biotadarey Duty         Direct Mount of Standard & Biotadarey Duty         Ultra Heavy Duty           AWG Wire Range         #18-6         #18-6         #18-6         #10-6         #12-10         #12-20 konil (MOM)           Contact Types         Tubular         Tubular         Sterew         Converts         Tubular         Bioteck annaller         #12-20 konil (MOM)           Contact Types         Tubular         Sterew         Converts         Tubular         Sterew         Tubular           Biotadarey Columns         Sterew         Converts         Sterew         Tubular         Tubular           Biotadarey Biotadarey Dottomed         #18-6         #18-6         #18-6         #12-20 konil (MOM)         #12-20 konil (MOM)           Ampacity         65A         65A         50A         35A         150A         175A         255A           Voltage         600 V         600 V         600 V         600 V         600 V         600 V           Center-to- Center-to- Speering Speering				
PhenolicHeavy DutyHeavy DutyHeavy DutyMountingDirect Mount or Standard & Breakaway ChannelsDirect Mount or Standard & Breakaway ChannelsDirect Mount or Standard & Breakaway ChannelsAWG Wire Range#18-6#18-4#18-8#10.8 smaller#12-1/0#12-2/0 kcmil (MCM)Contact TypesTubular Tubular Tubular ScrewTubular Strap Clannels#12-1/0#12-2/0 kcmil (MCM)Be ScrewTubular ScrewScrewScrewScrewScrewBe screwsBBBBBBRBBBBAmpacity65A85A50A35A150A175AVoltage600 V600 V600 V600 VCenter-to- (14-22)[19.05][30.23]Housing MaterialPhenolicNylonPhenolicNylonPhenolicFlammability RatingUL94V-1UL94V-1UL94V-2UL94V-1Max. Service Femerature150°C (302°F)125°C (257°F)150°C (302°F)		Heavy Duty Series 200	Intermediate HD Series 800	Ultra Heavy Duty Series 400
PhenolicHeavy DutyHeavy DutyHeavy DutyMountingDirect Mount or Standard & & Breakaway ChannelsDirect Mount 			10 A	
Mountingor Standard & breakaway Channelsor Standard & breakaway Channelsor Standard & breakaway ChannelsAWG Wire Range#18-6#18-4#18-8#10.8#12-1/0#12-2/0 kcmil (MCM)Contact TypesTubular ClampTubular StrewStrap ClampStrap ScrewTubular ScrewTubular ScrewTubular ScrewR=Shipped with screws taisedBRBBBBB=Shipped with screws bottomedBRBBBB=Shipped with screwsBRBBBB=Shipped with screwsBRBBBB=Shipped with screwsBRBBBB=Shipped with screwsBRBBBB=Shipped with screwsBRBBBB=Shipped with screwsBRBBBB=Shipped with screwsBRBBBB=Shipped with screwsBRBBBBRBBBBBBAmpacity65A85A50A35A150A175A255AVoltage600 V600 V600 V600 V1.19' (30.23)1.19' (30.23)Housing MaterialPhenolicNylonPhenolicFlammability Remerature150°C (302*F)125°C (257*F)150°C (302*F)		Phenolic	Heavy	Heavy
Range#18-6#18-4#18-8#10.8#12-1/0kcmil (MCM)Contact TypesTubularTubularStrapStrapStrapStrapR=Shipped with screws raised $\square$ $\square$ $\square$ $\square$ $\square$ $\square$ $\square$ B=Shipped with screws bottomed $\square$ $\square$ $\square$ $\square$ $\square$ $\square$ $\square$ $\square$ Ampacity65A85A50A35A150A175A255AVoltage $600 V$ $600 V$ $600 V$ $600 V$ $600 V$ Center-to- Center Spacing $HousingMaterialPhenolicNylonPhenolicFlammabilityRatingMax. ServiceTemperatureMax. ServiceTemperatureMax. ServiceTemperatureMax. ServiceTemperatureMax. ServiceTemperatureMax. ServiceTemperature$	Mounting	or Standard & Breakaway	or Standard & Breakaway	or Standard & Breakaway
ClampScrewClampScrewClampScrew <th< th=""><th></th><th></th><th>#12-1/0</th><th></th></th<>			#12-1/0	
R=Shipped with raised B=Shipped with screws bottomedImage of the two problemsImage of two problems <t< th=""><th>Contact Types</th><th></th><th></th><th></th></t<>	Contact Types			
Voltage         600 V         600 V         600 V           Center-to- Center-to- Spacing         .56"         .75"         1.19"           Housing Material         Phenolic         Nylon         Phenolic           Flammability Rating         UL94V-1         UL94V-2         UL94V-1           Max. Service Temperature         150°C (302°F)         125°C (257'F)         150°C (302°F)	screws raised <b>B=</b> Shipped with screws		B	
Center-to- Center Spacing         .56"         .75"         1.19"           [14.22]         [19.05]         [30.23]           Housing Material         Phenolic         Nylon         Phenolic           Flammability Rating         UL94V-1         UL94V-2         UL94V-1           Max. Service Temperature         150°C (302°F)         125°C (257°F)         150°C (302°F)	Ampacity	65A 85A 50A 35A	150A	175A 255A
Center Spacing         .56"         .75"         1.19"           Housing Material         [14.22]         [19.05]         [30.23]           Housing Material         Phenolic         Nylon         Phenolic           Flammability Rating         UL94V-1         UL94V-2         UL94V-1           Max. Service Temperature         150°C (302°F)         125°C (257°F)         150°C (302°F)	Voltage	600 V	600 V	600 V
Material     Phenolic     Nylon     Phenolic       Flammability Rating     UL94V-1     UL94V-2     UL94V-1       Max. Service Temperature     150°C (302°F)     125°C (257°F)     150°C (302°F)	Center			
Rating         0L94V-1         0L94V-2         0L94V-1           Max. Service Temperature         150°C (302°F)         125°C (257°F)         150°C (302°F)	Housing Material	Phenolic	Nylon	Phenolic
Temperature         150°C (302°F)         125 C (257 F)         150 C (302 F)	Flammability Rating	UL94V-1	UL94V-2	UL94V-1
Pages         267-272         273-276         277-279		150°C (302°F)	125°C (257°F)	150°C (302°F)
	Pages	267-272	273-276	277-279

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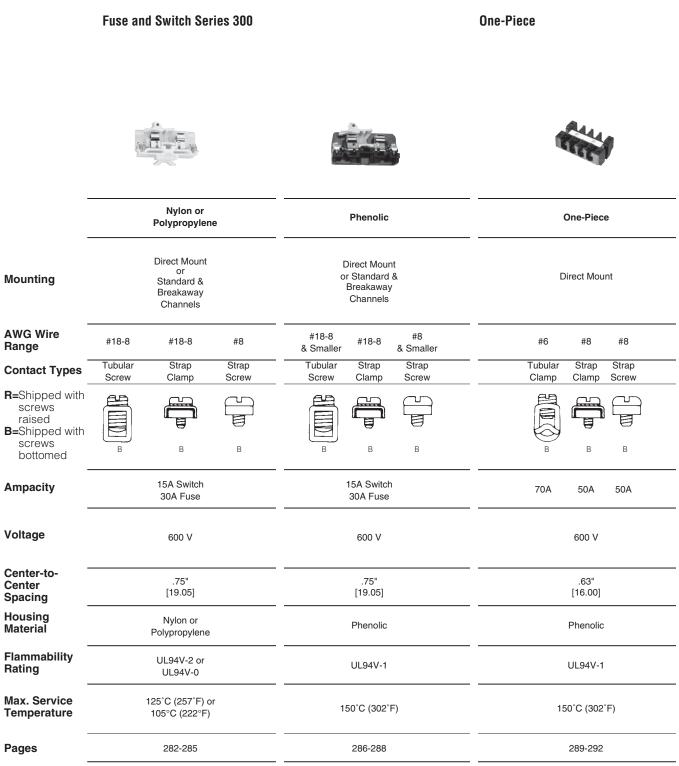
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# NEMA ETB Selector Chart (Continued)



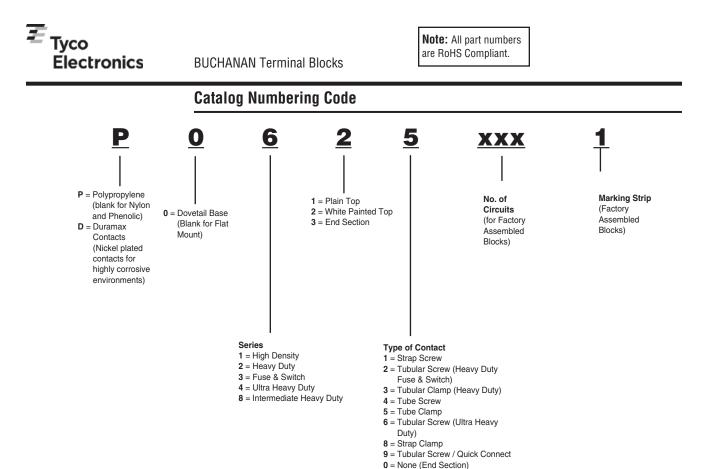
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Note: Some catalog number combinations are not valid. Check appropriate catalog pages before ordering.

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# **100 Series High Density Miniature Blocks**

### **Product Facts**

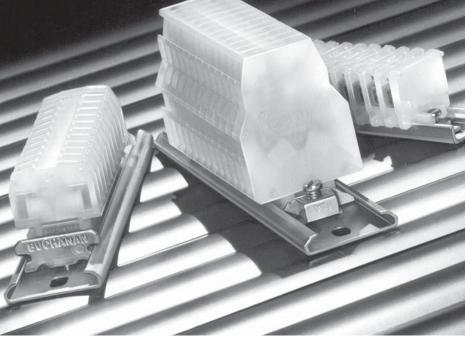
₹<sub>Тусо</sub>

 n No Wire Crimping Required
 — tubular clamp contacts hold wire ranging from #30 to #12 AWG better than crimp-on terminals.

Electronics

- n Saves Installation Time and Costs — tubular clamp contacts are supplied with captive screws backed out.
- n Nylon housing standard; polypropylene for fire retardant characteristics.
- n Positive Stop helps prevent wire from being inserted too far, and helps prevent screw from being tightened on insulation. Easy access contact provides for safe, reliable, and costeffective connection.
- n Quick Installation and Change — additional sections may be added or removed without removing channel mounting screw.
- n Choice of Five Mounting Channels:
  - n Miniature aluminum
  - $_{\rm n}$  Zinc-plated steel
  - $_{\rm n}$  Pre-punched aluminum
  - n Break-away steel
- n Single and Double Tier blocks fit all standard BUCHANAN mounting channels. Single Tier blocks fit both miniature and standard channels.
- n Choice of Marking Surfaces
   matte-finish area for marking directly on block; slide-in vinyl strip (blank or preprinted) also available.

These miniature terminal blocks fit on a much smaller channel to save valuable panel space or can be surface mounted directly to the panel. Miniature blocks accept wire as large as #12 AWG and are available in four styles: Miniature (nylon), Miniature (polypropylene), Single Tier and Double Tier.





NEMA Terminal Blocks

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# **100 Series High Density Miniature Blocks**









		iniature Miniature Nylon Polypropylene			Sing	Single Tier		Double Tier	
Type of Block	Model	Part Number	Model	Part Number	Model	Part Number	Model	Part Number	
Standard Block	125-BU	2-1437392-3	P125	4-1437392-7	115-BU	1437381-5	105-BU	1-1437392-7	
Corrosion Resistant (nickel plated contacts)	D125	3-1437389-3	DP125	7-1437389-1	D115	3-1437389-2	D105	2-1437392-9	
Specifications									
Housing Material	Nylon	_	Polypropylene	—	Nylon	_	Nylon	_	
Max. Service Temperature	125°C (257°F)	—	105°C (221°F)	_	125°C (257°F)	_	125°C (257°F)	—	
Flammability	UL94V-2	_	UL94V-0	_	UL94V-2	_	UL94V-2	—	
Wire Strip Length (in.)	5/16	_	5/16	_	5/16	_	5/16	—	
Torque, in-Ibs.	6-9	_	6-9	_	6-9	_	6-9	—	
Electrical Characteristics									
UL Rating	20 A @ 300V	_	20 A @ 300V	_	20 A @ 600V	_	20 A @ 600V	_	
Wire Range (solid & stranded)	30-12	_	30-12	_	30-12	_	30-12	_	
Spacing	0.25"		0.05"		0.05"		0.04		
Pitch			0.25"	_	0.25"	_	0.24"	_	
Terminals per Foot	48		48	—	48	_	102	_	
Accessories									
End Section (gray)	130-BU	2-1437392-5	P130	4-1437392-9	120	2-1437392-1	110-BU	1-1437392-8	
Jumper, 2 pole	10	1437381-1	10	1437381-1	10	1437381-1	_	—	
Jumper, 10 pole	_	_	_	_	_	_	J10	3-1437392-1	
Jumper, Inter-tier	_	—	_	—	_	—	J2-BU	3-1437392-2	
Mounting Channel									
Miniature (3ft)	12	1437381-8	12	1437381-8	12	1437381-8		_	
Steel, Zinc plated (6ft)	_	_	_	_	60	9-1437381-1	60	9-1437381-1	
Steel, Zinc plated (3ft)	_	_	_	_	63-BU	9-1437381-8	63-BU	9-1437381-8	
Breakaway, steel	_	_	_	_	60B36	9-1437381-2	60B36	9-1437381-2	
Pre-punched aluminum (6ft)	_	_	_	_	64	9-1437381-9	64	9-1437381-9	
Pre-punched aluminum (3ft)	—	_	_	—	67	1437382-2	67	1437382-2	
Channel Clamps									
Miniature (use w/#12 channel)	11	1437381-4	11	1437381-4	11	1437381-4	_	_	
Universal	_	_	_	_	68	1437382-3	68	1437382-3	



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Note: All part numbers are RoHS Compliant.

# **100 Series High Density Miniature Blocks Accessories**



Screw Steel Channel	Universal	Snap-in	for #12 Channel	See-thru Cover	Ganging Rod	Miniature Vinyl Marking Strips	Elevated Marking Strip	Nylon Holding Plug
Part Number								
9-1437381-5	1437382-3	9-1437381-7	1437381-4	1-1437381-0	1-1437381-1	1-1437381-2	4-1437381-1	1-1437381-3
Catalog Number								
61	68	62	11	13	14	15	52-BU	16
Available For								
Single Tier Double Tier	Single Tier Double Tier	Single Tier Double Tier	Miniature Single Tier	Miniature Single Tier	Miniature Single Tier	Miniature Single Tier Double Tier	Miniature Single Tier Double Tier	Miniature Single Tier
Standard Length								
	_	—	—	_	2 feet	25 feet	18 inches	_

### **Factory Assembled Blocks**

Description	Direct Mount	Channel Mount
Miniature (nylon)	125xx	0125xx
	D125xx (nickel)	D0125xx (nickel)
Single Tier (nylon)	115xx	0115xx
	D115xx (nickel)	D0115xx (nickel)
Double Tier (nylon)	105xx	0105xx
	D105xx (nickel)	D0105xx (nickel)
Miniature (polypropylene)	P125xx	P0125xx
	DP125xx (nickel)	DP0125xx (nickel)

Note: xx = number of blocks desired. For factory assembled blocks with removable marking strip, add "-1" to Catalog Number. Minimum order quantities may apply.

