

Design Win

#150

Problem

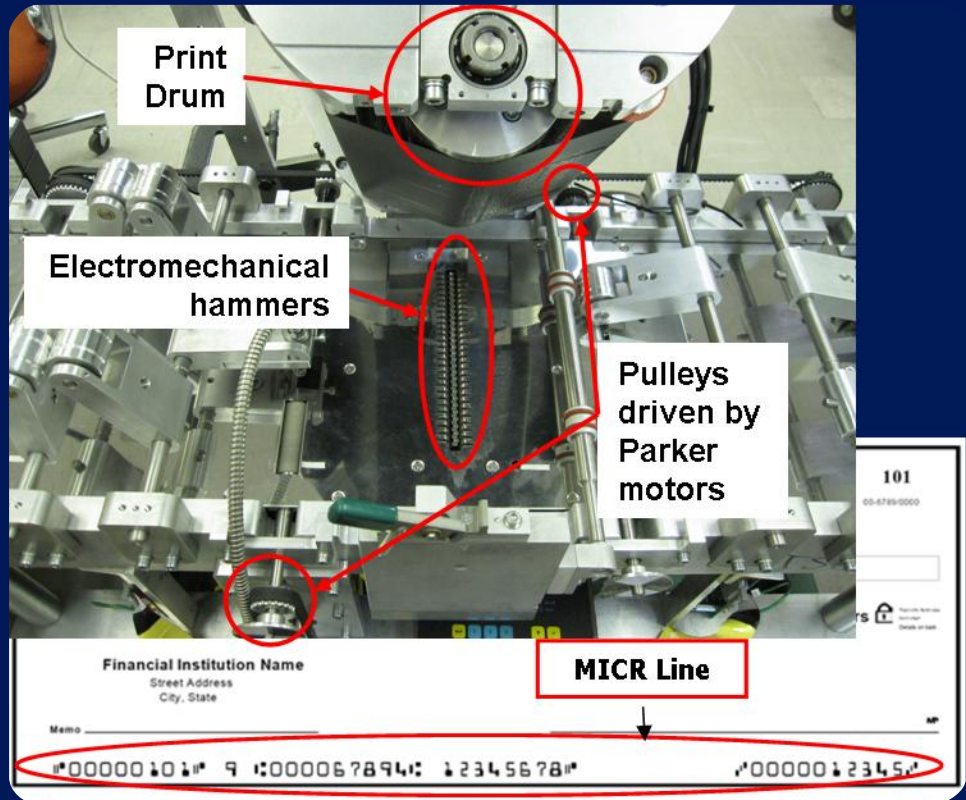
MICR (short for Magnetic Ink Character Recognition and pronounced "Myker") is a printing standard developed by the American National Standards Institute (ANSI) that is required on all checks printed in many countries, including the United States. The MICR line allows the account number, routing number, etc. to be automatically and easily read by inexpensive machines. To add additional security to the check, many countries require that the MICR line be impact printed.

Solution

Kerning Data Systems, Inc. manufactures the MicrMaster Printing Systems to print multiple characters simultaneously on the same line using a large spinning print drum. As the drum is rotated over the paper surface at 500 rpm, electromechanical hammers underneath the paper push the paper onto the surface of the drum, marking the paper with the shape of the character on the drum.

The system uses Parker motors, drives, and multi-axis controller to load and position the sheet of paper underneath the impact printer. To print 200 pages (800 checks) per minute, the motion system makes a 250 degree move and settles in less than 45 milliseconds to position the paper for impact printing.

Parker Prints Checks



Success Factors

Low rotor inertia of MPP motor - ideal for indexing

Industry leading servo loop update rate of Aries EPL drive

Tightly coordinated motion over an EPL network

Common software platform with Aries controller

Customer Value

Increased throughput: The industry standard throughput is 160 pages per minute; this system is capable of producing 200 pages per minute - an increase of 25%.

FEATURED PRODUCTS: ACR9040 EPL motion controller, Aries EPL servo drives, MPP servo motors

MARKET Special Industry Machinery
CUSTOMER Kerning Data Systems, Inc.
COMPETITOR N/A
DISTRIBUTOR Pacific Technical Products
CONTACT Mike Szeszterniak
mszeszterniak@parker.com

