

Is the wrapper ready?

Frank Mickan
Fodder and Pasture Specialist
Vic, DPI, Ellinbank

Even “Super Wrapper” cannot successfully wrap badly shaped bales or if supplied with poor quality plastic or if he applies the incorrect number of layers.

However, many bale wrapping problems can be avoided if the wrapping machine is properly maintained and prepared for the upcoming season. As a comparison, would you go on a trip in a car that has sat in the shed for six months without at least a thorough check out?

Seven pre-season checks for the wrapper are:

1. Make should all moving parts do just that, and freely. Ensure, especially, the pre-stretch unit (PSU) which can stiffen up or occasionally cease in the down period.
2. Check the wear and tear on all belts, and consider replacing them all if only one is worn or damaged as the others may be on the way out. Badly aligned or worn belts can affect film overlap.
3. Check the turntable gears and a bearings and the PSU itself for wear and tear.
4. Check the PSU rollers for any damage, ensuring they are all cleaned with degreaser.
5. Check PSU springs or other tensioning apparatus, replacing any if necessary. Dirty or worn rollers can cause film tearing. aquaplaning, and film application will be uneven.
6. Check film overlap and correct stretch by wrapping a well shaped round or square bale. To do so:
 - a) Align the PSU with the centre of the bale to achieve 50% overlap. The thirds layer should just cover the bottom of the first layer applied. Not easy to see with black film.
 - b) Measure film neck down at the bale (750 mm should be between 580 – 610 mm, 500 mm between 380 – 410 mm).
 - c) Measure % stretch by marking 10 cm on the film roll and remeasuring once film is applied to the bale. Most Australian machines have a 55% stretch so the mark should now measure 15.5 cm. Check that the correct gears are installed for the correct film type. There are now alternative plastics requiring different gearing for different % stretch.
 - d) Ensure the correct number of turns of the turntable to apply the minimum but sufficient amount of film by counting the number of revolutions to completely cover the bale, THEN add 1 turn. Double this number for a minimum of 4 layers or three times to apply 6 layers.
7. Maintain and service the wrapper regularly as per manufacturers guidelines

Some bales are now being made at 1.35 – 1.50 cm diameters so the PSU will need to be lifted to remain at bale centre. If not, underlapping will occur. Some bales being wrapped are 1.50 cm long so occasionally has created extra stretch at due to the

longer length and faster speed at the bale ends. Keep unused film out of the hot sun as heating rolls can behave differently when being applied.

During the season, regularly clean the PSU rollers, check for stretch and overlap and for automatic wrappers, make sure it is still applying the number of turns that it was “told”.



Figure 1. Underlapped plastic on bale
After Nov 2003 (Kybaram)



Figure 2. Checking pre-stretcher for 55 % stretch
2008 shots