### **Related Product Data**

Wire Pins and Ferrules—Pages 109-111 For more information on AMP Standard Terminals and Splices or Quick-Connect FASTON Receptacles and Tabs, request Catalog 82042.

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NEMA Terminal Blocks

**Note:** All part numbers are RoHS Compliant.

# **Miniature Blocks**

### Miniature

C = .29 [7.37] + (.25 [6.35] X N) L = .51 [12.95] + (.25 [6.35] X N)

### **On Miniature Channel:**

 $\begin{array}{l} {\sf CCH} = 1.00 \; [25.4] + (.25\; [6.35] \; X \; {\sf A}) \\ {\sf LCH} = 1.35\; [34.29] + (.25\; [6.35] \; X \; {\sf A}) \\ {\sf A} = {\sf N} \; {\sf when} \; {\sf N} \; {\sf is} \; {\sf even} \\ {\sf A} = {\sf N} + 1 \; {\sf when} \; {\sf N} \; {\sf is} \; {\sf Odd} \\ {\sf N} = {\sf No}. \; {\sf of} \; {\sf Miniature} \; {\sf Sections} \end{array}$ 

# Single Tier

C = .35 [8.89] + (.25 [6.35] X N) L = .50 [12.7] + (.25 [6.35] X N)

### **On Standard Channel:**

 $\begin{array}{l} C_{CH} = 2.00 \; [50.8] + (.25 \; [6.35] \; X \; N) \\ L_{CH} = 2.75 \; [69.85] + (.25 \; [6.35] \; X \; N) \\ N = No. \; of \; Single \; Tier \; Sections \end{array}$ 

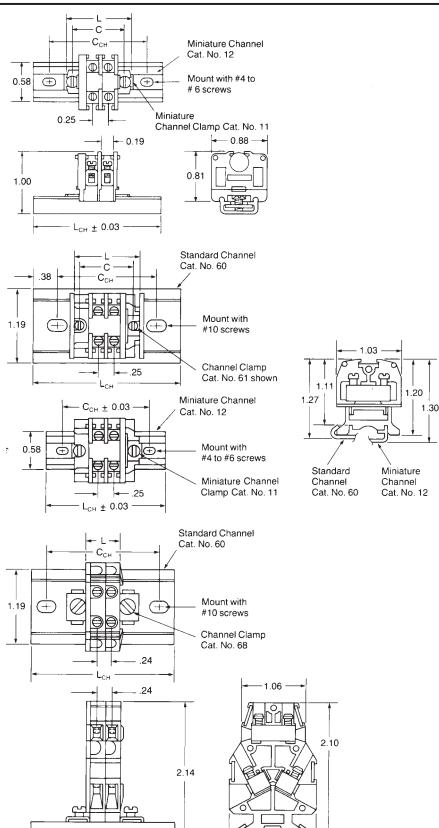
### **On Miniature Channel:**

 $\begin{array}{l} C_{CH} = 1.00 \; [25.4] + (.25 \; [6.35] \; X \; A) \\ L_{CH} = 1.35 \; [34.29] + (.25 \; [6.35] \; X \; A) \\ A = N \; when \; N \; is \; Even \\ A = N + 1 \; when \; N \; is \; Odd \\ N = No. \; of \; Single \; Tier \; Sections \end{array}$ 

**Double Tier** L = .08 [2.03] + (.24 [6.10] X N)

### **On Miniature Channel:**

 $\begin{array}{l} C_{CH} = 1.58 \; [2.03] + (.24 \; [6.10] \; X \; A) \\ L_{CH} = 2.33 \; [59.18] + (.24 \; [6.10] \; X \; A) \\ N = No. \; of \; Double \; Tier \; Sections \end{array}$ 



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# Tyco Electronics

# 900 Series, Medium Duty

### **Product Facts**

- n High circuit density 183 circuits per 6-foot length, 3/8 inch pitch.
- n Choice of five contact styles tubular clamp, tubular screw, strap screw, quick connect and tubular screw quick connect.
- n Sections snap-fit with Heavy Duty, Intermediate Heavy Duty, and Fuse & Switch blocks.
- n Readily identify circuits mark directly on block sections or use removable marking strip. Preprinted marking strips also available.
- ${\rm n}$  Rated up to 50 amperes per circuit.
- n Flat base models mount directly to surfaces or on miniature channel. Dovetail base mounts on standard size channel.
- n Packaged for rapid handling and assembly - 100 per carton.
- n Only one end section needed per block assembly.
- n Fanning strips interlocking sectional fanning strips allow entire circuit groups to be connected and disconnected as a single unit.
- n Factory assembled blocks available, including marking strips and different contact sections.

<image>

NEMA 900 Series is available in .375" [9.53] centerline, in direct or channel mount, tubular or strap versions, and screw, clamp or quick connect configurations. Corrosionresistant versions are also available.

NEMA 900 Series snap fit with the Medium Duty 500, 600 and 700 Series, as well as with the Heavy Duty, Intermediate Heavy Duty and Fuse & Switch blocks.



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Characteristics	Str	ap Screw	Tubu	lar Screw	Tubula	r Clamp	Quick	Connect
Type of Block	Model	Part Number	Model	Part Number	Model	Part Number	Model	Part Number
Direct Mount (Flat Base) Standard	921	1546143-1	924	1546147-1	925	1546234-1	927	1546149-1
Corrosion Resistant (Duramax)	D921	1546143-2	D924	1546147-2	D925	1546234-2		_
Channel Mount (Dovetail Base) Standard	0921	1546144-1	0924	1546148-1	0925	1546235-1	0927	1546150-1
(Duramax)	D0921	1546144-2	D0924	1546148-2	D0925	1546235-2	-	_
Contact Type								
	[						Ś	e ve
Specifications					ـــــــــــــــــــــــــــــــــــــ		0	J
Wire Range (AWG) Solid & Stranded	10*	, 22-14	:	22-8	:	22-8	-	_

900 Series, 600V Medium Duty, 0.375" [9.53] Pitch

Wire Strip Length (in.)		_	-	11/32		11/32		_
Screw Type		6-32 ing Head		10-32 n Head	Slotte	10-32 d Pan Head		_
Ampacity	35	A*, 15A		50 A		30 A	2	20 A
End Sections								
Direct Mount	930	1546163-1	930	1546163-1	930	1546163-1	930	1546163-1
Channel Mount	0930	1546164-1	0930	1546164-1	0930	1546164-1	0930	1546164-1

Channel Mount \*Acceptable for 35A max. factory wiring only when used with 10AWG wire preterminated with suitable ring tongue terminals. Note: Standard package is 100 pieces for contact, 25 pieces for end section.

# **Comparison (Type of Block)**



**Direct Mount** (Flat Base)



**Channel Mount** (Dovetail Base)



Dimensions are in millimeters

and inches unless otherwise specified.

Dimensions are shown for reference purposes only. Specifications subject to change.

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Catalog 1308389

# ₹ Tyco Electronics

# 900 Series, 600V Medium Duty, 0.375" [9.53] Pitch (Continued)

### Independent Testing Service Listing and Recognition

WIRE SIZES, Solid or Stranded Tubular Screw 1 #18 AWG to 1 #8 AWG, 2 or 3 #12 AWG, 2 to 4 #14 AWG, 2 or 4 #16 AWG, 2 to 5 #18 AWG, Tubular Clamp 1 #22 AWG to 1 #10 AWG, 2 #12 AWG, 2 or 3 #14 AWG, 2 to 4 #16 AWG, 2 to 5 #18 AWG, 2 to 8 #20 AWG, 2 to 10 #22 AWG, Strap Clamp 1 #22 AWG to 1 #10 AWG



Tubular Screw & Quick Connect



Tubular Clamp with Blade



Tubular Clamp with Cantilever

Model Part Number	Model Part Number	Model Part Number
929 1546151-1	_	
0929 1546152-1	BP035M 3-1437394-6	BP35F 3-1437394-7
_	_	
Control Contro		
18-12	22-10	22-10
_	11/32	11/32
_	10-32 Phil-slot	10-32 Phil-slot
20 A	30 A	30 A
930 1546163-1		

930 1546163-1		—
0930 1546164-1	0930 1546164-1	—

Catalog 1308389 Revised 6-07 Dimensions are shown for reference purposes only. Specifications subject to change. USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803



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# ERT Series, Medium Duty Radiation Resistant

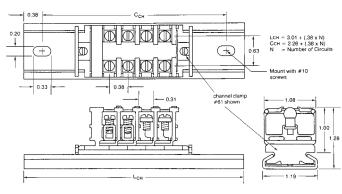


### Physical Properties Effect of Radiation on Physical Properties

The effects of radiation (neutron and gamma particles) on RYTON R-4 material have been studied. Since RYTON, as an engineering plastic, may fill applications in nuclear installations these effects are important. The test results show no effects on physical properties by these relatively high exposures to gamma and neutron radiation. There is no indication from these data of crosslinking or degradation of the RYTON R-4 material.

**Note:** Determination of the suitability of the ERT Series Blocks for particular applications rests solely with customers.





Description	Catalog Number	Part Number
Strap Screw	0721ERT	1437394-9
Tubular Clamp	0725ERT	1-1437394-6
Tubular Screw	0724ERT	1-1437394-1
End Section	0730ERT	2-1437394-0

Housing: RYTON (Polyphenyle	,	ASTM Test
Density	100 lbs./ft.3	D1505-68
Tensile Strength	19,500 psi	D638-72
Elongation	1.3%	D638-72
Flexural Modulus	1,700,000 psi	D790-91
Flexural Strength	29,000 psi	D790-91
Compressive Strength	21,000 psi	D695-69
Izod Impact Strength		
Unnotched, 1/8" Specimen	8.0 ft. lbs./in.	
Notched, 1/8" Specimen	1.4 ft. lbs./in.	
Rockwell Hardness	R-123	D785-65
Water Absorption	0.05%	D570-63
Heat Distortion Temp. @ 264 psi	500°F	D648-72
Specific Heat, 24 hrs. @ 25°C	0.25 btu/lb./°F	
Thermal Conductivity	2.0 btu-in./h-ft.2 F	
Coefficient/Linear Thermal Exp.	2.5 x 10-5 in./in./° F	
Flammability, UL 94	V-0	
Dielectric Strength	350 volts/mil	D149-64
Dielectric Constant, 25°C 1 kHz	3.9	D150-70
1MHz	3.8	
Dissipation Factor, 25°C 1kHz	0.0010	D150-70
1MHz	0.0013	
Conditions	In Reactor Core	In Water Pool
Temperature	35°C	30°C
Radiation	Mainly neutrons	Mainly gamma
Intensity	1010 ergs g-1 (C)	109 ergs g-1 (C)
Used Particle Detectors	Calorimeter and activation detectors	Ionization chambe
Radiation Dose	Flexural Strength psi	Modulus of Elasticity, psi
0	28,700	1,900,000
A. Neutron		
5 x 10 rad	29,000	1,910,000
1 x 10 rad	28,900	1,880,000
B. Gamma		
5 x 10 rad	29,700	1,810,000
1 x 10 rad	30,200	1,840,000
5 x 10 rad	28,500	1,820,000
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Catalog 1308389 Dimensions are in millimeters Revised 6-07 and inches unless otherwise specified.

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# **Medium Duty Accessories**

### **Mounting Channel**





Min	iature	Steel Break Pre-punche Away Aluminum Channel Steel Channel		Away		m	
Part Number	Catalog Number	Part Number	Catalog Number	Part Number	Catalog Number	Part Number	Catalog Number
1437381-8	12	9-1437381-1 9-1437381-8	60 63-BU	9-1437381-2	60-B-36	9-1437381-9 1437382-2	64 67
Standard Lengt	Standard Length						
3 feet 6 feet 3 feet			3 fe	3 feet 6 feet 3 feet			

### **Channel Clamps**



Screw Channel Clamps	Universal Clamps	Snap-In Clamps	Miniature for #12 Channel	See-thru Cover	Ganging Rod	Polarizing Plug
Part Number						
9-1437381-5	1437382-3	9-1437381-7	1437381-4	1-1437382-2	3-1437381-9	2-1437382-5
Catalog Numb	er					
61	68	62	11	71	30-BU	84
Standard Leng	ıth					
_	_		_	_	2 feet	_

### Jumpers



	Jumper for tubular Contacts	Snap-apart for Tubular Contacts	
Part Number			
	1437382-6	1-1437382-3	
Catalog Number			
	70	73	

### **Related Product Data**

### Wire Pins and Ferrules—Pages 109-111

For more information on AMP Standard Terminals and Splices or Quick-Connect FASTON Receptacles and Tabs, request Catalog 82042.

Catalog 1308389 Revised 6-07

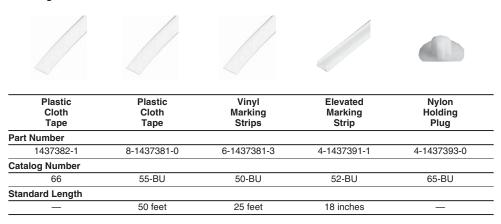
www.tycoelectronics.com

Dimensions are in millimeters and inches unless otherwise specified.

