



# ENGINEERED PRODUCTS CO.

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GROUND  
BONDING

# GROUND BONDING PRODUCTS

Product • Data • Sheet



- Labor Saving Tools! The perfect tool for pre-wiring in the Contractor's shop or at the job site.
- Single and Dual-Gang Ground Bonding PigTails™ are used to ground single and multi-gang metal boxes in commercial buildings, factories, warehouses, hospitals, and schools.
- 12 Gauge stranded conductors include a factory crimped flanged spade terminals on both ends.
- PowerTails® provide speed and reliability when bringing power to multiple outlets and devices. Estimated time savings up to six (6) minutes per junction box.

# GROUND BONDING PIGTAILS INSULATED SOLID-WIRE (12 GAUGE - THHN BUILDING WIRE)



Part Number: 20009

- EPCO's Solid-Wire Ground Bonding PigTails are recommended for use in metal box applications.
- Features a captive GSH or GSC Green Ground Screw on one end, the other end is pre-stripped 1".
- Available in 6.5", 8", 10", and 12" lengths.
- Typical applications:
  - Ground bonding in a power distribution box, junction box(s), or multi-gang receptacle box.
  - When a standard Stranded-Wire PigTail is not required.
- 14 Gauge Ground Bonding PigTails are available! Contact EPCO Inside Sales for more specific information.

Catalog Number	UPC Number	Description	Standard Package	Master Carton	Master Carton Ship Wt. (lbs.)
20016	20016	6.5" PigTail with GSC Ground Screw	50/Pkg.	10/Pkgs.	9
20009*	20009	6.5" PigTail with GSH Ground Screw	50/Pkg.	10/Pkgs.	9
20011*	20011	8" PigTail with GSH Ground Screw	50/Pkg.	10/Pkgs.	11
20087	20087	10" PigTail with GSH Ground Screw	50/Pkg.	10/Pkgs.	13
20089	20089	12" PigTail with GSH Ground Screw	50/Pkg.	10/Pkgs.	15
20086	20086	8" PigTail with GSC Ground Screw	50/Pkg.	10/Pkgs.	11
20088	20088	10" PigTail with GSC Ground Screw	50/Pkg.	10/Pkgs.	13
20090	20090	12" PigTail with GSC Ground Screw	50/Pkg.	10/Pkgs.	15
20091	20091	8" PigTail (14 Gauge) with GSH Ground Screw	50/Pkg.	10/Pkgs.	9
20010	20010	6.5" PigTail (14 Gauge) with GSH Ground Screw	50/Pkg.	10/Pkgs.	7

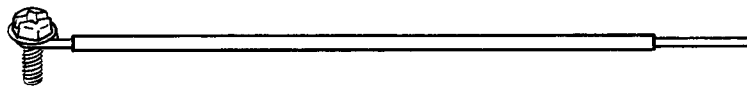
\* Contractor Preferred

## Ground Bonding PigTails Reference Guide - Insulated Solid-Wire (12 Gauge)

### Part Numbers

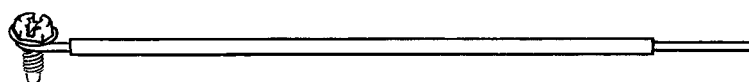
20016: 6.5 Inch  
20086: 8 Inch  
20088: 10 Inch  
20090: 12 Inch

**PigTail:** With captive GSC Ground Screw, Stripped 1".



20009: 6.5 Inch  
20011: 8 Inch  
20087: 10 Inch  
20089: 12 Inch  
20010: 6.5 Inch (14 Gauge)  
20091: 8 Inch (14 Gauge)

**PigTail:** With captive GSH Ground Screw, Stripped 1".



# GROUND BONDING PIGTAILS INSULATED STRANDED-WIRE (12 GAUGE)



Part Number: 20004

- Labor and Time Savings!
- EPCO's Stranded-Wire Ground Bonding PigTails can save the contractor up to 50 cents per installation.
- Factory-crimped Flanged Spade Terminal or Ring Terminal meets the requirements of the 2008 NEC, Article 110.4 and provides precise electrical terminations.
- Typical applications: Ground bonding in a power distribution box, junction box, or multi-gang receptacle box.

