

How to get slitters back on track

Have you ever experienced slitters that don't spin well, in turn leading to web breaks?

Friction slitters can become clogged with paper lint, thus preventing them from spinning freely. The clearance between the slitter blade and the hard ring can be improperly set. When this occurs, the slitter can't turn at press speeds.

In some cases, the slitter assembly will become clogged because of paper-tape passing between it and the drag roller, in the process fueling a web break.

Or, the round bar that supports the slitter assembly will not position the slitter close enough to the hard ring to allow the slitter to move properly. Lateral movement in the slitter support bar will cause the setting of the slitter to the hard ring to change, causing a rough cut or no cut at all.

Web breaks can also be caused by wrinkles passing under the slitter area, especially if the slitter becomes a little dull. Another problem with the friction slitter is that the slitters may not cut well if the web tension is too light – a situation exacerbated if the slitter isn't sharp enough.

Alternative

Motorized slitters will eliminate these problems. A motorized slitter spins at a faster rate than the web is moving, enabling a smooth cut. The web will be cut even if wrinkles pass under it or the web tension is too loose. Additionally, a motorized slitter can be designed to work only when the press begins to move.

Motorized slitters are easy to install since they mount to existing slitter bars. In most cases, old slitter brackets can remain on the slitter bar as long as there is room to install the slitter motors. (The motors themselves are clamped on the slitter bar.)

The motorized slitter can also be equipped with a small air cylinder to engage and disengage the device, which improves the ability of the slitter to maintain its setting.

Motorized slitters are pricier, but the cost can be more than offset by a reduction in newsprint waste and downtime occurring from web breaks.

A motorized slitter will also reduce the aggravation associated with re-webbing the press.

Facing a web reduction?

With all the attention now being paid to web-width reductions, a less costly alternative, spreader bars, may be a viable option.

A press cut down can be very expensive. The former boards may need to be cut in order to maintain a proper centerfold in the section of the paper, which may include folder drive modifications.

The nip barrels may need to be replaced because they will not come close enough to pull the first fold of paper into the folding cylinder. The folding cylinder or cutting cylinder may need to be modified because of the narrower web (pin placement).

RTF modification is also necessary since the tab slitter will need to be moved in as well. The units will need to plate lockups repositioned and the ink system will have to be modified as well.

Consider the spreader bar. A spreader bar splits the web before it passes over the formers, spreading the two separate pieces of paper far enough apart to be centered over the former, eliminating an expensive cut down. Another advantage: a reduction in the amount of “spaghetti” created by the center slitter.