Dimensions are shown for reference purposes only. Specifications subject to change. USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803 South America: 55-11-2103-6000 Hong Kong: 852-2735-1628 Japan: 81-44-844-8013 UK: 8706-080-208 NEMA Terminal Blocks

### **Marking Accessories**

**BUCHANAN Terminal Blocks** 



### **Sectional Fanning Strips**



Strap Screw



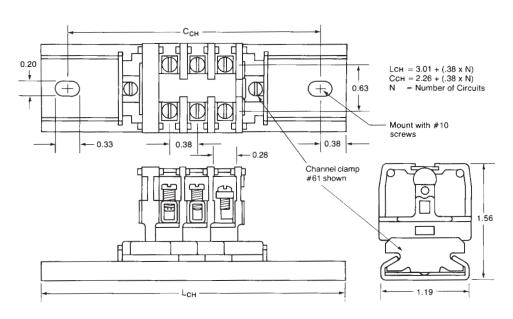
**Tubular Screw** 

Description	Standard Package	Part No.	Catalog No.
Tubular Screw	50	1-1437382-4	74
Strap Screw	50	1-1437382-7	78-TB
Molding Only, no contact	50	4-1437393-1	74100

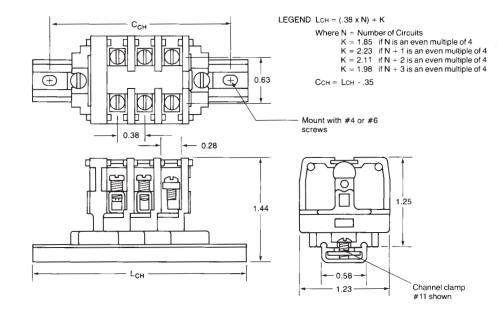
Dimensions are in millimeters and inches unless otherwise specified. Dimensions are shown for reference purposes only. Specifications subject to change. USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803







### Flat Base Mounted On Miniature #12 Channel



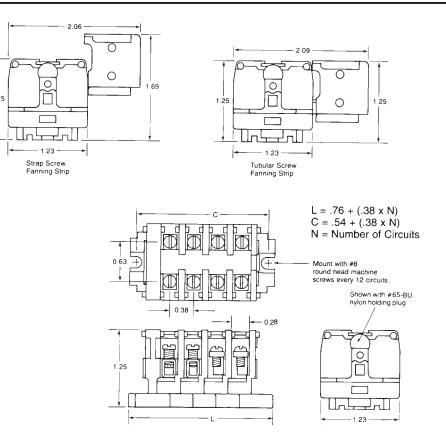
Catalog 1308389 Revised 6-07 Dimensions are in millimeters and inches unless otherwise specified.

Dimensions are shown for reference purposes only. Specifications subject to change. USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803 South America: 55-11-2103-6000 Hong Kong: 852-2735-1628 Japan: 81-44-844-8013 UK: 8706-080-208 255

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# 900 Series, Flat Base

**BUCHANAN Terminal Blocks** 



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Catalog 1308389 Dimension Revised 6-07 and inche specified.

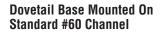
Dimensions are in millimeters and inches unless otherwise specified.

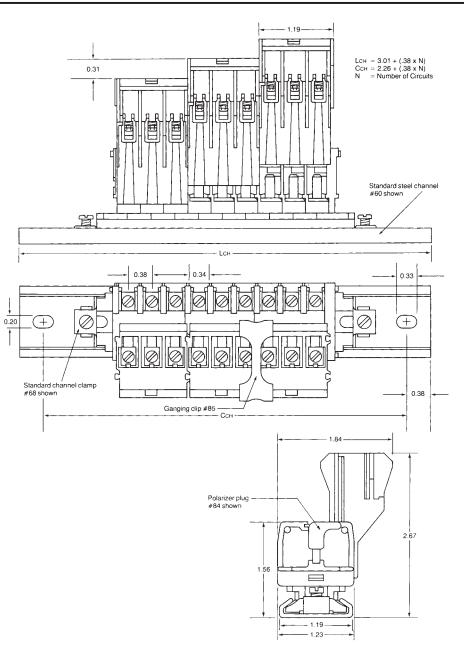
Dimensions are shown for reference purposes only. Specifications subject to change. USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803



**Note:** All part numbers are RoHS Compliant.

# **BP Series, Plug-in Blocks**



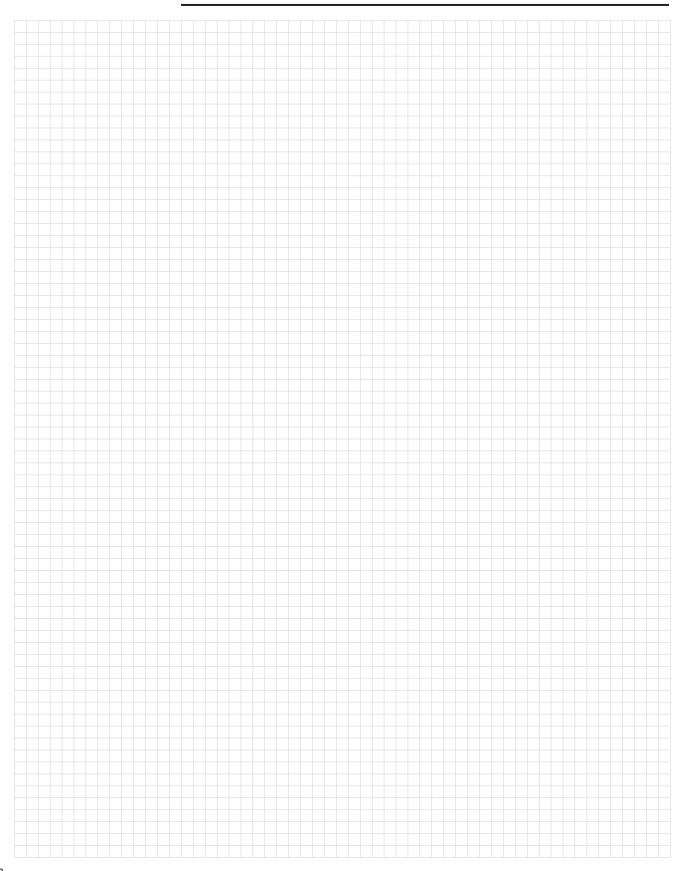


Catalog 1308389 Revised 6-07

Dimensions are in millimeters and inches unless otherwise specified. Dimensions are shown for reference purposes only. Specifications subject to change. USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803 South America: 55-11-2103-6000 Hong Kong: 852-2735-1628 Japan: 81-44-844-8013 UK: 8706-080-208 257



**Engineering Notes** 



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Catalog 1308389 Revised 6-07

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Dimensions are shown for reference purposes only. Specifications subject to change.

USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803

# ₹<sub>Тусо</sub> Electronics

# **200 Series Heavy Duty**

### **Product Facts**

- n Choose from 5 different contact styles.
- ${\rm n}$  600 volt UL and NEMA rating.
- ${\rm n}$  Conservatively rated from 50 to 90 amperes per circuit, depending on which contact style is selected.
- ${\rm n}$  Choose any of three mounting methods — twoway flat base models surface mount directly to the panel or snap-on miniature channel. Dovetail base models mount on standard channel.
- n Packaged for rapid handling and assembly — snap-fit sections are packed 10 per carton.
- n Only one end section needed per block assembly.
- n Readily identify circuits mark directly on block sections or use removable marking strip. Pre-printed strips are also available.

This compact, heavy duty block line accepts single or combination wires up to #4 AWG, solid or stranded. The compact design allows at least 138 circuits per 6foot length to be mounted. The pitch of this 600 volt block is 0.50" [12.70] (centerline spacing).





South America: 55-11-2103-6000 Hong Kong: 852-2735-1628 Japan: 81-44-844-8013 UK: 8706-080-208

Dimensions are in millimeters and inches unless otherwise specified.

Dimensions are shown for reference purposes only. Specifications subject to change.

USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803

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Catalog 1308389

Revised 6-07



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Characteristics	Strap Screw	Strap Clamp	Tubular Screw	Tubular Clamp	
Type of Block	Model Part Number	Model Part Number	Model Part Number	Model Part Number	
Direct Mount (Flat Base) Nylon, Unpainted	241 3-1437390-9	248 4-1437390-2	242 4-1437390-0	243 4-1437390-1	
Polypropylene	P241 6-1437390-5	P248 6-1437390-8	P242 6-1437390-6	P243 6-1437390-7	
Channel Mount (Dovetail Base) Nylon, Painted	0241 1-1437390-6	0248 2-1437390-4	0242 2-1437390-0	0243 2-1437390-1	
Polypropylene	P0241 5-1437390-9	P0248 6-1437390-3	P0242 6-1437390-0	P0243-BU 6-1437390-2	
	E				
Specifications					
Wire Range (AWG) Solid & Stranded	22-10	18-8	18-4	18-6	
Wire Strip Length (in.)	-	1/2	1/2	1/2	
Screw Type	10-32 binding head	8-32 pan head	1/4-28 set screw	1/4-28 set screw	
Ampacity	35 A	50 A	85 A	65 A	
End Sections					
Direct Mount, Nylon	250 4-1437390-3	250 4-1437390-3	250 4-1437390-3	250 4-1437390-3	
Direct Mount, Polypropylene	P250 6-1437390-6	P250 6-1437390-6	P250 6-1437390-6	P250 6-1437390-6	
Channel Mount, Nylon	0250 2-1437390-5	0250 2-1437390-5	0250 2-1437390-5	0250 2-1437390-5	
Channel Mount, Polypropylene	P0250 6-1437390-4	P0250 6-1437390-4	P0250 6-1437390-4	P0250 6-1437390-4	

200 Series, Heavy Duty, 600V, 0.50" [1.27] Pitch

### Notes:

For factory assembled blocks, suffix Catalog Number with number of blocks desired. See page 264-266 for dimensions and other details.

(Maximum number of flat base preassembled sections is 12).

Example: Ten tubular clamp, dovetail based sections, preassembled on channel = 024310

Example: Twelve polypropylene strap clamp flat base sections = P24812

For unpainted factory assembled blocks supplied with a removable marking strip add — 1 to Catalog Number.

For blocks with two or more different contact sections, imprinted marking strips, or special features, consult Technical Support.

## **Comparison (Type of Block)**



Direct Mount (Flat Base)



Channel Mount (Dovetail Base)



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Catalog 1308389 Dim Revised 6-07 and

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# 200 Series, Heavy Duty, 600V, 0.50" [1.27] Pitch (Continued)





Corrosion Resistant Strap Screw

- X - X
<b>Corrosion Resistant</b>
Tubular Screw

Tubular Screw

Model Part Number	Model Part Number
D241 4-1437389-0	D242 4-1437389-1
DP241 1776721-1	DP242 1776723-1
D0241 1776722-1 DP0241 6-1437389-0	D0242 1776724-1 DP0242 1776724-2
22-10	18-4

—	1/2
10-32 Nickel plated binding head	1/4-28 Nickel plated set screw
35 A	85 A

250	4-1437390-3	250	4-1437390-3
P250	6-1437390-6	P250	6-1437390-6
0250	2-1437390-5	0250	2-1437390-5
P0250	6-1437390-4	P0250	6-1437390-4





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# **200 Series Heavy Duty Accessories**

### **Mounting Channel**



Minia	Miniaturo		Steel Aw		Away Alu		punched Iminum hannel	
Part Number	Catalog Number	Part Number	Catalog Number	Part Number	Catalog Number	Part Number	Catalog Number	
1437381-8	12	9-1437381-1 9-1437381-8	60 63-BU	9-1437381-2	60-B-36	9-1437381-9 1437382-2	64 67	
Standard Length	tandard Length							
3 fe	et	6 fe 3 fe		3 fe	et	6 fe 3 fe		

### **Channel Clamps**



Screw Channel Clamps	Universal Clamps	Snap-In Clamps	Miniature for #12 Channel	See-thru Cover	Ganging Rod
Part Number					
9-1437381-5	1437382-3	9-1437381-7	1437381-4	1-1437381-6	3-1437381-9
Catalog Numb	er				
61	68	62	11	23-BU	30-BU
Standard Leng	lth				
	_	—	_	_	2 feet

### **Marking Accessories**

### Jumpers



Plastic Cloth Tape	Vinyl Marking Strips	Elevated Marking Strip	Nylon Holding Plug	Jumper for Tubular Contacts	Snap-Apart for Tubular Contacts
8-1437381-0	6-1437381-3	4-1437391-1	4-1437393-0	2-1437393-4	1-1437382-5
er					
55-BU	50-BU	52-BU	65-BU	42-BU	75
th					
50 feet	25 feet	18 inches	_		12 ckt
	Cloth Tape 8-1437381-0 er 55-BU th	Cloth Tape         Marking Strips           8-1437381-0         6-1437381-3           9r         55-BU         50-BU           th         50-BU         50-BU	Cloth Tape         Marking Strips         Marking Strip           8-1437381-0         6-1437381-3         4-1437391-1           pr         55-BU         50-BU         52-BU           th         55-BU         50-BU         52-BU	Cloth Tape         Marking Strips         Marking Strip         Holding Plug           8-1437381-0         6-1437381-3         4-1437391-1         4-1437393-0           sr         55-BU         50-BU         52-BU         65-BU           th         52-BU         52-BU         65-BU	Cloth TapeMarking StripsMarking StripHolding Plugfor Tubular Contacts8-1437381-06-1437381-34-1437391-14-1437393-02-1437393-4er55-BU50-BU52-BU65-BU42-BUth

### **Related Product Data**

Wire Pins and Ferrules—Pages 109-111 For more information on AMP Standard Terminals and Splices or Quick-Connect FASTON Receptacles and Tabs, request Catalog 82042.



South America: 55-11-2103-6000 Hong Kong: 852-2735-1628 Japan: 81-44-844-8013 UK: 8706-080-208

Catalog 1308389 Revised 6-07

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# 200 Series Heavy Duty Specifications

### **Material & Finish**

Voltage Rating: Blocks meet 600 volt creepage and clearance requirements of NEMA, UL and CSA for general industrial control equipment and panelboards. Withstand voltages greatly in excess of IEEE switchgear standards for 750 volts.

Ampacity: For a single #4 AWG wire the maximum amperage recommended is 85 amps.

### Standard Contacts:

Material: Electrical grade copper or copper alloy conductor. Steel Screws plated to resist corrosion in most industrial applications

AL-CU Tubular Screw: Aluminum compatibility with aluminum or copper conductors. AL-CU is tin-plated brass.

### **Environmental Contacts** (for highly corrosive atmospheres)

Tubular Screw: Electrical grade copper tube with nickel plating. Nickel plated brass screws.

Strap Screw: Nickel plated brass straps and screws. Nickel plating exceeds specification QQ-N-290 Class I, Type VII.

