

NEWS & RECORD

Greensboro Adds Shaftless Capabilities with Repower

NEWSPAPER:

The News-Record
Greensboro, NC

PARENT COMPANY:

Landmark Communications Inc.

CIRCULATION:

Monday-Saturday ~ 95,000
Sunday ~ 112,000

EQUIPMENT:

Two Goss Metro Offset Presses
Two presses in a line-up
(13 units, 2 double-out
folders)

PROJECT TEAM:

Brock Solutions Inc.
Masthead International

DURATION OF PROJECT:

20 weeks

PROJECT HIGHLIGHTS:

- New AC Drives and Motors
- Shafted and Shaftless operation
- Brock APRP
- Folder Console Touchscreen
- Web Path Selection option
- Interface to Microtrac Auto Registration System
- Selectability including addition to allow end units to jump folder to next press

The Project

The News & Record in Greensboro, NC recently converted their two vintage 1976 Goss Metro Offset printing presses from DC to AC in an attempt to increase press reliability and eliminate problematic obsolete parts. In doing so, a decision was also made

to add the flexibility of "Footprint Shaftless" to each of their 13 units. The initial discussions for the changeover from DC to AC focused on the projected energy savings and the press reliability; however configuration limitations and reduced make ready spurred the consideration of a Shaftless component to the modernization. The concept of disengaging clutches from between units was carefully evaluated. Brock's unique Master Press Control configuration allowed the option of having the press run either Shafted or Shaftless affording the ability of reverting back to the shafted configuration in the event of a drive or motor failure. This option also allowed the upgrade to take place with no additional downtime.

**Management Comments:**

"In 2006 we converted our 30 year old press to a new shaftless drive system developed by Brock. We have had a great experience working with Brock and Masthead on this project. Shaftless has proven to be a great way to improve efficiencies in a number of areas. We have been able to reduce set up time, changeover time between editions, improved registration, and improved our ability to do maintenance on a unit (and move the unit) while we were printing on other units on the same press. The pressmen appreciate the flexibility that shaftless provides them."

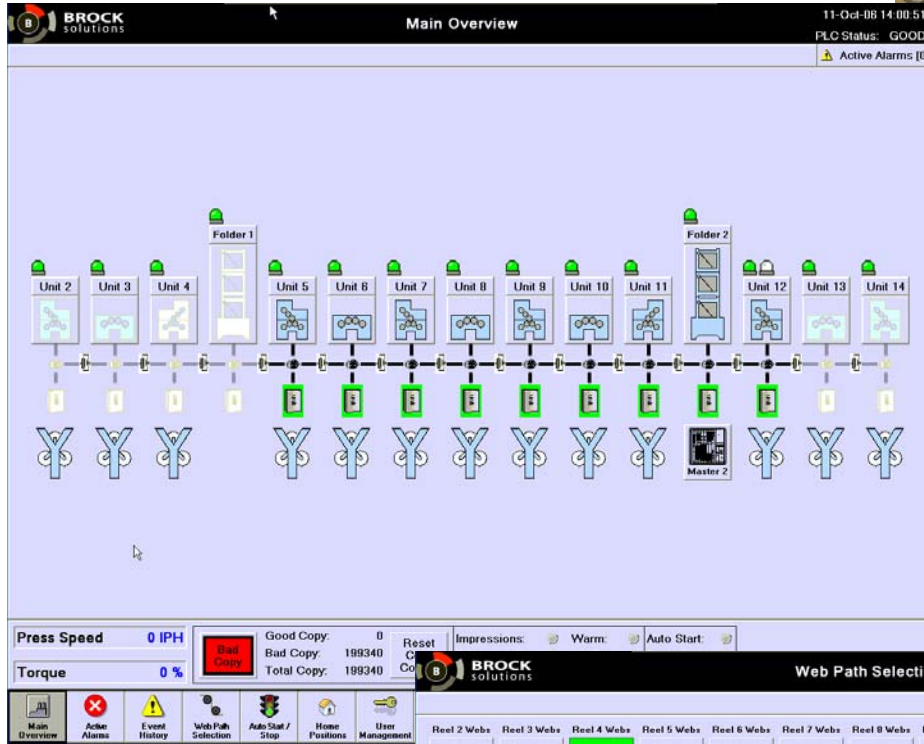
Dennis Creamer, News & Record
Operations Manager