Catalog Number	UPC Number	Description	Standard Package	Master Carton	Master Carton Ship Wt. (lbs.)
20008	20008	8" PigTail with 1 Flanged Spade Terminal	50/Pkg.	10/Pkgs.	11
20082	20082	10" PigTail with 1 Flanged Spade Terminal	50/Pkg.	10/Pkgs.	13
20084	20084	12" PigTail with 1 Flanged Spade Terminal	50/Pkg.	10/Pkgs.	15
20041	20041	8" PigTail with Ring Terminal and GSC Ground Screw, and 1 Flanged Spade Terminal	50/Pkg.	10/Pkgs.	13
20020	20020	10" PigTail with Ring Terminal and GSC Ground Screw, and 1 Flanged Spade Terminal	50/Pkg.	10/Pkgs.	15
20026	20026	12" PigTail with Ring Terminal and GSC Ground Screw, and 1 Flanged Spade Terminal	50/Pkg.	10/Pkgs.	17
20004*	20004	8" PigTail with 1 Flanged Spade Terminal and GSH Ground Screw	50/Pkg.	10/Pkgs.	13
20019	20019	10" PigTail with 1 Flanged Spade Terminal and GSH Ground Screw	50/Pkg.	10/Pkgs.	15
20025	20025	12" PigTail with 1 Flanged Spade Terminal and GSH Ground Screw	50/Pkg.	10/Pkgs.	17
20029	20029	8" PigTail with Ring Terminal and GSH Ground Screw	50/Pkg.	10/Pkgs.	12
20034	20034	10" PigTail with Ring Terminal and GSH Ground Screw	50/Pkg.	10/Pkgs.	14
20043	20043	12" PigTail with Ring Terminal and GSH Ground Screw	50/Pkg.	10/Pkgs.	16
20036	20036	8" PigTail with Rng Terminal and GSC Ground Screw	50/Pkg.	10/Pkgs.	12
20035	20035	10" PigTail with Ring Terminal and GSC Ground Screw	50/Pkg.	10/Pkgs.	14
20044	20044	12" PigTail with Ring Terminal and GSC Ground Screw	50/Pkg.	10/Pkgs.	16
20003	20003	8" PigTail (14 Gauge) with 1 Flanged Spade Terminal and GSH Ground Screw	50/Pkg.	10/Pkgs.	10

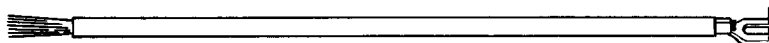
\* Contractor Preferred

## Ground Bonding PigTails Reference Guide - Insulated Stranded-Wire (12 Gauge)

### Part Numbers

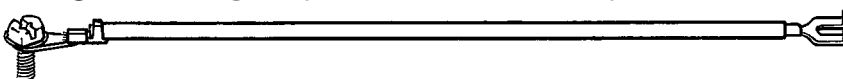
20008: 8 Inch  
20082: 10 Inch  
20084: 12 Inch

**PigTail:** 1 Flanged Spade Terminal, Stripped 5/8".



20041: 8 Inch  
20020: 10 Inch  
20026: 12 Inch

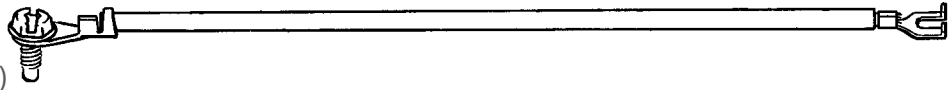
**PigTail:** 1 Flanged Spade Terminal and a captive GSC Ground Screw.



