

Defining the Problem:

Parts suppliers are now being required to print labels as they make the product at the assembly line. The label must be printed automatically and verified that the correct label was added to the part.

Solution:

Automate the process to where the machine automatically selects the part number being manufactured, triggers the label to be printed and receives a signal verifying the correct bar code was scanned.

How to Do It:

INTEG, along with its systems integration partner, Solutions Technology Group, have teamed up to create and implement a cost-effective, easy to use, flexible system based on the INTEG JNIOR Automation Controller that can reliably interface with signals from the production line, print bar code labels, and interface with bar code scanners for label verification.



System Features:

- No PC required, just the JNIOR controller
- Serial and/or Ethernet Connections for Printer and Bar Code Scanner
- Web interface for configuration/monitoring
- Print Directly to Label Printer or send commands to business system to print
- Digital Inputs for control signals
- Relay Outputs to provide Go/No-Go signals



JNIOR 410 with Zebra Printer and Bar Code Scanner

The INTEG JNIOR Automation Controller is a next generation controller. It is not a PLC, PAC or PC. It is a flexible, reliable controller with PLC and PC like characteristics. The JNIOR has digital I/O and expansion modules, web server, Secure HTTPS, Telnet, FTP, email, Java Virtual Machine (JVM), and a variety of other features.

JNIOR Automation Controller and the Line Side Printing Application

With a modern web server, the JNIOR allows for quick development and implementation of dynamic web pages using HTML5 and web sockets for real-time connections.

The Line Side Printing web page has login security and provides the needed functionality to set-up the application.



10.0.0.251/linesideprinting

Line Side Printing Status **Settings** Label Preview View Application Log

General

Generate Label Use this option to generate a label using a variety of generation methods.

Verify label Use this option to verify a label using a barcode scanner.

Save Cancel

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Line Side Printing Status **Settings** Label Preview View Application Log

Barcode Verification

Match Output: 1 Pulse Duration: 4000 ms

No Match Output: 5 Pulse Duration: 4000 ms

Serial Port: AUX

Save Cancel

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Line Side Printing Status **Settings** Label Preview View Application Log

Label Generation

AS400 via FTP

Direct Printer

Printer Type: ZEBRA ZT230 - 203dpi

Ethernet

Serial

Port: AUX

Save Cancel

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Line Side Printing Status **Settings** **Label Preview** View Application Log

Label Preview

Label Dimensions: Width: 1.5 (inches) Height: 1 (inches)

Print Label Save Cancel Delete Add Text Add Barcode

Value: {{PartNo ##}}|{{CustDate:xyzdate}}|{{Seq ####}} Horizontal: 2 (inches) Vertical: 4 (inches)

Justification: Left Font: 10pt

Value: {{PartNo ##}}|{{CustDate:xyzdate}}|{{Seq ####}} Horizontal: 15 (inches) Vertical: 15 (inches)

Height: 2 (inches) Narrow Bar Dots: 1 (dots)