altronic® D.I.S.®

IGNITION SYSTEM 12-24 VDC POWERED

- REPLACES DISTRIBUTOR IGNITION SYSTEMS
- NO WEARING PARTS
- CRANKSHAFT OR CAMSHAFT-REFERENCED TIMING ACCURACY
- C.D. LONG DURATION SPARK
- HIGH ENERGY — SUITABLE FOR LEAN-BURN ENGINES
- APPLICABLE TO STATIONARY OR HEAVY-DUTY VEHICULAR APPLICATIONS

The Altronic D.I.S. digital ignition system is a microcircuit-based system for spark ignited engines fueled by gasoline, LPG or natural gas. The system, which has no wearing parts, is powered from 12-24 VDC and can replace any distributor ignition system. The D.I.S. uses the high energy, capacitor discharge (C.D.) principle which provides maximum engine performance and can extend spark plug life three to five times compared to an inductive-type system.

A Hall-effect pick-up that senses crankshaft or camshaft timing magnets gives extremely accurate timing reference signals. The D.I.S. unit's microcircuits provide the proper timing and distribution functions. The D.I.S. system eliminates the conventional mechanical distributor. Ignition coils, one per cylinder, step up the primary output pulses from the D.I.S. unit to the high voltage required at the spark plugs.

The D.I.S. system may be used on 1-16 cylinder engines, even or odd firing, and is available in two basic series with differing timing control designs:

— The 500 SERIES uses two 8-position switches which allow two timing settings (8 choices each) to be established. These may be set, for example, for two different fuels or loads. The standard switch interval is two crankshaft degrees giving a 14 degree total span. The 500 SERIES is usually applied in stationary, industrial applications.

— The 600 SERIES features an analog input which may be combined with RPM in a timing map arrangement plus a second analog input (for example, temperature) which may be used as a modifier of the basic map. In addition, an 8-position switch is provided for manual timing adjustment. The analog inputs may be connected to voltage, current or resistive timing control elements. Custom timing curves can be supplied for OEM applications. The 600 SERIES is applied to both stationary and heavy duty vehicular applications.

D.I.S. SYSTEM INCLUDES:

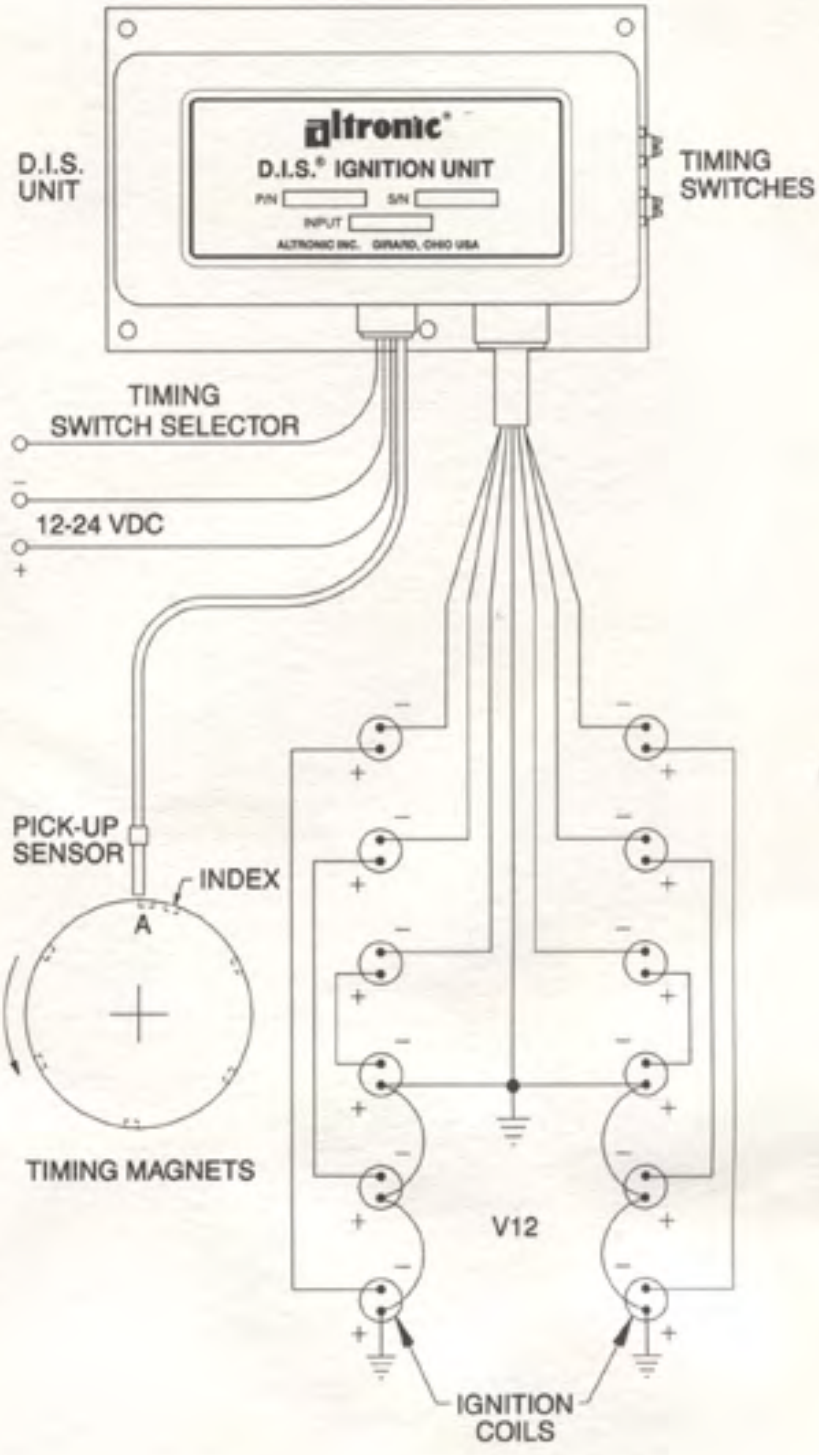
- ☐ 500 SERIES MICROCIRCUIT UNIT
  Even or odd firing, 1-16 cylinders.
  Two 8-position timing switches.
- ☐ 600 SERIES MICROCIRCUIT UNIT
  Even or odd firing, 1-16 cylinders.
  8-position timing switch. Timing control vs. analog input signals (4-20 ma, 1-5 V, 0-1K ohms or custom transducer signal) and RPM.
- ☐ HALL-EFFECT PICK-UP SENSOR
- ☐ MAGNET DISC
  (crankshaft or camshaft mounted)
  OR
  MAGNETS-M8 THREAD (flywheel mounted)
- ☐ PRIMARY WIRING HARNESS
- ☐ HALL-EFFECT PICK-UP CABLE
- ☐ IGNITION COILS (one per spark plug)

SPECIFICATIONS:

NUMBER OF CYLINDERS . . . . . 1 - 16
POWER REQUIRED . . . . . 12 VDC, 3.0amp
24 VDC, 1.5amp
MAX. VOLTAGE OUTPUT . . . . . 40 KV
SPARK DURATION . . . . . 600 microsec.
UNIT SIZE
Enclosure . . . 3.25" H x 7.90" L x 3.60" W
Mounting base . . . . . 8.12" L x 5.13" W
NOTE: Custom units available for OEM usage.

DIMENSIONS:

WIRING DIAGRAM - 12 CYLINDER



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