### Nylon Housing:

Material—Nylon; Unfilled Type 6/6 Max. Continuous Temperature-125°C [257°F]

Breakdown Voltage (AC, 60 Hz)-Contact-to-Contact: 7000V

Contact-to-Ground: 7800V Dielectric Strength (RH 40% at Sea Level)—470-385 Volts/mil

thickness Per ASTM D149 **UL High Voltage Arc Tracking** 

(inches/min.)-01-.35 Water Absorption (24 hrs. % wt.

gain)-1.5%

Flammability-UL94V-2

Chemical Resistance—Resistant to aromatic hydrocarbons, strong alkalies Per ASTM D543

Radiation Resistance (ergs g-1 (C)-8 x 107

Color-Translucent White

### Independent Testing Service Listing and Recognition

WIRE SIZES, Solid or Stranded Tubular Screw 1 #4 AWG, 1 #6 AWG, 1 or 2 #8 AWG, 1 to 4 #10 AWG, 1 or 5 #12 AWG, 1 to 4 #14 AWG, 1 or 6 #16 AWG. 1 to 8 #18 AWG. Tubular Clamp 1 #6 AWG, 1 or 2 #8 AWG, 1 to 3 #10 AWG, 1 to 4 #12 AWG, 1 or 4 #14 AWG, 1 to 6 #16 AWG, 1 or 8 #18 AWG Strap Clamp 1 #18 to 1 #8 AWG

### **Polypropylene Housing:**

Material—Polypropylene; Filled selfextinguishing

Max. Continuous Temperature-105°C (221°F)

Breakdown Voltage (AC, 60Hz)-Contact-to-Ground: 7800V Contact-to-Contact: 7000V

Dielectric Strength (RH 40% at Sea Level)-500 Volts/mil thickness Per ASTM D149

**UL High Voltage Arc Tracking** (inches/min.)—Did not Track

Water Absorption (24 hrs. % wt. gain)-0.02% Per ASTM D570

Flammability-UL94V-0

Chemical Resistance—Resistant to most acids, alkalines, and saline solutions. Also resistant to higher aliphatic solvents and polar substances per ASTM D543

Radiation Resistance (ergs g-1 (C)-No data Available

Color-Opaque White



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Catalog 1308389 Revised 6-07

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Dimensions are in millimeters and inches unless otherwise

Dimensions are shown for reference purposes only. Specifications subject to change.

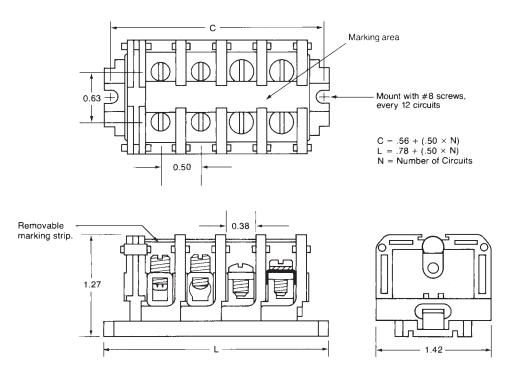
USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803



**Note:** All part numbers are RoHS Compliant.

# 200 Series, 600 Volt, Direct Mount

**Flat Base** 



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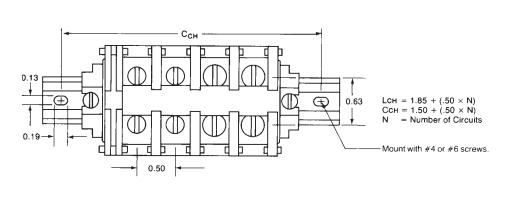
Dimensions are shown for reference purposes only. Specifications subject to change. USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803

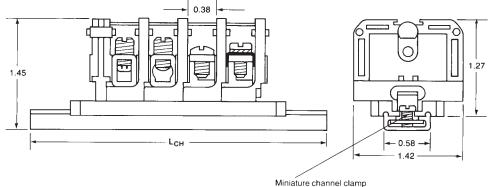


Note: All part numbers are RoHS Compliant.

# 200 Series, 600 Volt, Channel Mount

Flat Base Mounted On #12 **Miniature Channel** 





#11 shown

Catalog 1308389 Revised 6-07

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Dimensions are shown for reference purposes only. Specifications subject to change.

USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803 South America: 55-11-2103-6000 Hong Kong: 852-2735-1628 Japan: 81-44-844-8013 UK: 8706-080-208

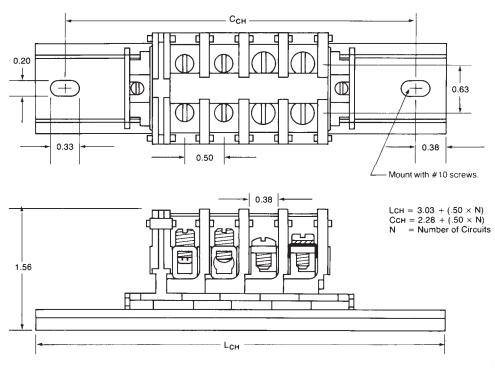
265

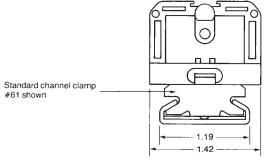


Note: All part numbers are RoHS Compliant.

# 200 Series, 600 Volt, Channel Mount (Standard)

**Dovetail Base Mounted On** Standard #60 Channel





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Revised 6-07

Catalog 1308389 www.tycoelectronics.com

Dimensions are in millimeters and inches unless otherwise specified.

Dimensions are shown for reference purposes only. Specifications subject to change.

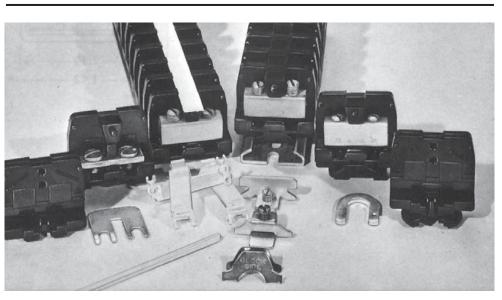
USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803

# Tyco Electronics

# 200 Series, Heavy Duty Phenolic Blocks

### **Product Facts**

- n Sturdy Heavy Duty block accepts single or combinations of wire up to #4 AWG solid or stranded at least 122 circuits per 6foot length, 9/16" center-tocenter spacing.
- n Choose from four different contact styles conservatively rated up to 90 amperes.
- ${\rm n}$  600 volt UL and NEMA rating.
- n Surface mounted flat base and channel mounted dovetail base models available.
- n Only one end section needed per block assembly.
- n Interlocking sectional fanning strips allow entire circuit groups to be connected and disconnected as a single unit.
- Readily identify circuits available with painted marking surface or use removable marking strip.
   Pre-printed strips are also available.
- n Factory assembled blocks available.
- n Heavy Duty Phenolic Block Sections Snap-fit with 300 & 600 volt, medium duty phenolic, heavy duty nylon and polypropylene, and Fuse and Switch blocks.



This family of phenolic heavy duty blocks is ideal for high temperature, high current applications. The rugged material withstands temperatures up to 302°F [150°C].



Catalog 1308389 Revised 6-07

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200 Series, Heavy Duty Phenolic, 600 V, 0.56" [14.24] Pitch

Characteristics	Strap	Screw	Stra	ıp Clamp	Tubula	r Screw	Tubula	ar Clamp	
Type of Block	Model	Part Number	Model	Part Number	Model	Part Number	Model	Part Number	
Direct Mount (Flat Base) Painted	221	3-1437390-1	228-BU	1-1437381-5	222-BU	3-1437390-3	223-BU	3-1437390-6	
Unpainted	211	2-1437390-7	218	3-1437390-0	212	2-1437390-8	213	2-1437390-9	
Channel Mount (Dovetail Base) Painted	0221	1437390-8	0228	1-1437390-3	0222	1437390-9	0223	1-1437390-2	
Unpainted	0211	1437390-1	0218	1437390-7	0212	1437390-3	0213	1437390-5	
Contact Type									
Specifications									
Wire Range (AWG) Solid & Stranded	2	2-10		18-8		18-4		18-6	
Wire Strip Length (in.)		_		1/2		1/2		1/2	
Screw Type		10-32 binding head		8-32 pan head w/clamp		1/4-28 set screw		1/4-28 set screw	
Ampacity	3	35 A		50 A		85 A		65 A	
End Sections									
Direct Mount	230-BU	1-1437381-7	230-BU	1-1437381-7	230-BU	1-1437381-7	230-BU	1-1437381-7	
Channel Mount	0230	1-1437390-4	0230	1-1437390-4	0230	1-1437390-4	0230	1-1437390-4	

### Notes:

For factory assembled blocks, suffix Catalog Number with number of blocks desired. See page 272 for dimensions and other details. (Maximum number of flat base preassembled sections is 12).

Example: Twenty dovetail based, tubular clamp blocks, preassembled on channel = 021320 (plain marking area)

Example: Twelve preassembled flat base, strap screw blocks = 22112 (painted marking area)

For factory assembled blocks supplied with a removable marking strip add -1 to Catalog Number.

For blocks with two or more different contact sections, imprinted marking strips, or special features, consult Technical Support.

Environmental contacts for highly corrosive atmospheres are available with nickel plating on non-ferrous hardware. To order, prefix Catalog # with "D".

Dimensions are in millimeters

and inches unless otherwise

### **Comparison (Type of Block)**





Direct Mount (Flat Base)

Channel Mount (Dovetail Base)



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Catalog 1308389 Revised 6-07

specified. www.tycoelectronics.com

Dimensions are shown for reference purposes only. Specifications subject to change. USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803

# 200 Series, Heavy Duty Phenolic, 600 V, 0.56" [14.24] Pitch (Continued)

Corrosion Resistant Strap Screw	Corrosion Resistant Tubular Screw	Corrosion Resistant Tubular Clamp		
Model Part Number	Model Part Number	Model Part Number		
D221 3-1437389-6	D222 3-1437389-8	D223 3-1437389-9		
D211 3-1437389-4	D212 3-1437389-5	D213 4-1437390-6		
D0221 1437389-7	D0222 1437389-8	D0223 1437389-9		
D0211 1437389-2	D0212 1437389-4	D0213 1437389-6		
Contact Type				
Specifications				
22-10	18-4	22-10		
	1/2	1/2		
10-32 Nickel plated binding head	1/4-28 Nickel plated set screw	1/4-28 Nickel plated set screw		
35 A	85 A	65 A		
230-BU 1-1437381-7	230-BU 1-1437381-7	230-BU 1-1437381-7		
0230 1-1437390-4	0230 1-1437390-4	0230 1-1437390-4		

# NEMA Terminal **I**

## **Sectional Fanning Strips**

Description	Part No.	Catalog No.	
Tubular Screw	1-1437381-8	24	
Strap Screw	1-1437381-9	27	
Molding Only, no contact	1447889-1	2400	

Note:

For factory assembled fanning strips, suffix Catalog Number with number desired.

Example: Ten factory assembled sections of #24 = 2410





Catalog 1308389 Revised 6-07

spec www.tycoelectronics.com

Dimensions are in millimeters and inches unless otherwise specified.

Dimensions are shown for reference purposes only. Specifications subject to change. USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803

**₹** Tyco Electronics

**Mounting Channel** 

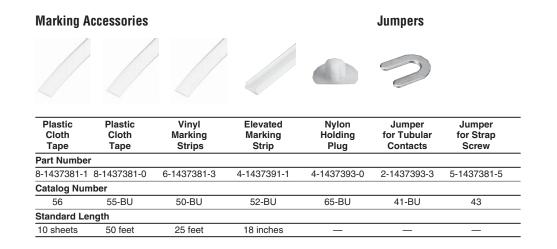
**BUCHANAN Terminal Blocks** 

Note: All part numbers are RoHS Compliant.

Steel Channel	Break Away Steel	Pre-punched Aluminum Channel	Screw Channel Clamps	Universal Clamps	Snap-In Clamps	See-thru Cover	Ganging Rod
Part Number							
9-1437381-1 9-1437381-8	9-1437381-2	9-1437381-9 1437382-2	9-1437381-5	1437382-3	9-1437381-7	1-1437382-2	3-1437381-9
Catalog Number							
60 63-BU	60-B-36	64 67	61	68	62	23-BU	30-BU
Standard Length							
6 feet 3 feet	3 feet	6 feet 3 feet	_	_	_	_	2 feet

200 Series, Heavy Duty Phenolic Accessories

**Channel Clamps** 



### **Related Product Data**

**Wire Pins and Ferrules**—Pages 109-111 For more information on AMP Standard Terminals and Splices or Quick-Connect FASTON Receptacles and Tabs, request Catalog 82042.

to change.

Dimensions are shown for

reference purposes only. Specifications subject

USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803 South America: 55-11-2103-6000 Hong Kong: 852-2735-1628 Japan: 81-44-844-8013 UK: 8706-080-208

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Catalog 1308389 Dimensions are in millimeters and inches unless otherwise specified. Revised 6-07

www.tycoelectronics.com

# 200 Series, Heavy Duty Phenolic Specifications

### Material & Finish

### **Standard Contacts**

**Material:** Electrical grade copper or copper alloy conductor. Steel Screws plated to resist corrosion in most industrial applications.

Environmental Contacts (for highly corrosive atmospheres)

**Tubular Screw:** - Electrical grade copper tube with nickel plating. Nickel plated brass screws.

Strap Screw: - Nickel plated brass straps and screws

Nickel plating exceeds specification QQ-N-290 Class I, Type VII.

Wire Range: Strap Screw: #22-10 AWG max., solid or stranded with crimp terminals

**Strap Clamp:** #18-8 AWG, solid or stranded

Tubular Screw: #18-4 AWG, solid or stranded

**Tubular Clamp:** #18-6 AWG, solid or stranded

Wire Strip Length: Strap Screw: As needed for lugging

Strap Clamp: 1/2 in. [12.7] Tubular Screw: 1/2 in. [12.7]

Tubular Clamp: 1/2 in. [12.7] Screw Type: Strap Screw: 10-32

slotted binding head

Strap Clamp: 8-32 pan head w/ clamp Tubular Screw: 1/4-28 slotted headless

Tubular Clamp: 1/4-28 slotted headless

**Strap Screw:** Maximum width of lugs: 11/32 in. [8.73]

### Independent Testing Service Listing and Recognition

WIRE SIZES, Solid or Stranded Tublar Screw Tubular Screw 1 #4 AWG, 1 #6 AWG, 1 or 2 #8 AWG, 1 to 4 #10 AWG, 1 or 5 #12 AWG, 1 to 6 #14 AWG, 1 or 6 #16 AWG, 1 to 8 #18 AWG, Tubular Clamp 1 #6 AWG, 1 or 2 #8 AWG, 1 to 3 #10 AWG, 1 to 4 #12 AWG, 1 or 4 #14 AWG, 1 to 6 #16 AWG, 1 or 8 #18 AWG Strap Clamp 1 #18 to 1 #8 AWG

### Nylon Housing

**Material**—Phenolic, Filled Flame Retardant

Max. Continuous Temperature— 150°C, [302°F]

Breakdown Voltage— Contact-to-Contact: 7800V Contact-to-Ground: 9400V

Dielectric Strength (RH 40% at Sea Level)—300 Volts/mil thickness per ASTM #D149 UL High Voltage Arc Tracking

(Inches/min.)—.49-.58 [12.45-14.73]

Water Absorption (24 hrs. % wt. gain)—0.45% per ASTM D570

Flammability—UL94V-1 Chemical Resistance—Resistant to acids, alkalies, and aliphatic hydrocarbons and ketones, per

ASTM D543. **Radiation Resistance (ergs g-1** (C)—2.7 x 108 min.

Color—Black

(R25557 E63810

Catalog 1308389 Revised 6-07

www.tycoelectronics.com

Dimensions are in millimeters and inches unless otherwise specified.

