

## IRRIGATION CONTROLLER CABLE INFORMATION AND SPECIFICATIONS

HydroPoint's state of the art WeatherTRAK controllers utilize a variety of wiring systems to provide the most advanced irrigation solutions available. WeatherTRAK provides robust, easy to use conventional and 2-Wire controllers that maximize irrigation and operational efficiency.

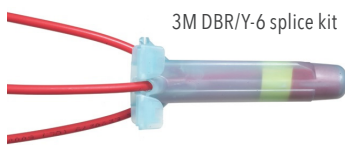
### 2-WIRE SPECIFICATIONS

#### Specifications:

- Wire Size: 14 or 16 AWG
- Conductor: 2 same gauge solid core conductors conforming to ASTM B-33, B-3, or B-8
- Insulation: Polyvinyl Chloride (PVC) conforming to UL-493 or UL-719 for thermoplastic insulated style underground feeder (UF)
- Outer Jacket: Low density, high molecular weight polyethylene (HMWPE) with a thickness of 0.045"
- Temperature: 60°C (140°F) Voltage: 600 V RMS max

#### Approved Wires:

- Coleman Cable #51452
  - Paige P7072D, P7296D, P7350D, and P7354D
  - Regency 14/2 and 12/2 Maxi Cable
  - Toro Decoder Cable
  - Hunter Decoder Jacketed Service Wire DEC12/2BE and DEC14/2BE
- Note: use only 3M DBR/Y-6 splice kits for all electrical wiring connections to the 2-wire path. Improper wiring on the 2-wire path can cause serious damage to your controller or 2-wire irrigation system.



### WIRE LENGTH CONSTRAINTS

#### Typical 2-Wire Path Limits

NUMBER OF SIMULTANEOUS VALVES	MAXIMUM WIRE LENGTH IF VALVES DISTRIBUTED EVENLY (FT.)	
	AWG 16	AWG 14
1	11,000	17,800
2	10,200	16,300
3	8,800	14,100
4	7,800	12,500
5	7,000	11,200
6	6,300	10,100
7	5,800	9,200
8	5,300	8,500

#### Worst Case\* 2-Wire Path Limits

NUMBER OF ACTIVE VALVES ON 2-WIRE PATH	MAXIMUM WIRE LENGTH (ASSUMING #16/2-WIRE)
1	6,200
2	5,600
3	4,900
4	4,300

(\*All decoders located at end of 2-Wire path)

### CONVENTIONAL WIRING

#### Specifications:

WeatherTRAK controllers are compatible with all irrigation wiring that is:

- Solid core from 18 AWG to 14 AWG
- Direct burial rated
- Jacketed

#### Conventional Wiring Length Constraints

AWG	MAXIMUM WIRE LENGTH (FT.)	
	LOW CURRENT SOLENOIDS*	HIGH CURRENT SOLENOIDS**
14	2,500	2,000
15	2,000	1,000
18	1,500	750

\*standard solenoid, 200 - 250 mA

\*\*500-600 mA

### FLOW SOLUTION WIRING

#### Specifications:

- Solid core from 18 AWG to 14 AWG
- Shielded, twisted-pair wiring
- Conforms to REA PE 39 bulletin

#### Approved Wires:

- P.E. 39 cable - Paige Electric Part # P7315D

Note: use only 3M DBR/Y-6 splice kits (for 14-18 gauge wire) and 3M 3161R splice kits (for 18-22 gauge wire), as directed in the Flow Solutions Guide

Paige P7351D

