

# BONDED SHIELD IRRIGATION CABLE FOR POWER & CONTROL CIRCUITS

# SPEC

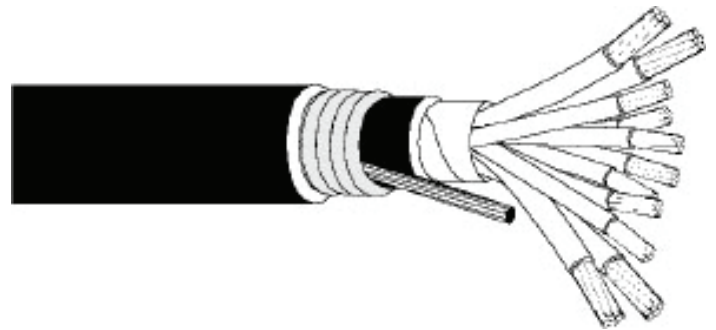
## P7082D-AG

**INSULATION: POLYVINYL CHLORIDE & NYLON**  
**OUTER JACKET: POLYETHYLENE**  
**SIZES: 10 AWG 4/C, 14 AWG 7/C; 16 AWG DRAIN**



## 1.0 SCOPE

**1.1** This specification covers construction requirements for a multi-conductor cable designed to operate electric motor driven irrigation systems, consisting of copper conductors insulated with PVC and nylon, cabled utilizing a PVC inner jacket, and an aluminum shield bonded to a PE outer jacket offering excellent mechanical strength and moisture resistance. Cable is U.L. listed as Irrigation Cable U.L. 1263, and made in accordance with Article 675 of the National Electrical Code.



## 2.0 CONSTRUCTION

### 2.1

NO. OF COND.	SIZE (AWG)	STRANDS	INSULATION WALL
4	10	7 OR 19	.02 0" PVC / .04 NYLON
7	14	7 OR 19	.01 5" PVC / .04 NYLON

### 2.2 CONDUCTOR:

Stranded, soft annealed uncoated copper conforming to ASTM B-8.

### 2.3 INSULATION:

Polyvinyl Chloride and Nylon conforming to U.L. Style THHN/THWN for 14 AWG or larger and TFN for 16 AWG and 18 AWG.

### 2.4 CABLE ASSEMBLY:

Insulated conductors are cable together in a suitable lay with an optional but not required 1 mil mylar tape wrapped helically over the assembly, 10% minimum overlap.

### 2.5 INNER JACKET:

Polyvinyl chloride conforming to IPCEA S-61-402 and NEMA WC5 - minimum average wall thickness .030".

### 2.6 COLOR CODING:

- 10 AWG - Red, Black, Blue, Green/Yellow stripe
- 14 AWG - Brown, White, Purple, Orange, Pink, Tan/Black Stripe, Yellow

Stripes must cover a minimum of 30% and maximum of 50% of the insulated conductor circumference and may be spirally or longitudinally applied.

### 2.7 SHIELD:

.008 corrugated or flat aluminum specially coated and applied in order to bond to the outer jacket, with inner side uncoated in order to make contact with drain wire.

### 2.8 SHIELD DRAIN:

16 AWG, 7 strand T/C drain wire inserted under shield for termination and grounding.

### 2.9 OUTER JACKET:

Sunlight resistant Polyethelene conforming to IPCEA S-61-402, NEMA WC5 and U.L 1263. Minimum Average .050"

### 2.10 O.D.:

.760" ± .050".

### 2.11 SURFACE PRINT:

"Shielded Paige P7082D 10/4-14/7 Irrigation Cable 600 Volts NEC Art 675 E\_\_\_\_\_ (U.L.) DIR BUR."

### 2.12 LENGTHS:

5,000 foot put-ups (± 10%) are considered standard lengths. 3,000 feet to 5,500 feet acceptable.