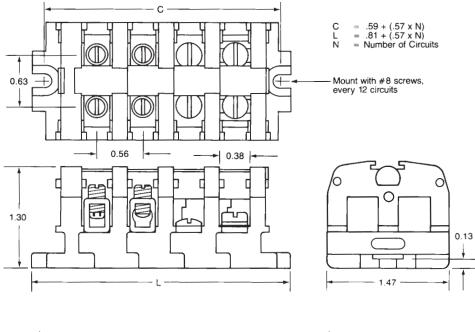
Dimensions are shown for reference purposes only. Specifications subject to change. USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803 LR25557 E63810 South America: 55-11-2103-6000 Hong Kong: 852-2735-1628 Japan: 81-44-844-8013

UK: 8706-080-208

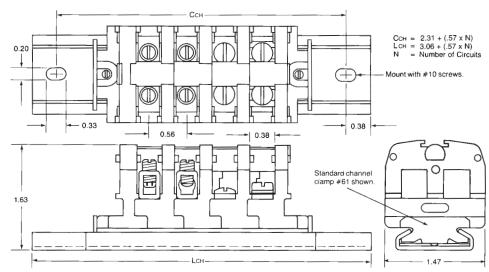
**Note:** All part numbers are RoHS Compliant.

# 200 Series, Heavy Duty Phenolic

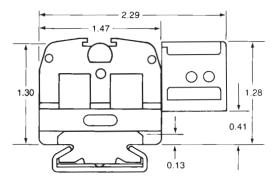




### Dovetail Base Mounted On Standard #60 Channel



## **Sectional Fanning Strips**





Catalog 1308389 Din Revised 6-07 and

Dimensions are in millimeters and inches unless otherwise specified.

Dimensions are shown for reference purposes only. Specifications subject to change. USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803

# 800 Series, Intermediate Heavy Duty

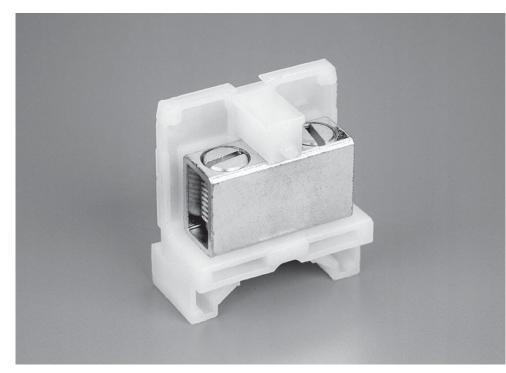
### **Product Facts**

€Тусо

n An exceptionally compact block that accepts single or combinations of AWG wire sizes as large as #1/0 — at least 92 circuits per 6-foot length, 3/4 inch center-tocenter spacing.

Electronics

- n Tubular screw contact style accepts AWG wire sizes from #12 thru #1/0, solid or stranded.
- ${\rm n}$  Same block mounts on surface or channel - twoway mounting base fits standard channel or mounts directly to flat surfaces.
- n Packaged for rapid handling and assembly - snap-fit sections packaged 10 per carton.
- n Contacts conservatively rated at 155 amperes per circuit when used with copper wire.
- ${\tt n}$  Only one end section needed per block assembly.
- n Readily identify circuits blocks available with painted marking surface or use removable vinyl marking strip. Preprinted marking strips are also available.
- n Factory assembled blocks available.
- n Nylon housing material for the most rugged applications.
- n Allen head screw for aluminum wire — screw tip design helps protect aluminum wire from overtightening. Slotted screw head for copper wire.
- n Intermediate Heavy Duty blocks snap-fit with 300 & 600V, Medium Duty phenolic, Heavy Duty nylon, polypropylene and phenolic and Fuse and Switch blocks.



This line of 600 volt blocks is rated up to 150 A and is available in a standard version and a corrosion resistant version.



Catalog 1308389 Revised 6-07

www.tycoelectronics.com

Dimensions are in millimeters and inches unless otherwise specified.

Dimensions are shown for reference purposes only. Specifications subject to change.

USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803



# 800 Series, Intermediate Heavy Duty, 600 V, 0.75" Pitch



### **Material & Finish**

Housing Material—Polyamide type 6/6, unfilled

Max Continuous Temp.—125°C [257°F]

Water Absorption (24hrs. % wt. gain)-1.5%

Flammability-UL94V-2

Chemical Resistance—Resistant to aromatic hydrocarbons, strong alkalies Radiation Resistance (ergs g-1 (C)-8 x 107

Color-Translucent white

### **Electrical Properties**

Voltage Rating—Blocks meet 600V clearance and creepage requirements of NEMA, UL, and CSA standards for general industrial control equipment and panelboards. Withstand voltages in excess of IEEE switchgear standards for 750V

Breakdown Voltage, AC, 60Hz-

Contact-to-Contact: 8,800V Contact-to-Ground: 9000V

Dielectric Strength — RH 40% @ Sea Level—470-385 Volts/mil thickness per ASTM D149

Operating Voltage—Blocks meet 600V creepage and clearance requirements; withstand voltage greatly exceeds standards for 750V

**UL High Voltage Arc Tracking** (in./min.)-01-.35 [.25-8.89]

Contacts

### **Standard Contacts**

Material—Electrical grade copper conductor

Screws-Steel, zinc plated to resist corrosion in most applications

### **Duramax Contacts** (for highly corrosive atmospheres)

Tubular Screw—Electrical grade copper tube with nickel plating; nickel plated brass screws. Nickel plating exceeds specification QQ-N-290 Class 1, Type VII.

Wire Range-#12-1/0 AWG, solid or stranded

Wire Strip Length—11/16" [17.46] Screw Type—7/16" [11.11] - 20 slotted headless screw

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Catalog 1308389 Revised 6-07

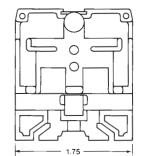
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Dimensions are in millimeters and inches unless otherwise specified.

Dimensions are shown for reference purposes only. Specifications subject to change.

USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803

South America: 55-11-2103-6000 Hong Kong: 852-2735-1628 Japan: 81-44-844-8013 UK: 8706-080-208



Same part used for both panel and channel mounting.

Description	Part No.	Catalog No.	
Tubular Screw, Unpainted	1437395-2	814	
Tubular Screw, Painted	1437395-3	824-BU	
Corrosion Resistant, Unpainted	5-1437389-8	D814-BU	
Corrosion Resistant, Painted	5-1437389-9	D824	
End Section	1-1437395-4	830-BU	

### Notes:

For factory assembled blocks on channel, prefix Catalog # with "0" and suffix with number of blocks desired. Without channel (maximum of 6 sections) delete "0". See page 275 for dimensions and other details. Example: Ten tubular screw sections preassembled on channel = 082410

For unpainted factory assembled blocks supplied with a removable marking strip add -1 to Catalog Number.

For blocks with two or more different contact sections, imprinted marking strips or special features; consult Technical Support.

### Independent Testing Service Listing and Recognition

UL Wire Sizes-Solid or Stranded. Tubular Screw 1 — #1/0 AWG, 1 — #1 AWG

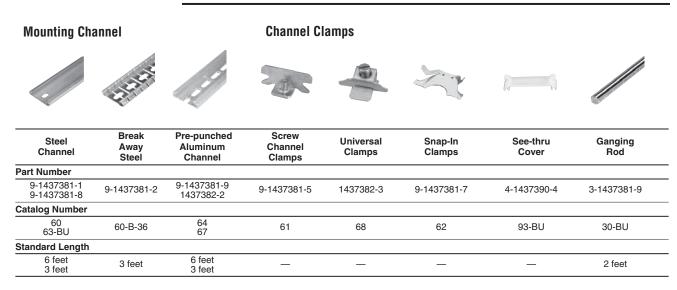
1 — #2 AWG, 1 or 2 — #4 AWG 1. 2 or 3 — #6 AWG. 1, 2, 3 or 5 — #8 AWG 1 to 6 — #10 AWG, 1 to 7 — #12 AWG



**Marking Accessories** 

**Note:** All part numbers are RoHS Compliant.

## 800 Series, Intermediate Heavy Duty Accessories



Plastic Plastic Elevated Vinyl Marking Marking Holding Cloth Cloth Snap-apart Strips Strip Screw Таре Таре Jumper Part Number 1437382-1 8-1437381-0 6-1437381-3 4-1437391-1 7-1437381-8 1-1437382-6 **Catalog Number** 50-BU 66 55-BU 52 53-BU 76 Standard Length 50 feet 25 feet 12 ckt 18 inches

RELATED PRODUCT DATA

**WIRE PINS AND FERRULES:** Pages 109-111 For more information on AMP Standard Terminals and Splices or Quick-Connect FASTON Receptacles and Tabs, request Catalog 82042.

Catalog 1308389 Revised 6-07

www.tycoelectronics.com

Dimensions are in millimeters and inches unless otherwise specified.

Dimensions are shown for reference purposes only. Specifications subject to change. USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803 South America: 55-11-2103-6000 Hong Kong: 852-2735-1628 Japan: 81-44-844-8013 UK: 8706-080-208

Jumpers

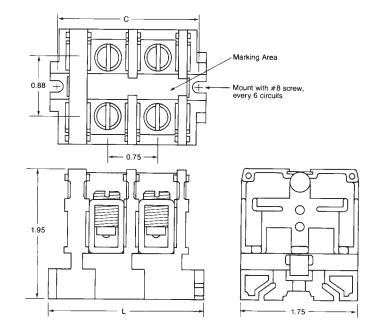


**BUCHANAN Terminal Blocks** 

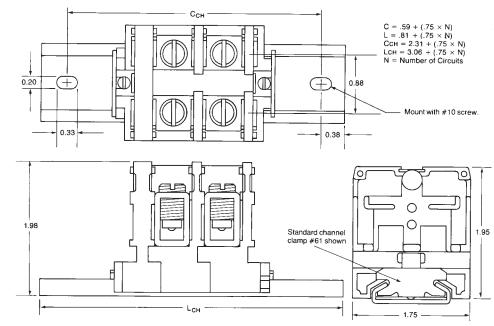
Note: All part numbers are RoHS Compliant.

## 800 Series, Intermediate Heavy Duty

**Flat Base** 



## **Dovetail Base Mounted On** Standard #60 Channel





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Revised 6-07

Catalog 1308389 www.tycoelectronics.com

Dimensions are in millimeters and inches unless otherwise specified.

Dimensions are shown for reference purposes only. Specifications subject to change.

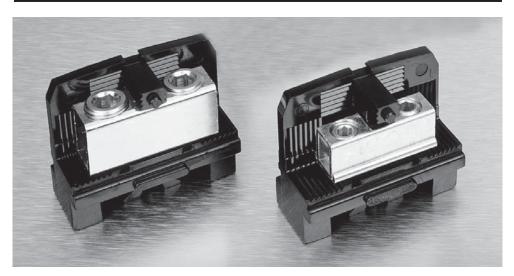
USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803

## 400 Series, Ultra Heavy Duty

## **Product Facts**

## 400 Series

- n Compact 2/0 or 250 kcmil (MCM) block - at least 57 circuits per 6- foot length, 1-3/16" [30.16] center-tocenter spacing.
- n High current capacity snapfit sectional block — tubular contacts accept single or combinations of wire sizes as large as 250 kcmil (MCM).
- n Two contact styles available; rated up to 270 amperes for copper wire.
- n Allen head screws allow maximum torque when using large wire sizes.
- <sup>n</sup> Withstand voltages in excess of IEEE switchgear standards for 750 volts. Meet clearance and creepage spacing specified in UL, CSA, and NEMA Industrial Control Standards for 600 volts.
- n Same block directly mounts on surface or channel mounts.
- n Only one end section needed per block assembly.
- n Readily identify circuits order blocks with painted marking area or use removable vinyl marking strip. Preprinted marking strips are also available.
- n Factory assembled blocks available.
- n Ultra Heavy Duty phenolic block sections do not snap-fit with other block styles.



This Ultra Heavy Duty line includes the 400 Series rated up to 270 A.



NEMA Terminal Blocks



Catalog 1308389 Revised 6-07

www.tycoelectronics.com

Dimensions are in millimeters and inches unless otherwise specified. Dimensions are shown for reference purposes only. Specifications subject to change. USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803

**BUCHANAN Terminal Blocks** 

**Note:** All part numbers are RoHS Compliant.

## 400 Series, Ultra Heavy Duty, 600 V, 1.19" [30.23] Pitch



## **Material & Finish**

Housing Material—Phenolic, filled flame retardant Flammability—UL94V-1 Color—Black

#### **Contacts:**

**Material**—Electrical grade copper conductor; plated steel screws resist corrosion

## Tubular Screw Type—

Small: 1/2" [12.7] - 13 Hex Large: 3/4" [19.05] - 16 Hex socket set screw

#### Mechanical Properties

Pitch (terminal spacing)—

1.19" [30.23]; 9 circuits/foot Wire Strip Length—

Tubular Screw (small): 1" [25.4] Tubular Screw (large): 1" [25.4]

### **Electrical Properties**

Maximum Current—255A for a single 250MCM wire

**Operating Voltage**—Blocks meet 600V creepage and clearance requirements; withstand voltage greatly exceeds standards for 750V

Wire Range—Tubular Screw (small): #4-#2/0 AWG solid or stranded; Tubular Screw (large): #6 AWG-250 kcmil (MCM) solid or stranded

#### Dielectric Strength (RH 40% @ sea level)—300 V/mil thickness per

ASTM D149 Breakdown Voltage, AC, 60Hz— Contact-to-Contact: 10,000V Contact-to-Ground: 10,000V

UL High Voltage Arc Tracking (in./min.)—.49-.58 [12.45-14.73]

#### **Environmental Properties**

#### Max. Continuous Temperature— 150°C [302°F]

Water Absorption (24hrs. % wt. gain)— .45% per ASTM D149 Chemical Resistance—Resistant to acids, alkalies, and aliphatic hydrocarbons and ketones per

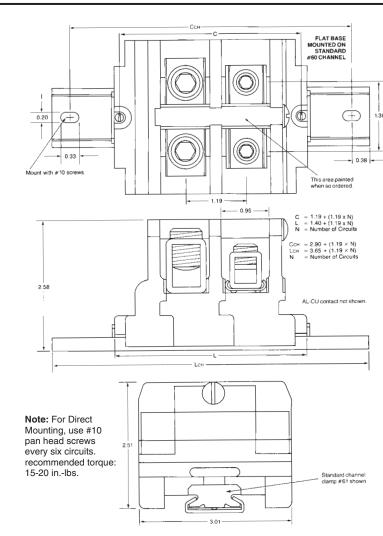
ASTM D543 Radiation Resistance (ergs g-1

(C)—2.7 x 108





spec spec com



## Same part used for both panel and channel mounting.

Description	Wire Range	Part Number	Catalog Number
Tubular Screw, Unpainted	#14-2/0	1437396-4	416
Tubular Screw, Painted	#14-2/0	1437396-7	426-BU
Tubular Screw, Unpainted	#6-250 kcmil/MCM	1437396-5	417
Tubular Screw, Painted	#6-250 kcmil/MCM	1437396-8	427-BU
End Section	_	1437396-9	430-BU

## UL Independent Testing Service Recognitions:

 Tubular Screw: Catalog # 416 & 426-BU

 1 #2/0 AWG, 1 #1/0 AWG, 1 #1 AWG,

 1 or 2 #2 AWG, 1 to 3 #4 AWG, 1 to 3 #6 AWG,

 1 to 4 #8 AWG, 1 to 6 #10 AWG, 2 to 8 #12 AWG,

 Tubular Screw: Catalog # 417 & 427-BU

 1 #250kcmil (MCM), 1 #4/0 AWG, 1 #3/0 AWG,

 1 or 2 #2/0 AWG, 1 or 2 #1/0 AWG, 1 or 2 #1 AWG, 1 to 3 #2 AWG, 1 to 4 #4 AWG,

 1 to 5 #6 AWG



South America: 55-11-2103-6000 Hong Kong: 852-2735-1628 Japan: 81-44-844-8013 UK: 8706-080-208

Dimensions are in millimeters and inches unless otherwise specified. Dimensions are shown for reference purposes only. Specifications subject to change. USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803

## 400 Series, Ultra Heavy Duty Accessories

#### **Mounting Channel** Channel Clamps Break Pre-punched Screw Steel Universal Snap-In Aluminum Away Steel Channel Channel Clamps Clamps Channel Clamps Part Number 9-1437381-1 9-1437381-9 9-1437381-2 9-1437381-5 1437382-3 9-1437381-7 9-1437381-8 1437382-2 Catalog Number 64 67 60 63-BU 60-B-36 62 61 68 Standard Length 6 feet 3 feet 6 feet 3 feet 3 feet \_ \_ \_

## **Marking Accessories**



Standard Length	U
50 feet 25 feet 18 inches -	

#### Notes:

Dimensions are in millimeters

For factory assembled blocks on channel, prefix Catalog # with "0" and suffix with number of blocks desired. Without channel (maximum of 6 sections) delete "0".

