## **Geoprobe® 12VDC Adapters and Cables**

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Part Number	Description*	Illustration
27504	12P to 32R	White = 12P Yellow = 32P
27208	32P to 12R	
23851	32P/12P Pigtail 3-Wire Asm.	PIN 1 - YELLOW (GND -) PIN 2 - ORANGE (12VDC POSITIVE +) PIN 3 - BLACK (GND -)
10138	12P to Single Cig Receptacle	White = 12P Yellow = 32P
23896	32P to Single Cig Receptacle	
13522	12P to Double Cig Receptacle	Yellow = 32 White = 12
23897	32P to Double Cig Receptacle	
25091	Single Cig Plug to 32R	Yellow
25090	Battery Clips to 32R	Yellow
25089	32P to MBP Actuator (15' length)	Yellow Fuse Holder

<sup>\*</sup>Refer to back page for an explanation of the alphanumeric codes used in the descriptions.



Figure 1: Geoprobe® direct push machines are equipped with 12VDC outlet receptacles (arrow).

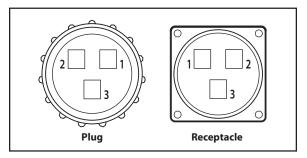


Figure 2: Pin positions for 12VDC plugs and receptacles.

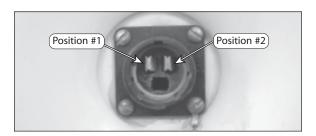


Figure 3: A 12VDC receptacle wired in the now <u>obsolete</u> "12" configuration (note location of pins).



Figure 4: A 12VDC receptacle wired in the <u>current</u> "32" configuration (note location of pins).

The wiring configuration of 12VDC outlet receptacles (Fig. 1) was changed on Geoprobe® direct push machines beginning November 1, 2003. This change was made to conform to industry standards and allows connection of aftermarket accessories without concern of equipment damage.

Series 3 circular connectors are utilized on Geoprobe® equipment. These threaded connectors eliminate problems with power leads accidentally disconnecting during use. As shown in Figure 2, each connector plug and receptacle may be assembled with up to three pins which are numbered 1, 2, and 3 on the connector face.

## Wiring Configurations: 12 (Obsolete) vs. 32 (Current)

Geoprobe Systems® runs two electrical leads to the outlet receptacles: a power (+) and ground (-) lead. Prior to November of 2003, receptacles and power cords were wired with the ground lead pinned in the #1 position and the power lead pinned in the #2 position as shown in Figure 3. This **obsolete** wiring pattern is identified as the "12" configuration which corresponds to the respective positions of the ground and power lead pins. White shrink-wrap tubing is placed on components wired in the 12 configuration.

Geoprobe® receptacles and power cords have been wired with the ground lead pinned in the #3 position and power lead pinned in the #2 position since November 1, 2003. This **current** wiring pattern is identified as the "32" configuration which corresponds to the respective positions of the ground and power lead pins. An illustration of a receptacle wired in the 32 configuration is shown in Figure 4. Note that a decal identifying the location of the ground and power pins is now applied next to receptacle. Yellow shrinkwrap tubing is used on components wired in the 32 configuration.

## P and R

A series 3 circular connector consists of two main components - a receptacle (Figs. 1, 3, and 4) and a plug (Fig. 5). Receptacles are generally installed on machines and accessories while plugs are used with power cords. The main exceptions are adapter assemblies which may have various plug/receptacle combinations. These two parts are connected by inserting the plug into the receptacle and then turning the threaded collar on the outside of the plug in a clockwise direction to secure the connection.

The adapters shown on the opposite page are identified with alphanumeric codes such as "12P" and "32R". In this system, "P" refers to plug and "R" refers to receptacle.



Figure 5: Series 3 circular connector plugs include a collar that threads onto the receptacle to secure the connection.