## GROUND BONDING PIGTAILS INSULATED STRANDED-WIRE (12 GAUGE)...CONTINUED

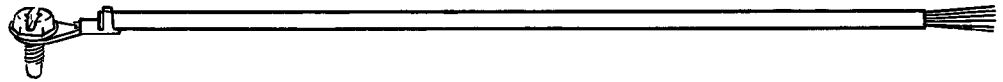
20004: 8 Inch  
20019: 10 Inch  
20025: 12 Inch  
20003: 8 Inch (14 Gauge)

**PigTail:** 1 Flanged Spade Terminal and a captive GSH Ground Screw.



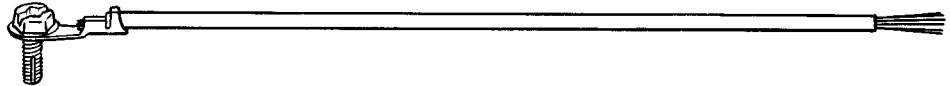
20029: 8 Inch  
20034: 10 Inch  
20043: 12 Inch

**PigTail:** Ring Terminal and a captive GSC Ground Screw, Stripped 5/8".



20036: 8 Inch  
20035: 10 Inch  
20044: 12 Inch

**PigTail:** Ring Terminal and a captive GSH Ground Screw, Stripped 5/8".



## SINGLE AND DUAL-GANG GROUND BONDING PIGTAILS (12 GAUGE)

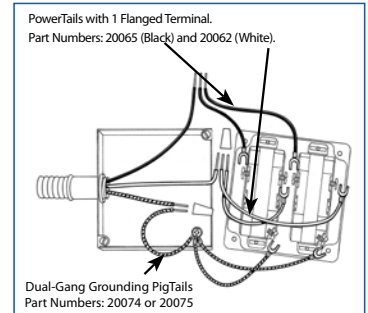


Part Number: 20074

- Matched Flanged Spade and Ring Terminals ensure a safe, reliable ground connection.
- Flanged Spade and Ring Terminals meet the requirements of the 2008 NEC, Article 110.14(A).

**Reprinted from the 2008 NEC Handbook, Article 250-148:**

**Continuity and Attachment of Equipment Grounding Conductors to Boxes:** Where circuit conductors are spliced within a box, or terminated on equipment within, or supported by a box, any separate equipment grounding conductors associated with those circuit conductors shall be connected within the box or to the box with devices suitable for the use.



Catalog Number	UPC Number	Description	Standard Package	Master Carton	Master Carton Ship Wt. (lbs.)
20067	20067	Single-Gang PigTail with 8" Solid-Wire Incoming Lead	20/Pkg.	10/Pkgs.	9
20068	20068	Single-Gang PigTail with 8" Stranded-Wire Incoming Lead	20/Pkg.	10/Pkgs.	9
20070	20070	Dual-Gang Stranded PigTails with 8" Wire Conductors	20/Pkg.	10/Pkgs.	10
20074	20074	Dual-Gang PigTails with 8" Solid-Wire Incoming Lead	20/Pkg.	10/Pkgs.	11
20075	20075	Dual-Gang PigTails with 8" Stranded-Wire Incoming Lead	20/Pkg.	10/Pkgs.	13

# Single/Dual-Gang Ground Bonding PigTails Reference Guide

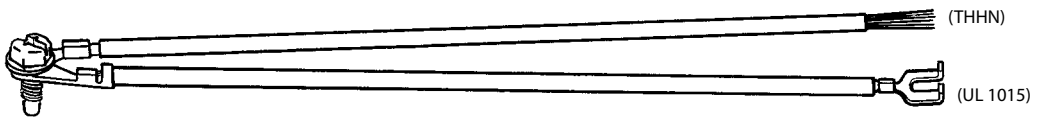
## Insulated Solid and Stranded-Wire (12 Gauge)

### Part Numbers

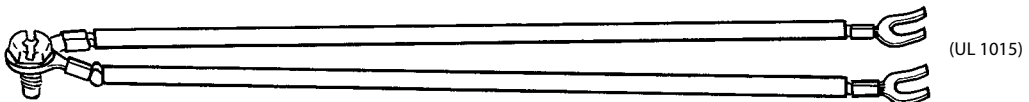
20067: 8 Inch **Single-Gang PigTail:** One 8" Solid-Wire Incoming Lead-Stripped 1", One 8" Stranded-Wire Conductor with 1 Flanged Spade Terminal and a captive GSH Ground Screw.



