

FEATURES

- **Dual-frequency**
- **Harsh-environment durability**
- **Factory-programmed or field programmable**
- **120-bit data storage**
- **Powered by lithium battery**
- **10-year average service life**
- **Reliable, long-distance performance**
- **Compatible with multiple Amtech-brand reader systems**

AT5510 Transportation Tag



The AT5510 Transportation Tag is a dual-frequency, battery-powered field disturbance device used in applications requiring long-range operation. The tag is ideal for use with intermodal containers, commercial vehicle operations, and equipment identification, or in any harsh environmental conditions requiring a durable weathertight tag.

The tag may be factory-programmed, as specified by the customer, or user-programmed in the field using the AP4110 Programmer. It stores up to 20 six-bit alphanumeric characters of data (120 bits). TransCore provides a polycarbonate plug with O-ring with each unprogrammed tag to seal the tag's access port after field programming.

A small lithium battery cell energizes the AT5510 Transportation Tag. The battery is compliant with U.S. DOT 49 CFR § 173.185(i) and ICAO (international) regulations for unrestricted shipment. Consult local agencies for regulations if the tag is to be shipped outside the United States. With continuous use, the average useful tag life is 10 years. The number of tag reads and RF fields from other sources do not affect battery life. The AT5510 Transportation Tag's integral battery power improves its responsiveness, permitting reliable performance at distances of up to 35 feet (11 meters).

The AT5510 Transportation Tag encodes the signal received from an Amtech®-brand reader system with an identification number or a data message. The encoded signal reflects back (backscatters) to the Amtech reader system. TransCore's Amtech-brand readers — series AI1200, AI1300, AI1400, and AI1600 — can read the AT5510 tag.

AT5510 Transportation Tag

COMMUNICATIONS

Frequency Range

902 to 928 MHz

2400 to 2450 MHz

Typical Working Range

With 915 MHz band operation:
5 to 35 ft (1.5 to 11 m)

With 2450 MHz band operation:
5 to 10 ft (1.5 to 3 m)

Range depends on system parameters.

Polarization

Parallel with longer side

SOFTWARE FEATURES

Data Capacity

Up to 20 six-bit alphanumeric characters
(120 data bits)

POWER REQUIREMENTS

Power Source

Lithium battery (10-year average life)

PHYSICAL

Dimensions

Size: 9.3 x 2.38 x 0.69 in
(23.6 x 6.0 x 1.75 cm)

Weight: 6 oz (170 g)

Case Material

Weatherproof, UV-stabilized case is sealed with a snap-in removable plug and O-ring.

Mounting Surface

Fastener Mounting: Can be mounted directly to any flat, smooth metal surface using bolts, screws, or blind rivets.

Backplate Mounting: If the mounting surface is nonmetallic or irregular, the tag must be mounted to a metal backplate that is attached to the surface of the vehicle or object.

Tape Mounting: For applications where the integrity of the mounting surface cannot be compromised, the tag can be mounted on a smooth flat surface using double-sided tape.

Mounting Method

Bolts, screws, rivets, double-sided tape

ENVIRONMENTAL

Operating Temperature

-40°F to +185°F (-40°C to +85°C)

STANDARDS

The AT5510 Transportation Tag meets the criteria for tag configuration and performance specified by the International Standardization Organization (ISO) DIS 10374 container identification standard for automatic equipment identification and the ANSI standard for freight containers.

OPTIONS

Case Color

The AT5510 Transportation Tag is available in a gray or olive drab case. It may also be custom-ordered in a range of colors. Special conditions may apply.

Laser Etch

Tag type, date of manufacture, and other data can be laser-etched into the tag's case.

Ultrasonic Seal

Factory-programmed tags may be custom-ordered with the programming port ultrasonically sealed.

Removable Plug

For reprogramming transportation tags, order the removable plug with O-ring for a weathertight seal of the programming port. Sold in units of 50.

ACCESSORIES

Mounting Tape

Double-sided polyurethane foam tape is available in 36-yard rolls or tag-length segments.

AP4110 Programmer

The AT5510 Transportation Tag may be programmed in the field using the AP4110 Programmer. The AP4110 Programmer programs the tag through the programming port located on the back surface of each tag.

Plug Removal Tool Kit

When reprogramming of Amtech transportation tags is required, the AS8003 Plug Removal Tool Kit cleanly and easily extracts the existing plug and O-ring without damaging circuitry or programming port contact surfaces. Order replacement removable plugs with O-rings prior to reprogramming transportation tags.

DOCUMENTATION

Intermodal Tag Mounting Guide



For product information call: 1.800.923.4824 or 972.733.6600 (outside the U.S.) Fax 972.733.6486

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