GENERAL INFORMATION

1.1. Product description of the TR-L100

The TAGSYS Textile L100 Reader (TR-L100) smart label packaged reader is intended for Original Equipment Manufacturer (OEM) applications.

The TR-L100 reader incorporates hardware, software and other components that manage the Radio Frequency (RF) interface as well as the external connections for power, data exchange and various communication protocols.

The TAGSYS TR-L100 reader is specifically designed for use in Industrial Laundry and Textile Rental environments and therefore is easily integrated into conveyor system applications.

Customized software, such as STXE Protocol application or the Teletype (TTY) menu application, can be easily downloaded.

3.1 Key Features

- 13.56-MHz RF multi-channel packaged reader
- Multiple tag compatibility (TAGSYS and ISO 15693 smart labels)
- Standard software applications
- High RF output power, with software configuration
- Software-configurable multiplex operating mode
- Two dedicated processing units, namely a microcontroller for the customer application and a Digital Signal Processor (DSP) unit for real-time signal processing
- Serial communication with an embedded end-user application
- Multi-purpose configurable industrial I/O ports
- Parallel port monitoring

3.2 General Description

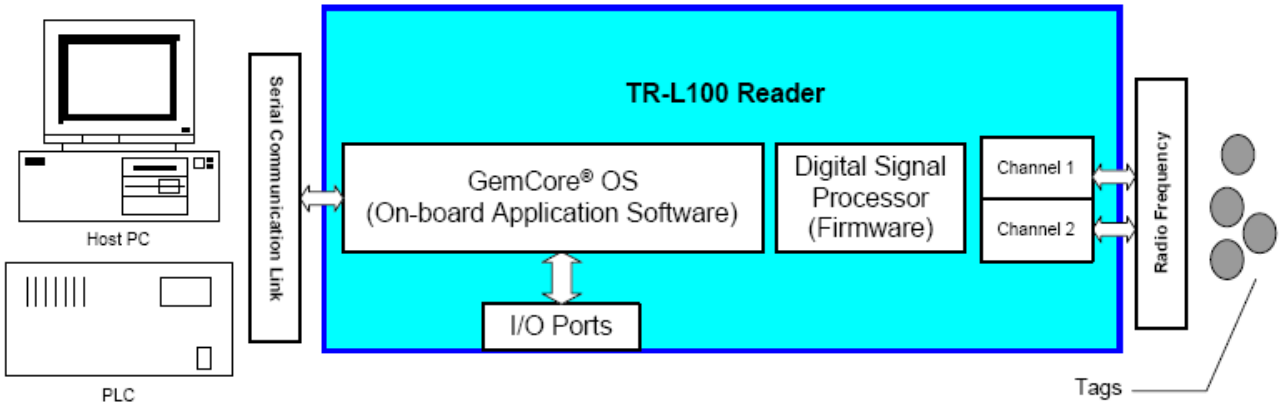
Figure 1: TR-L100 Packaged Reader

The TR-L100 Reader is specifically designed for the Industrial Laundry and Textile Rental sectors. The TAGSYS Firmware is optimized for these applications and in particular for Multi-Read operations. Compatible with C210, C220, C240 and C270 tags, it is easily upgradeable for processing the future ISO 18000 tags.

As the TR-L100 reader unit is developed for Industrial Laundry and Textile Rental applications, it is delivered with the standard TAGSYS STX on-board application software that integrates an industry-specific Standalone mode.

Included with the TR-L100 package is the L200 Explorer, a Windows®-based development tool that enables you to carry out on-site test and debug operations as well as to customize the Standalone mode for your system.

Figure 2: TR-L100 Architecture



1.2. Related Submittal(s) / Grant(s)

All host equipments used in the test configuration are FCC granted, when relevant.

1.3. Tested System Details

The FCC IDs for all equipment, with description of all cables used in the tested system are:

Trade Mark – Model Number (Serial number)	FCC ID	Description	Cable description
TAGSYS – TR-L100 * Sn: B0721125F0-R	QHKTRL100AEROLBLC	Read/write tagging station	Power cable, unshielded Serial cable: shielded
HEWLETT PACKARD –Vectra VL420.DT Sn: FR14122957	DOC	Laptop Personal Computer	Power cable: unshielded Serial cable: shielded
Hewlett Packard P/N: C4742-60101 Sn: C990897683	DOC	Keyboard	PS2 cable (1.2m)
Hewlett Packard P/N: C3751B Sn: LZA62831260	DZL211029	Mouse	PS2 cable (1.2m)
Hewlett Packard P/N: D2846 Sn: JP4001000	DOC	Video Monitor	Standard AC power cable (1.8m) VGA cable, shielded (1.5m)

***: Equipment under test.**

1.4. Test Methodology

Both conducted and radiated testing were performed according to the procedures in ANSI C63.4-2003, FCC Part 15 Subpart C.
Radiated testing was performed at an antenna to EUT distance of 10 meters. During testing, all equipment's and cables were moved relative to each other in order to identify the worst case set-up.

1.5. Test facility

Tests have been performed on August 29th and 30th, 2007.

This test facility has been fully described in a report and accepted by FCC as compliant with the radiated and AC line conducted test site criteria in ANSI C63.4-2003 in a letter dated July 14, 2005 (registration number 94821).
This test facility has also been accredited by COFRAC (French accreditation authority for European Union test lab accreditation organization) according to NF EN ISO/IEC 17025, accreditation number 1-1633 as compliant with test site criteria and competence in 47 CFR Part 15/ANSI C63.4 and EN55022/CISPR22 norms for 89/336/EEC European EMC Directive application. All pertinent data for this test facility remains unchanged.