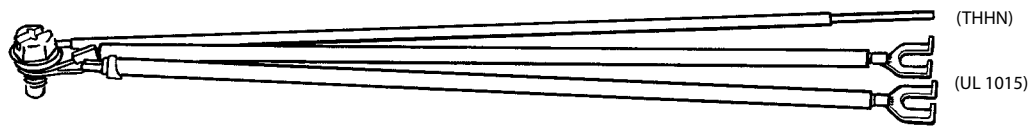
20068: 8 Inch **Single-Gang PigTail:** One 8" Solid-Wire Incoming Lead-Stripped 5/8", One 8" Stranded-Wire Conductor with 1 Flanged Spade Terminal and a captive GSH Ground Screw.



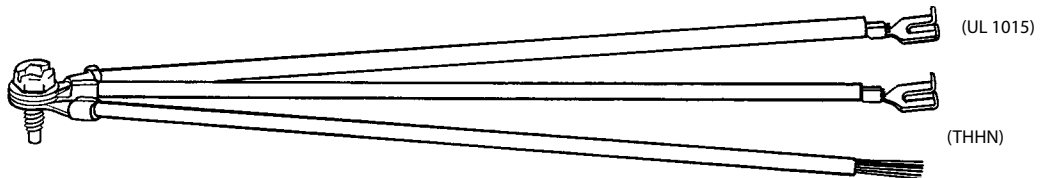
20070: 8 Inch **Dual-Gang PigTail:** Two 8" Stranded-Wire Conductors, each with 1 Flanged Spade Terminal and a captive GSH Ground Screw.



20074: 8 Inch **Dual-Gang PigTail:** One 8" Solid Wire Incoming Lead-Stripped 1", Two 8" Stranded-Wire Conductors with 2 Flanged Spade Terminals and a captive GSH Ground Screw.



20075: 8 Inch **Dual-Gang PigTail:** One 8" Stranded Wire Incoming Lead-Stripped 5/8", Two 8" Stranded-Wire Conductors with 2 Flanged Spade Terminals and a captive GSH Ground Screw.



# SINGLE AND DUAL-GANG GROUND BONDING PIGTAILS PRODUCT APPLICATIONS

## Single-Gang Solid-Wire - 20067

The ground screw is screwed into and bonds the metal junction box. The single stranded wire grounding conductor with the flanged spade terminal from this same pigtail grounds the receptacle. The solid-wire grounding conductor on the pigtail will ground the receptacle. The solid-wire grounding conductor on the pigtail connects to the MC Cable and bonds back to the service panel.



## Single-Gang Stranded-Wire - 20068

The ground screw is screwed into and "grounds" the metal junction box. The single stranded-wire grounding conductor with the flanged spade terminal from this pigtail grounds the receptacle. The stranded-wire grounding conductor on the pigtail connects (by wire nut) the incoming ground conductor in the MC Cable and bonds back to the service panel.



## Dual-Gang Stranded-Wire - 20070

The ground screw is screwed into the grounding hole 10/32" tapped opening in the metal box, bonding the box to the conduit system and grounded back to the service panel. The two stranded-wire ground pigtails with the flanged spade terminals would then connect to the grounding screw of the receptacles or switches to be wired.



## Dual-Gang Solid-Wire - 20074

The ground screw is screwed into and bonds the metal junction box. The two stranded-wire grounding conductors with the flanged spade terminals from this pigtail grounds each receptacle. The solid-wire conductor on the pigtail connects by wire nut to the incoming ground conductor in the conduit and bonds back to the service panel.



## Dual-Gang Stranded-Wire - 20075

The ground screw is screwed into and "grounds" the metal junction box and is bonded back to the service-grounded panel. Two (2) stranded-wire grounding conductors with flanged spade terminals from this pigtail ground each receptacle. The stranded-wire grounding conductor on the pigtail connects by wire nut to the ground conductor from the incoming cable.



# POWERTAILS® DEVICE WIRING CONDUCTORS (12 GAUGE)

- Labor Savings Tool! Used by Contractors that wire Commercial and industrial buildings when using single and/or multi-gang metal boxes.
- Provides installation speed and a reliable connection when bringing power to multiple devices. Estimated time savings - six minutes per junction box. Perfect for pre-wiring devices in the Contractor's shop or at the job site.
- 8" Length Black and White Leads feature a factory crimped Flanged Spade Terminal that slips under the terminal screw on the device.
- Manufactured using flexible 12 Gauge Stranded-Wire to easily push into the junction box.