Printing Press Solutions that PERFORM.

www.brocksolutions.com

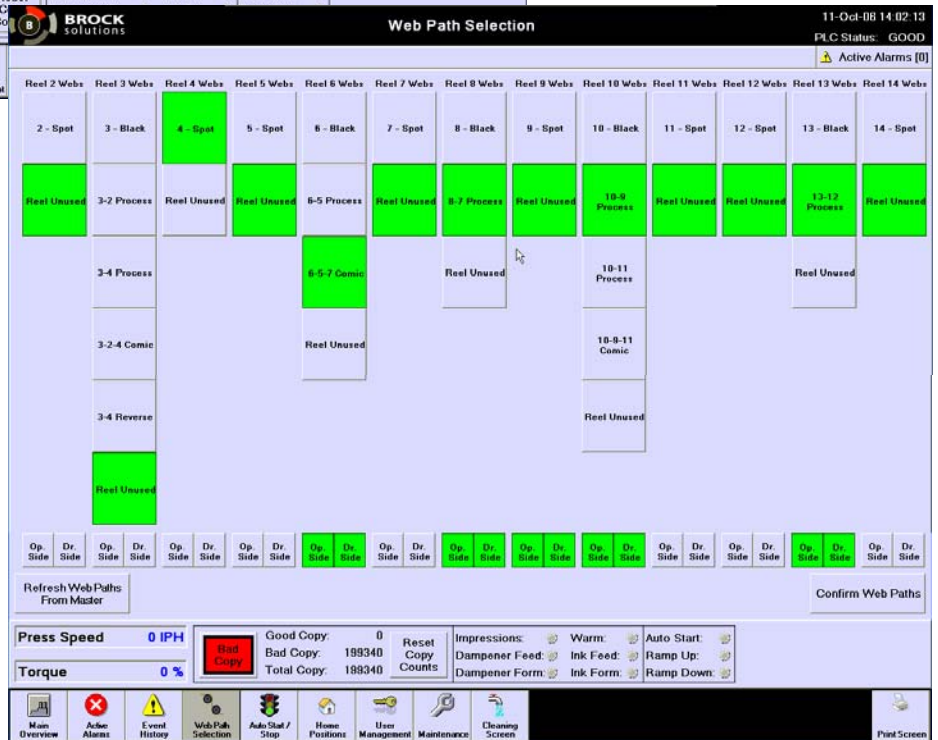
Folder Console Touchscreen:

Brock installed a new touchscreen on each of the two folder consoles to allow operators a graphical view of the press at their fingertips. This screen eliminates all mystery stops and provides accountability for all stops and press related events. All unit functions like safe/ready, stop, lube faults, etc are reported individually. Web break detectors and web severers are pin pointed down to the device.



The Main Overview screen displays things like stops, First (web) Break Indication, safe/ready status with representative icons for quick diagnosis of press status. An Events History screen in basic terms provides a production report for months of operation. Other screens include Active Alarms, Autostart and Maintenance.

The Web Path Selection screen permits the operators to input the web paths they are using to predetermine electronic registration from unit-unit in shaftless operation. This also allows for automatic preset for web detector/severer configuration thus eliminating the sometimes forgotten manual selection of the web lead selector switch on 3 color units.



The Solution

The modernization took advantage of a phased-in approach that allowed minimal disruption to the News & Record’s regular production schedule. Phase one began with the replacement of a selected number of the drives and motors, with coordination by the existing Master controller. The order in which this was executed was carefully planned out with Production staff as Greensboro exercised their selectability on a nightly basis. Once enough drives and motors had been changed for the press to be operational, then the Brock Master Controller was introduced for shafted operation. Subsequently, the remaining drives and motors were changed out and then the second press Master Controller was switched over.

The changeover for each press transpired over a two week period.