Example: Ten tubular screw sections preassembled on channel = 041710

For unpainted factory assembled blocks supplied with a removable marking strip add -1 to Catalog Number.

For blocks with two or more different contact sections, imprinted marking strips or special features, consult Technical Support.

### **Related Product Data**

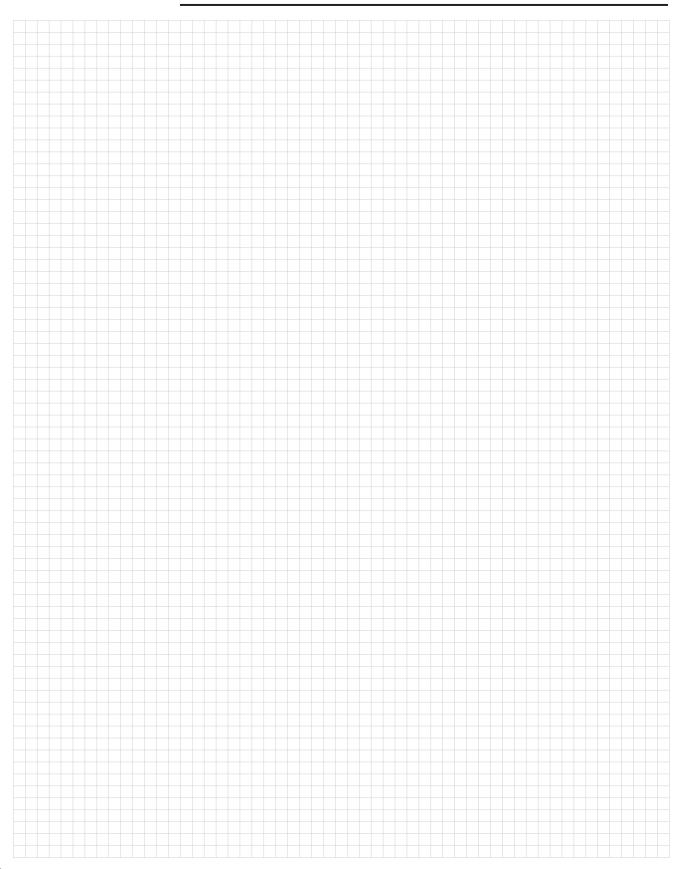
Wire Pins and Ferrules—Pages 109-111 For more information on AMP Standard Terminals and Splices or Quick-Connect FASTON Receptacles and Tabs, request Catalog 82042.

Catalog 1308389 Revised 6-07

Revised 6-07 and inches unless otherwise specified. www.tycoelectronics.com Dimensions are shown for reference purposes only. Specifications subject to change. USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803 South America: 55-11-2103-6000 Hong Kong: 852-2735-1628 Japan: 81-44-844-8013 UK: 8706-080-208 NEMA Terminal Lo



## **Engineering Notes**



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Catalog 1308389 Revised 6-07 www.tycoelectronics.com

Dimensions are in millimeters and inches unless otherwise specified.

Dimensions are shown for reference purposes only. Specifications subject to change. USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803

## **Fuse & Switch**

## **Product Facts**

- **High Density Blocks**
- n Fuse and Switch Blocks rated 15A and 300V.
- n High Density 0.36" [9.14] centerline spacing saves panel space; at least 33 circuits per foot.

## **Fuse Blocks**

- n Provide in-line circuit protection for virtually any circuit or group of circuits select contacts for terminated or unterminated wire
- **n** Remove, check and replace fuses safely and quickly switch action fuse blocks open circuits before fuse can be removed or installed.
- **n** Contacts conservatively rated to 30 amperes.

## **Switch Blocks**

- n Quickly and easily interrupt a circuit or aroup of circuits insert switch blocks directly in line. Contacts available for terminated or unterminated wire.
- n Keep circuits open for extended periods — switch blade can be removed entirely from block for lockout protection.
- n Rated to 15 amperes.
- Common Features of 300 & 0300 Series
- n At least 91 circuits per 6-foot length, 3/4 inch center-tocenter spacing.
- n Blocks meet 600 volt clearance and creepage spacings specified in UL, **CSA**, and NEMA Industrial **Control Standards.**
- n Choose nylon housing material — for more rugged applications; polypropylene for fire retardant characteristics.
- n Dovetail base fits standard mounting channel — can also be mounted on flat surfaces.
- **n** Only one end section needed per block assembly.

- n Readily identify circuits mark directly on white, matte-surface puller assembly, marking tab on block, or use removable marking tape.
- n Open or close several circuits simultaneously holes in puller handles allow use of nylon "ganging" rods.
- n Fuse and Switch block sections snap-fit with 300 & 600 Volt, phenolic Medium Duty, Heavy Duty, and Intermediate Heavy Duty



Catalog 1308389 Revised 6-07

and inches unless otherwise specified. www.tycoelectronics.com

Dimensions are shown for reference purposes only. Specifications subject to change.

USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803

South America: 55-11-2103-6000 Hong Kong: 852-2735-1628 Japan: 81-44-844-8013 UK: 8706-080-208

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Dimensions are in millimeters

blocks.

This broad line features High Density Blocks (Series 0135), Nylon & Polypropylene Blocks (Series 0300) and Phenolic Blocks (Series 300).

# €Тусо Electronics

## 0300 Series, Fuse & Switch, Nylon and Polypropylene

		Block Screw		e Block o Clamp		se Block lar Screw	-	ch Block p Screw
Characteristics Type of Block	Model	Part Number	Model	Part Number	Model	Part Number	Model	Part Number
Channel Mount (Dovetail Base) Nylon	0311	1437397-1	0318	1437397-3	0312	1437397-2	0371	1-1437397-7
Polypropylene	P0311	4-1437397-0	P0318	4-1437397-3	P0312	4-1437397-2	P0371	4-1437397-4
Corrosion Resistant Nylon	D0311	1-1437389-1	D0318	1776726-1	D0312	1-1437389-2	D0371	1-1437389-7
Corrosion Resistant Polypropylene	DP0311	6-1437389-2	DP0318	1776727-1	DP0312	6-1437389-3	DP0371	1776728-1
Contact Type								
	[							
Specifications								
Wire Range (AWG) Solid & Stranded	2	22-8	18	3-8	18	-8		22-8
Wire Strip Length (in.)		—	1	/2	1/	/2		_
Screw Type		0-32 ng head		-32 d w/clamp	1/4' set s		bin	10-32 ding head
Ampacity								
	2	25 A	25	5 A	25	A		15 A
End Sections								
Channel Mount, Nylon	0380	2-1437397-0	0380	2-1437397-0	0380	2-1437397-0	0380	2-1437397-0
Channel Mount, Polypropylene	P0380	4-1437397-7	P0380	4-1437397-7	P0380	4-1437397-7	P0380	4-1437397-7

Notes: Standard package is 100 pieces for contact, 25 pieces for end section.

For factory assembled blocks on channel, suffix Catalog Number with number of blocks desired. Without channel delete "0" prefix on Catalog Number.

EXAMPLE:

Ten strap-screw fuse block sections preassembled on channel = 031110.

For blocks with two or more contact types, preassembled with other blocks, imprinting or special features, consult Technical Support.

Revised 6-07

Dimensions are shown for reference purposes only. Specifications subject to change.

USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803

## 0300 Series, Fuse & Switch, Nylon and Polypropylene (Continued)



Switch Block Strap Clamp



Switch Block **Tubular Screw** 

Model Pa Num		Model	Part Number
0378 1-1437	207.0	0372	1-1437397-8
P0378 4-1437		P0372	4-1437397-5
D0378 17767		D0372	1776731-1
DP0378 17767	-	DP0372	1776732-1
Ê			
18-8		1	8-8
1/2			1/2
	amp	1/-	

0380	2-1437397-0	0380	2-1437397-0
P0380	4-1437397-7	P0380	4-1437397-7

## **Specifications**

Pitch—0.75" [19.05] centerline, 16 circuits per foot

Voltage Rating—Blocks meet 600 volt creepage and clearance requirements of NEMA, UL and CSA for general industrial control equipment and panelboards. Withstand voltages greatly in excess of IEE switchgear standards for 750 volts. Fuse Size—Any 13/32 x 1-1/2 in. [10.32 x 28.10] ferrule type cartridge fuse up to 25 amps, indicating or non-indicating, which meets Mil. Spec. F-15160.

## Standard Contacts

Material—Electrical grade copper or copper alloy conductor. Steel Screws plated to resist corrosion in most industrial applications

AL-CU Tubular Screw—Aluminum compatibility with aluminum or copper conductors. AL-CU is tin-plated brass.

#### **Environmental Contacts** (for highly corrosive atmospheres)

Tubular Screw—Electrical grade copper tube with nickel plating. Nickel plated brass screws.

Strap Screw-Nickel plated brass straps and screws. Nickel plating meets specification QQ-N-290A Class I, Grade G.

## **Polyamide Material:**

Housing Material—Polyamide, Unfilled Type 6/6

Max. Continuous Temperature—125°C, (257°F)

## Breakdown Voltage (AC, 60 Hz)-

Contact-to-Contact: 7000V

Contact-to-Ground: 10.000V

Dielectric Strength (RH 40% at Sea Level)—470-385 Volts/mil thickness Per ASTM D149

UL High Voltage Arc Tracking (inches/min.)-01-.35 [.25-8.89]

Water Absorption (24 hrs. % wt. gain)-1.5% per ASTM D570 Flammability-UL94V-2

Chemical Resistance—Resistant to aromatic hydrocarbons, strong alkalies per ASTM D543

Radiation Resistance (ergs g-1 (C)-8 x 107

## Color-Translucent White

## **Polypropylene Material:**

Housing Material—Polypropylene, Filled self-extinguishing

Max. Continuous Temperature—105°C, (221°F)

Breakdown Voltage (AC, 60Hz)-

Contact-to-Ground: 10.000V

Contact-to-Contact: 7000V

Dielectric Strength (RH 40% at Sea Level) - 500 Volts/mil thickness per ASTM D149

UL High Voltage Arc Tracking (inches/min.)—Did not track Water Absorption (24 hrs. % wt. gain)-0.02% Per ASTM D570

Flammability—UL94V-0

Chemical Resistance—Resistant to most acids, alkalines, and saline solutions. Also resistant to higher aliphatic solvents and polar substances per ASTM D543 Radiation Resistance (ergs g-1 (C)— No data Available

Color-Opaque White

Material Color

Switch Handle:

Fuse Puller:

Material Color

Catalog 1308389 Revised 6-07

Dimensions are in millimeters and inches unless otherwise specified.

High-temperature, glass-reinforced nylon

Polypropylene

Black

White

Dimensions are shown for reference purposes only. Specifications subject to change.

USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803 283

## 0300 Series, Fuse & Switch, Nylon and Polypropylene (Continued)

## **Mounting Channel**

Steel Channel	Break Away Steel	Pre-punched Aluminum Channel
Part Number		
9-1437381-1 9-1437381-8	9-1437381-2	9-1437381-9 1437382-2
Catalog Number		
60 63-BU	60-B-36	64 67
Standard Length		
6 feet 3 feet	3 feet	6 feet 3 feet
-		

## **Channel Clamps**

## Marking Accessories



Screw Channel Clamps	Universal Clamps	Snap-In Clamps	Ganging Rod	Coated Cloth Marking tape
Part Number				
9-1437381-5	1437382-3	9-1437381-7	3-1437381-9	8-1437381-0
Catalog Numbe	er			
61	68	62	30	55-BU
Standard Leng	th			
	_	_	2 feet	50 feet

## **Related Product Data**

Wire Pins and Ferrules—Pages 109-111 For more information on AMP Standard Terminals and Splices or Quick-Connect FASTON Receptacles and Tabs, request Catalog 82042.

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Catalog 1308389 Dime Revised 6-07 and

www.tycoelectronics.com

Dimensions are in millimeters and inches unless otherwise specified. Dimension reference p Specification to change.

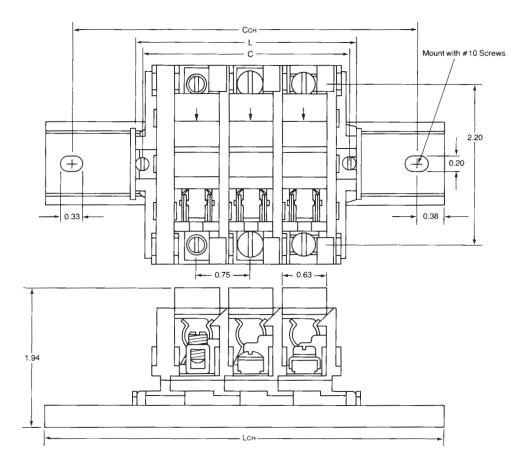
Dimensions are shown for reference purposes only. Specifications subject to change.

USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803



## 0300 Series, Fuse & Switch, Nylon and Polypropylene (Continued)

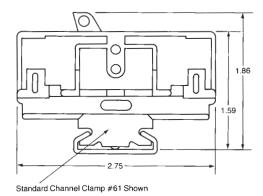
Dovetail Base Mounted On Standard #60 Channel. May Also Be Mounted Direct



# $\begin{array}{l} \textbf{CHANNEL MOUNTED} \\ \textbf{CCH} &= 2.28 + (.75 \times N) \\ \textbf{LCH} &= 3.03 + (.75 \times N) \\ \textbf{N} &= \textbf{Number of Circuits} \end{array}$

DIRECT MOUNTED

 $\begin{array}{l} C &= .56 + (.75 \times N) \\ L &= .78 + (.75 \times N) \\ N &= Number of Circuits \end{array}$ 



Catalog 1308389 Revised 6-07

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Dimensions are in millimeters and inches unless otherwise specified.

Dimensions are shown for reference purposes only. Specifications subject to change. USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803 South America: 55-11-2103-6000 Hong Kong: 852-2735-1628 Japan: 81-44-844-8013 UK: 8706-080-208 285

Note: All part numbers are RoHS Compliant.

## 300 Series, Fuse & Switch, Phenolic



Characteristics	Strap	Strap Screw		Strap Clamp		Tubular Screw	
Type of Block	Model	Part Number	Model	Part Number	Model	Part Number	
Direct Mount (Flat Base) Fuse Block with Puller	351	2-1437397-8	358	3-1437397-1	352	3-1437397-0	
Fuse Block without Puller	361	2-1437397-2	368-BU	3-1437397-5	362-BU	3-1437397-3	
Switch Block	341	2-1437397-5	348	2-1437397-7	342	2-1437397-6	
<b>Channel Mount (Dovetail Base)</b> Fuse Block with Puller	0351	1437397-9	0358	1-1437397-2	0352	1-1437397-0	
Fuse Block without Puller	0361	1437397-4	0368	1-1437397-6	0362	1-1437397-5	
Switch Block	0341	1437397-6	0348	1437397-8	0342	1437397-7	
Contact Type							
	Ę	3					
Specifications							
Wire Range (AWG) Solid & Stranded	22	2-8	1	8-8		18-8	
Wire Strip Length (in.)	-	_	-	1/2		1/2	
Screw Type		32 g head		-32 d w/clamp		1/4"-28 set screw	
Ampacity							
Fuse Blocks	2	ōΑ	2	5A		25A	
Switch Blocks	15	5A	1	5A		15A	
End Sections					-		
No Contact, Flat Base	330-BU	2-14376397-4	330-BU	2-14376397-4	330-BU	2-14376397-4	
No Contact, Dovetail Base	0330	14376397-5	0330	14376397-5	0330	14376397-5	

**Comparison (Type of Block)** 

Notes: Standard package is 10 pieces.

For factory assembled blocks, suffix Catalog Number with number of blocks desired (Maximum number of flat base preassembled sections is 6). EXAMPLE:

Twelve strap screw, fuse block sections preassembled on channel = 035112. Six flat tubular screw, switch blocks preassembled without channel for direct mounting = 3426

For blocks with two or more different contact sections, preassembled with other blocks, imprinting or special features, consult Technical Support.

Environmental contacts for highly corrosive atmospheres are available with Nickel plating on non-ferrous hardware. To order, prefix Catalog Number with "D".



Direct Mount (Flat Base)



**Channel Mount** (Dovetail Base)





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Catalog 1308389 Revised 6-07

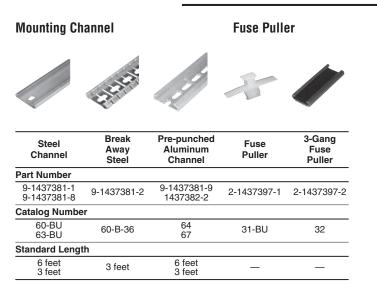
www.tycoelectronics.com

Dimensions are in millimeters and inches unless otherwise specified.

Dimensions are shown for reference purposes only. Specifications subject to change.

USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803

## 300 Series, Fuse & Switch, Phenolic-Accessories



## **Channel Clamps**

## **Marking Accessories**

\_





Screw Channel Clamps	Universal Clamps	Snap-In Clamps	Ganging Rod	Coated Cloth Marking Tape	
Part Number					
9-1437381-5	1437382-3	9-1437381-7	3-1437381-9	8-1437381-0	
Catalog Numbe	er				
61	68	62	30	55-BU	
Standard Lengt	th				
_	_	_	2 feet	50 feet	

## **Physical Properties**

Housing Material—Phenolic, filled flame retardant Color—Black

#### Contacts

**Material**—Copper alloy spring clips. Steel screws plated to resist corrosion in most industrial applications

Strap Screw—11/32" max. lug width

#### **Mechanical Properties**

**Pitch (terminal spacing)**—0.75" [19.05] (16 circuits per foot)

#### **Switch Handles**

Material—Polypropylene

Color—White

## **Electrical Properties**

**Operating Voltage**—Blocks meet 600V creepage and clearance requirements of NEMA, UL and CSA standards for general industrial control equipment and panelboards; withstand voltage exceeds IEEE switchgear standards for 750V

**Dielectric Strength (RH 40% @ sea level)**— 300 volts/mil thickness per ASTM D149

#### UL High Voltage Arc Tracking (inches/min.)— .49-.58 [12.45-14.73]

**Fuse Size**—Any 13/32 x 1-1/2 in. [10.32 x 38.10] ferrule type cartridge fuse up to 25 amps, indicating or non-indicating, which meets Mil. Spec. F-15160, is recommended.

#### **Environmental Properties**

Max. Service Temperature—150°C (302°F)

Water Absorption (24hrs. % wt. gain)—0.45% per ASTM D570

## Flammability Rating-UL94V-1

Chemical Resistance—Resistant to acids, alkalies, and aliphatic hydrocarbons and ketones, per ASTM D543

Radiation Resistance (ergs g-1 (C)-2.7 x 108

#### UL Independent Testing Service Recognitions:

Wire Sizes—Solid or Stranded, Tubular Screw Cat. # 362-BU, 0362 1 #4 AWG, 1 #6 AWG, 1 #8 AWG, 1 to 4 #10 AWG, 1 to 5 #12 AWG, 1 to 6 #14 AWG, 1 to 6 #16 AWG, 1 to 8 #18 AWG

## Cat #'s 31 and 32



E63810

## Wire Pins and Ferrules—Pages

**Related Product Data** 

135-137 For more information on AMP Standard Terminals and Splices or Quick-Connect FASTON Receptacles and Tabs, request Catalog 82042.

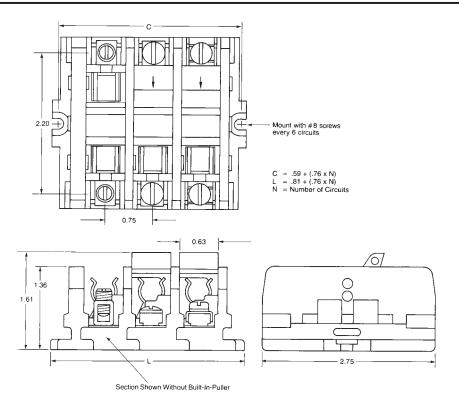
Catalog 1308389 Revised 6-07

www.tycoelectronics.com

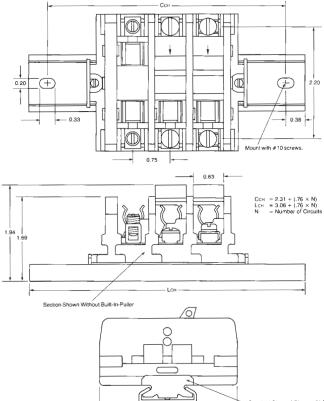
Dimensions are in millimeters and inches unless otherwise specified.

Dimensions are shown for reference purposes only. Specifications subject to change. USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803

## 300 Series, Fuse & Switch, Phenolic, Flat Base



Dovetail Base Mounted On Standard #60 Channel



Standard Channel Clamp #61 Shown

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Catalog 1308389 Dimensions are in millimeters Revised 6-07 and inches unless otherwise specified

www.tycoelectronics.com

Dimensions are in millimeters and inches unless otherwise specified. Specification to change.

Dimensions are shown for reference purposes only. Specifications subject to change.

USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803

2.75

## **One-Piece Phenolic Blocks**

## **Product Facts**

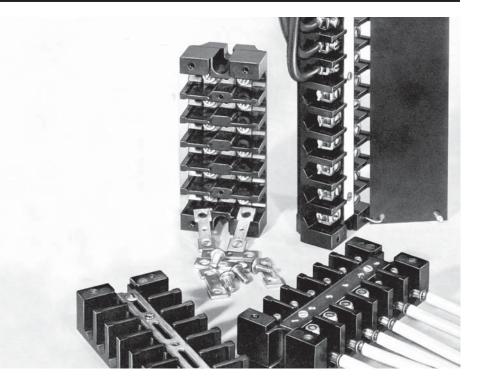
€Тусо

n Two, four, six, eight, and twelve circuit models available — 5/8" [15.88] center-to-center contact spacing.

Electronics

- n No assembly required each is a single, easily installed unit.
- **n** Three contact styles available -strap screw, captive strap clamp, and moving tubular contact.
- n Use wire up to #6 AWG with tubular contact. Strap screw and strap clamp contacts are available for #8 and smaller.
- n Withstand voltages in excess of IEEE standards for 750 volts. Meet clearance and creepage spacings specified in UL, CSA, and NEMA **Industrial Control Standards** for 600 Volts.
- ${\rm n}$  Strap contacts rated at 50 amperes — tubular contact conservatively rated at 70 amperes.
- n Pilot point screws supplied with strap screw and clamp contacts —speeds installation time.
- n Plain white marking strip supplied with each block circuits are easily identified.
- n Special purpose blocks available-choose from blocks with solder posts, printed circuit board pins, or nuts on screw posts, removable circuit links, and a shorting bar.

Traditionally, these rugged One-Piece Blocks are the standard means of connection for heavy industrial applications like rail transport, utility, and traffic control industries. Ideal for dirty and vibration prone environments.





NEMA Terminal Blocks



Catalog 1308389 Revised 6-07

www.tycoelectronics.com

Dimensions are in millimeters and inches unless otherwise specified.

Dimensions are shown for reference purposes only. Specifications subject to change.

USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803 South America: 55-11-2103-6000 Hong Kong: 852-2735-1628 Japan: 81-44-844-8013 UK: 8706-080-208

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## **Material & Finish**

₹ Тусо

Housing Material—Phenolic, filled flame retardant Flammability-UL94V-1 Color-Black

Electronics

#### Contacts

Standard Material—Electrical grade copper or copper alloy conductor. Steel screws plated to resist corrosion in most industrial applications

Brass Material—For Corrosive Environment (2B100, 4B100 Series) Nickel plated brass straps and screws. Meets specification QQ-N-290A Class 1, Grade G

Wire Range—Strap Screw: #18-8 AWG solid or stranded; Tubular Clamp: #14-6 AWG solid or stranded

Screw Type—Strap Screw: #10-32 Binding Head; Tubular Clamp: #1/4"[6.35]-28 Set Screw

Strap Screw—7/16" [11.11] max. lug width

#### **Mechanical Properties**

Pitch (terminal spacing)-.63" [16.00]

Wire Strip Length-Strap Screw: as needed for lugging; Tubular Clamp: 1/2" [12.1]

#### **Electrical Properties**

Maximum Current—70A for a single #6 AWG wire

Operating Voltage-Blocks meet 600V creepage and clearance requirements for general industrial control equipment and panelboards; greatly exceeds IEEE switchgear standards for 750 volts.

Dielectric Strength (RH 40% @ sea level) --- 300 Volts/mil thickness per ASTM D149

**UL High Voltage Arc Tracking** (in./min.)-49-.58 [12.45-14.73]

**Environmental Properties** 

Max. Continuous Temperature-150°C (302°F)

Water Absorption (24hrs. % wt. gain)---.45% per ASTM D570

Chemical Resistance—Resistant to acids, alkalies, and aliphatic hydrocarbons and ketones per ASTM D543

Radiation Resistance (ergs G<sup>-1</sup> (C)-2.7 x 108 min

### **UL Independent Testing** Service Recognitions

Wire Sizes—Solid or Stranded, Tubular Clamp

1—#6 AWG, 1—#8 AWG, 1or 2— #10 AWG, 1or 2—#12 AWG, 1 to 3— #14 AWG, 1 --- #10 & 1 --- #12 AWG 1 — #12 & 1 — #14 AWG

Dimensions are in millimeters

and inches unless otherwise

specified.

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Catalog 1308389 Revised 6-07

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Circuits		Screw Strap		ular mp	Brass Screw w/Strap		
	Part Number	Catalog Number	Part Number	Catalog Number	Part Number	Catalog Number	
Contact Type							
AMPACITY	E						
	50	A	6	5A	50A		
Standard							
2	2-1437382-6	B102	2-1437382-8	B102S	2-1437381-0	2B102	
4	3-1437382-0	B104	3-1437382-6	B104S	2-1437381-2	2B104	
6	4-1437382-0	B106-BU	4-1437382-5	B106S	2-1437381-6	2B106	
8	4-1437382-9	B108	5-1437382-5	B108S	3-1437381-0	2B108	
12	5-1437382-9	B112-BU	6-1437382-7	B112S	3-1437381-3	2B112	
Shorting*							
2	4-1437381-0	3B102P	_	_	5-1437381-6	4B102P	
4	4-1437381-1	3B104P	_	_	5-1437381-7	4B104P	
6	4-1437381-3	3B106P	_	_	5-1437381-8	4B106P	
8	4-1437381-5	3B108P	_	_	5-1437381-9	4B108P	
12	4-1437381-7	3B112P	_	_	6-1437381-0	4B112P	

Circuits	Strap Screw Threaded #8 & Smaller Post & Nut			
Removable Lii	nk			
2	8-1437381-4	5B102	—	—
4	8-1437381-5	5B104	_	—
6	8-1437381-7	5B106	—	_
8	8-1437381-8	5B108	—	_
12	9-1437381-0	5B112	—	_
Stud, #10-32				
2	—	_	1-1437382-8	7B102
4	_	_	2-1437382-0	7B104
6	—	—	2-1437382-1	7B106
8	_	_	2-1437382-2	7B108
12	_	_	2-1437382-3	7B112
Notes:				

For prenumbered marking strip, add suffix "N" to Catalog Number. Cannot be used on 3B or 4B series.