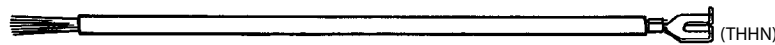
Catalog Number	UPC Number	Description	Standard Package	Master Carton	Master Carton Ship Wt. (lbs.)
20062	20062	White: 8" Stranded Conductor, pre-stripped 5/8" with 1 Flanged Spade Terminal on the opposite end	50/Pkg.	10/Pkgs.	8
20063	20063	White: 8" Stranded Conductor w/ 2 Flanged Spade Terminals	50/Pkg.	10/Pkgs.	9
20064	20064	Black: 8" Stranded Conductor w/ 2 Flanged Spade Terminals	50/Pkg.	10/Pkgs.	9
20065	20065	Black: 8" Stranded Conductor, pre-stripped 5/8" with 1 Flanged Spade Terminal on the opposite end	50/Pkg.	10/Pkgs.	8

## PowerTails Device Wiring Conductors Reference Guide Insulated Stranded-Wire (12 Gauge)

### Part Numbers

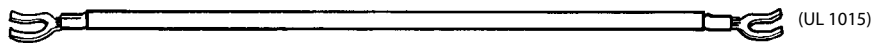
20062: White Stranded Conductor with 1 Flanged Spade Terminal, Stripped 5/8".

20065: Black



20063: White Stranded Conductor with 2 Flanged Spade Terminal.

20064: Black



## GROUND SCREWS

Engineered Products Company's Ground Screws and Ground Clip products are in compliance with the Restriction of Hazardous Substances (RoHS) European Directive. Engineered Products Company's Ground Screws are now compliant with the EU RoHS mandate.

EPCO's Green Ground Screws (#10-32 x .375") meet the requirements of the 2008 NEC, Article 250.8.



**GSH - Hex Head Screw** - Combination slotted, phillips and square drive tapered point screw used to simplify wiring installations when pre-tapped holes exist in metal boxes.

**GSC - Cutting Point Screw** - Combination hex head, slotted, phillips and square drive screw for use in metal boxes when holes have not been pre-tapped.



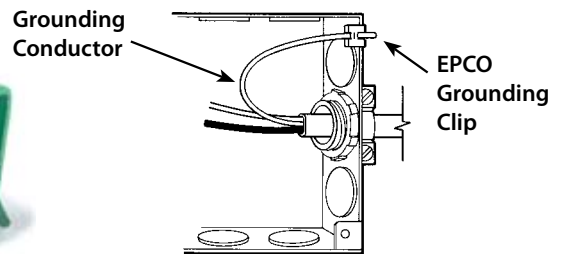
Beginning July 1, 2006, Directive 2002/95/EC, of the European Union (EU), restricts the use of certain hazardous substances in electrical and electronic equipment. Those substances are Lead, Mercury, Cadmium, Hexavalent Chromium, PBBs (polybrominated biphenyls) and PBDEs (polybrominated diphenyl ethers).

## GROUND SCREWS...CONTINUED

Catalog Number	UPC Number	Description	Standard Package	Standard Package Ship Wt. (lbs.)
GSH	10051	Slotted, #2 Phillips, Hex Washer, #2 Robertson with Tapered Die Point	100/Pkg.	1
20051	20051	GSH - Bulk	1000/Carton	4
GSC	10053	Slotted, #2 Phillips, Hex Washer, with cutting point	100/Pkg.	1
20053	20053	GSC - Bulk	1000/Carton	4

## GROUND CLIP

- Excellent time and labor saving alternative to using Ground Screws.
- Meets the requirements of the 2008 NEC, Article 250.8.



Catalog Number	UPC Number	Description	Standard Package	Standard Package Ship Wt. (lbs.)
GC	10052	Ground Clip for 10 - 14 Gauge Solid-Wire	100/Pkg.	1
20052	20052	GC - Bulk	1000/Carton	5

Distributed By:

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