Drive Cabinet



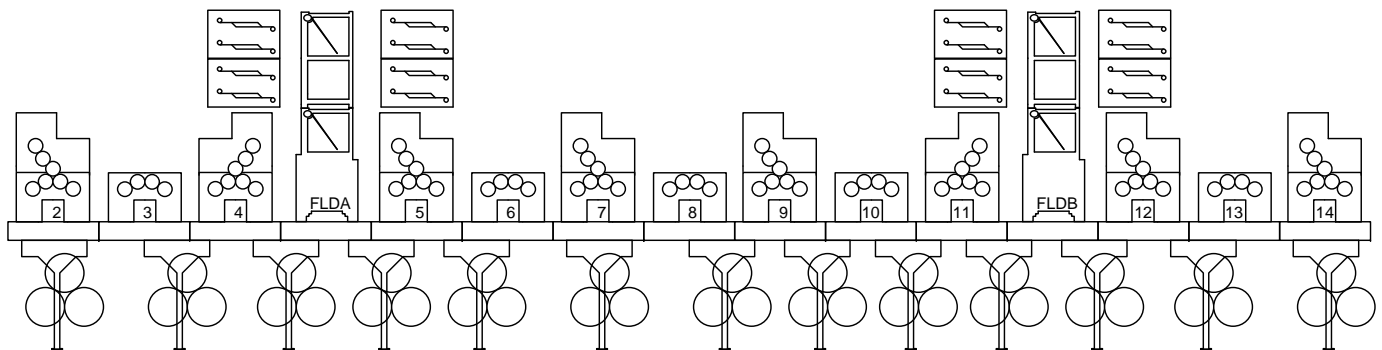
Master Cabinet

At this stage both presses were completed for Shafted operation. Phase two involved the final installation and commissioning of the presses for shaftless operation. This approach allowed this work to be performed in downtime windows which was the ultimate for risk mitigation and full press utilization for production.

Brock installed each press with a Master and a Backup Press Controller to regulate the drives. The Master Controllers are responsible for sequencing the press as well as for regulating the speed and positioning of the individual units.

The News & Record requested the press maintain the capability of running Shafted or Shaftless at any time. This was achieved by physically unclutching or clutching the units and simply flipping a switch.

In addition, three end units (2, 3 and 4) that comprise a back-to-back or comic lead were converted to selectable units, allowing them to run to either folder. This unique approach allowed enhanced flexibility with maintenance schedules and press web configurations.



Advanced Press Reporting Package (APRP)

Both maintenance and management personnel at The News & Record expressed an interest in having the ability to easily access accurate press statistics on a daily basis. They opted for Brock's Advanced Press Reporting Package (APRP) for a detailed look at critical Press Production details. This provided the operations team with the essential information required to optimize press uptime and production.

APRP information includes status items such as press speed, web severing events, etc to fault events like folder jam, individual web breaks, individual stop buttons, etc. All this information can be emailed on a daily basis.

Developed on a windows PC, APRP maintains a database and provides a web browser interface that allows easy viewing of press operational data from any computer on the corporate network.

This package is scalable to include Press Drive systems, Brock's RTP solution, Conveyor upgrades, etc.



The Project ROI

As expected, the elimination of obsolete parts notably improved overall press uptime, and at the same time generated considerable returns in other areas for the News & Record including:

- **Significantly reduced energy consumption**
- **Increased Production Flexibility and Throughput**
- **Quicker and Easier Press Set-up turn-around**
- **Reduced Drive-related Downtime and Maintenance costs**
- **Simplified Time-saving Maintenance Schedule**
- **Improved Press Diagnostics and Production Reporting**
- **Faster replate and registering of plates between editions**
- **Quicker registration from cold start**
- **Auto timing between units and folders (cutoff)**

Production Comments:

"While looking at the scope of this project, I discovered that this project was going to be difficult. Teamwork means everything when doing a project that has a great potential to interrupt our daily production. Brock Solutions and Masthead's ability and experience made this project positive for all involved. We now have units and folders that can move independent of each other. This means we can replate, register, and perform maintenance at the same time on different units. This saves time and money. Running shaftless will make our press rebuild project scheduled for 2008 easier since we will be able to run past units that are being rebuilt and across our folder. Working with this Brock Solutions and Masthead Inc. has helped us to make our 30 year old press more current with today's technology."

**Jay Toler, News & Record
Production Manager**