For factory assembled hinged cover, add suffix "H" to Catalog Number. Cannot be used on 3B or 4B series.

For factory assembled thumbscrew-fastened cover, add suffix "T" to Catalog Number. Cannot be used on 3B or 4B series.

Screws and removable links shipped unassembled.

to change.

\*Shorting blocks are supplied with 2 shorting screws each.



LB25557 E63810

Dimensions are shown for reference purposes only. Specifications subject

USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803



JJJJJJ

Note: All part numbers are RoHS Compliant.

## B100, #B100 Series, One-Piece Blocks, 600 V — Phenolic Accessories

## **Covers and Marking**









Circuits	Laminated Phenolic uits Cover		j		White Marking Strip		Numbered Marking Strip	
	Part Number	Catalog Number	Part Number	Catalog Number	Part Number C	atalog Number	Part Number Ca	atalog Number
2	7-1437382-5	C102-BU	9-1437382-2	CS102	1-1437383-5	S102	1776733-2	N102
4	7-1437382-6	C104-BU	9-1437382-3	CS104	1-1437383-6	S104	1-1437383-1	N104
6	7-1437382-7	C106-BU	9-1437382-4	CS106	1-1437383-7	S106	1-1437383-2	N106
8	7-1437382-8	C108-BU	9-1437382-5	CS108	1-1437383-8	S108	1-1437383-3	N108
12	7-1437382-9	C112-BU	9-1437382-6	CS112	1-1437383-9	S112	1-1437383-4	N112

Jumpers

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Hardware





Circuits	30A Copper Jumpers		50A 12 Circuit Jumpers			Connecting Link		Lock Nuts		ing w
	Part No.	Catalog No.	Part No.	Catalog No.	Part No.	Catalog No.	Part No.	Catalog No.	Part No. C	atalog No.
2	1437383-2	J102	_	_	—	_	_	—	—	_
4	1437383-3	J104	_	_	_	_	_	_	_	_
6	1437383-4	J106	_	_		_	_	_	_	_
8	1437383-5	J108	_	_	_	_		—	_	_
12	1437383-6	J112	1437395-9	HJ112	_	_	_	_	_	_
dware										
_	_	_	_	_	9-1437382-0	) CL101	1437383-7	LN101-BU	7-1437381-7	51-BU

## **Related Product Data**

Wire Pins and Ferrules—Pages 109-111 For more information on AMP Standard Terminals and Splices or Quick-Connect FASTON Receptacles and Tabs, request Catalog 82042.

Catalog 1308389 Revised 6-07

www.tycoelectronics.com

Dimensions are in millimeters and inches unless otherwise specified.

Dimensions are shown for reference purposes only. Specifications subject to change.

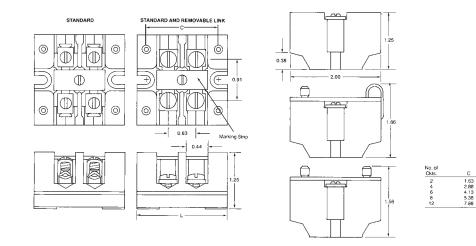
USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803

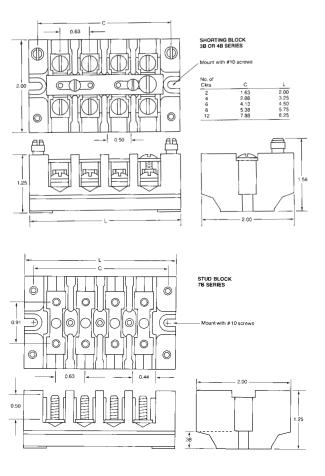


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NEMA Terminal Blocks

## B100, #B100 Series, One-Piece Blocks, 600 V - Phenolic





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Dimensions are in millimeters and inches unless otherwise specified. Catalog 1308389

Dimensions are shown for reference purposes only. Specifications subject to change.

USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803 South America: 55-11-2103-6000 Hong Kong: 852-2735-1628 Japan: 81-44-844-8013 UK: 8706-080-208

2.00 3.25 4.50 5.75 8.25

www.tycoelectronics.com

Revised 6-07

## **Pre-Printed Marking Strips**

Circuit identification is greatly simplified with the use of pre-printed strips for BUCHANAN terminal blocks. These hot-stamped strips are available for all snap-assembled sections (except Fuse, Switch, and Circuit Breaker models which are marked individually). The strips can be ordered separately or pre-installed on factory assembled sectional block units.

Unlike painted or screened letters, hot-stamped letters are designed to not rub or flake off during industrial use so that they will retain their legibility.

Marking strips are stamped with consecutive numbers that can be ordered to read from left-to-right or right-toleft, and in vertical or horizontal positions. Number sequences can begin with any number. This allows circuits to be identified in a manner most consistent with the terminal block application.

	Μ	<u>50</u>	<u>005</u>	<u>13</u>	G	
	A	8	G	D	9	
<b>A</b> B	Termir Design 10 = M 12 = D 67 = 90 24 = N 21 = P 80 = In	nal Block S nator iniature or ouble Tier 00 Series M ylon Heavy henolic Hea termediate	Single Tier ledium Duty Duty avy Duty Heavy Duty	Ca (U 05 0 Ma 11 12 13	onsecutivel	é Options  2 1 ເຈັດ
D/I or	<b>T2</b> = T3 <b>T5</b> = T3 <b>T6</b> = T3 <b>T7</b> = T3	SB500 SB1000 SB2000		De A B C D	First Numbe esignator* = 1 = 2 = 3 = 4 = 5	r In Series" F = 6 G = 7 H = 8 J = 9 K = 0
Ma	rking S	trip Install	ed			

## Marking Strip Installed **On A Factory-Assembled Terminal Block**

•										
	<u>615</u>	<u>005</u>	<u>11</u>	Α						
	۵	8	C	0						
A	Basic Sectional	Block Catalog	# D	"First Number Designator*						
8	Number of Circa Assembled and Numbered (Use three digits 055 = 55, etc.)	Consecutively		<b>A</b> = 1 <b>B</b> = 2 <b>C</b> = 3 <b>D</b> = 4 <b>E</b> = 5						
C	Marking Style C 11 = 1 2 3 4 5	ptions								

- **12** = ...5 4 3 2 1 13 = - NO40...
- 14 = ... ut man
- \* Letters in this position designate the first number to be used in the consecutive sequence. Ex.: "A" would start the sequence with the number 1. "EK" would start the sequence with the number 50. "BKK" would start the series with 200. For non-sequential numbering and special characters, consult Technical Support.

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USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803 In Series"

**F** = 6

**G** = 7 **H** = 8 **J** = 9  $\mathbf{K} = \mathbf{0}$ 

## **Technical Summary**

	Terminal	Contact Type Material	Screw			Recommended Screwdriver		Wine	\\/!	D
Cat.	Block or Product Line		Screw		Material	Dimen		Wire Strip	Wire Range	Rec. Torque
No.		Plate	Style	Slot Size	& Plating	Tip Thick	Tip Width	Length	AWG	in Ib.
105-BU	High Density	Electroplated Tubular	6-32 Slotted	033" Wide x .040" Deep	Steel Electroplated	.020" [.51]	9/64" [.02]	5/16" [7.94]	#12-30	10
115 125-BU	Tubular Clamp	Copper Contact	Head Screw	[.84 x 1.02] Steel						
211	HeavyDuty	Copper Alloy	Binding Head	062" Wide x 062" Deep	ű	.037" [.94]	1⁄4" [6.35]	As Needed	#8 or Smaller	12
241	Strap Screw	Strap Electroplated	10-32 Thread	[1.57 x 1.57]		[.01]	[0.00]	for Lugging	omaior	
212	Heavy Duty	Electroplated	Headless 1/4"-28 Thd.	3/64" Wide x 1/16" Deep	ű	"	u	1/2" [12.7]	#4-18	35
222-BU	Tubular Screw	Tubular Copper	Slotted	[1.19 x 1.59]				[12.7]		
242		Contact	"	"	"	"	"			07
213 243	Heavy Duty Tubular Clamp								#6-18	35
218	Heavy Duty	Copper Alloy	Pan Head	3/64" Wide x 3/64" Deep	ű	"	"		#8-18	12
248	Strap Clamp	Strap Electroplated	Saddle Clamp 8-32 Thd.	[1.19 x 1.19]						
351	Fuse Block	Copper Alloy	Binding Head		ű	"	"	As Needed	#8 or Smaller	10
361 0311	Strap Screw	Electroplated Spring Temper	8-32 Thd.					for Lugging	-	
358	Fuse Block	"	Pan Head		"	"	66	1/2"	#8-18	"
368 318	Strap Clamp		w/SaddleClp. 8-32 Thd.					[12.7]	#0-10	
352	Fuse Block	Same as above except use H.D.	Headless 1/4"-28 Thd. slotted		"	ű	"	"	ű	"
362-BU 312	Tubular Screw	Tubular Contact	SIULIEU							
341 371 342	Switch Block Strap Screw	CopperAlloy Electroplated Spring Temper			u	ű	"	As Needed for Lugging	#8 or Smaller	"
348 0378	Switch Block Strap Clamp	"	Pan Head w/SaddleClp 8-32 Thd.		u	"	"	1/2" [12.7]	#8-18	
342 0372	Switch Block Tubular Screw	Same as above except use H D. Tubular Contact			ű	"	"	"	ű	
416 426-BU	Extra Heavy Duty Tubular Screw	Electroplated- Tubular Copper Contact	1/2"-13 Hex Socket Hd. Set Screw	1/4" [6.35] Hex	"	1/2" [12.7] Hex	T-Bar Key	7/8" [22.23]	#12-2/0	200

Note: Representative Catalog Numbers Listed.

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Dimensions are in millimeters and inches unless otherwise specified. Dimensions are shown for reference purposes only. Specifications subject to change. USA: 1-800-522-6752 Canada: 1-905-470-4425 Mexico: 01-800-733-8926 C. America: 52-55-1106-0803



## Technical Summary (Continued)

Cat.	Terminal Block or Product	Contact Type Material	9		Screw Material		Recommended Screwdriver Dimensions		Wire Range	Rec. Torque
No.	Line	plate	Style	Slot Size	& Plating	Tip Thick	Tip Width	Strip Length	AWG	in lb.
417	Extra HD	Electroplated	3/4"-16 Hex Socket Head	3/8" Hex [9.53]	Steel Electroplated	3/8" Hex [9.53]	KeyT-Bar	1" [25.4]	#6-250	375 kcmil (MCM)
427-BU	Tubular Screw	Tubular Copper Contact	Set Screw							. ,
517 617 717	Medium Duty Quick-Connect	1/4" Wide QC .032" Thk Copper Alloy Electroplated	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
1546235-	1 Medium Duty Tubular Clamp	Electroplated Tubular Copper Contact	10-32 Slotted Hd	.046" Wide x .046"Deep [1.17 x 1.17]	Steel Electroplated	.032" [.81]	3/16" [4.76]	11/32" [8.73]	#10-22	8
1546152-	1 Medium Duty QC & Tubular Screw	1/4" Wide QC .032" Thk. Tubular Contact Both Copper Alloy Electroplate	" d	H	1	11	U	н	#8-18	10
1546148-	1 Medium Duty Tubular Screw	Electroplated Tubular Copper Contact	н	H	H	H	H	N		8
1546143-	1 Medium Duty Strap Screw	Copper Alloy Strap Electroplated	6-32 Thd. Slotted Binding Hd.	3/64" Wide x 3/64" Deep [1.19 x 1.19]	H	н	n	As Needed for Lugging	#8 or Smaller	12
824-BU	Intermediate Tubular Screw	Electroplated Tubular Copper Contact	7/16"-20Thd. Slotted Headless	5/64" Wide x 5/64" Deep [1.98 x 1.98]	H	.041" [1.04]	3/8" [9.53]	11/16" [17.46]	#12-1/0	50
B102 B112-BU	One-Piece Blk. Strap Screw	Copper Alloy Strap Electroplated	10-32 Thd. Slotted Binding Hd.	1/16" Wide x 1/16" Deep [1.59 x 1.59]	H	.037" [.94]	1/4" [6.35]	As Needed for Lugging	#8 or Smaller	20
B102S B112S	One-Piece Blk. Tubular Contact	Tubular Contact	1/4" -28 Thd. Headless Set Screw	3/64" Wide x 3/64" Deep [1.19 x 1.19]	II	н	H	1/2" [12.7]	#6-14	45

Note: Representative Catalog Numbers Listed.

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## **UL 1059 Basic Voltage Rating**

Voltage ratings of terminal blocks are based on the minimum spacing between electrical conductive parts of opposite polarity or between an electrically conductive part and a metal mounting surface measured under two conditions: Through Air, defined as the distance an arc must take through the air to go from one live conductor to another or from a live conductor to ground; and Over Surface, defined as the distance an arc must take over a surface of the insulating material going from one terminal to ground, assuming the arc will travel along the surface rather than through the air. The following chart shows UL 1059 spacing requirements in inches.

#### **Voltage Rating**

Description	Voltago	Spacing Requirements				
Description	Voltage	Thru Air	Over Surface			
Class A						
Service equipment including deadfront	51 - 150	1/2 [12.7]	3/4 [19.05]			
switchboards, panel boards, service	151 - 300	3/4 [19.05]	1 1/4 [31.75]			
entrance devices, etc.	251 - 600	1 [25.4]	2 [50.8]			
Class B						
Commercial appliances including	51 - 150	1/16 [1.59]	1/16 [1.59]			
business equipment, electronic data	151 - 300	3/32 [2.38]	3/32 [2.38]			
processing equipment and the like	251 - 600	3/8 [9.53]	1/2 [12.7]			
Class C						
General industrial and machine tools;	51 - 150	1/8 [3.18]	1/4 [6.35]			
controls which can be further defined	151 - 300	1/4 [6.35]	3/8 [9.53]			
as equipment falling under UL508	301 - 600	3/8 [9.53]	1/2 [12.7]			
Devices having limited ratings <sup>a</sup>	51 - 300	1/16 [1.59]	1/8 [3.18]			
- 0	301 - 600	3/16 [4.76]	3/8 [9.53]			

<sup>a</sup>Load on any single circuit can not exceed 15 A at 51-150 V, 10 A at 151-300 V, 5 A at 301-600 V or the maximum current rating, whichever is less.

#### **Standard Test Criteria**

Test	Per:
Heat Cycling (term)	UL486E Section 10
Static Heating (term)	UL486E Section 11
Secureness	UL486E Section 12
Pullout	UL486E Section 14
Heating Test (block)	UL1059 Section 10
Dielectric Withstand	UL1059 Section 11
Strength of Base	UL1059 Section 13
Tab Pull	UL1059 Section 14
VPTA	UL1059 Section 15
Salt Spray	MIL-202 Method 101
Solderability	MIL-202 Method 208
Solvents	MIL-202 Method 215

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