vic roads

Testing Times

Issue 23

July 2008

[redacted]

In this issue:

Dim Lights

In Testing Times 22 we talked about bright lights - aftermarket HID lamps - which are required to have a self levelling system and a lens cleaning system. But what about all those other aftermarket lamps, particularly the custom tail/ stop/turn and reverse lamp units which are now readily available for many cars?

In the old days, it was very difficult to get anything but the OEM lamps to fit in the body opening and if the OEM lamps were fitted with any sort of coloured aftermarket covers you could be pretty sure that the light output would be below the minimum required by the ADRs. In fact, even clear covers on some headlamps could drop the light level to below the minimum but this was generally only marginal and very difficult to prove.

But now, aftermarket custom rear lamp units come with all sorts of fancy bezels, reflectors and lens and look quite different to the OEM units in all but their outer housing shape.

Not so long ago you could say that if the rear lamp units were not OEM or were not ECE marked then they were unacceptable. However, recent changes to the ADRs now allow non-ECE marked lamps to be used. So where to from here?

Because it is impossible to check compliance of lamps without complex testing processes you will have to use some basic rules of thumb. If the lamp when working shows light that is the same as the original and is the same brightness, then it should be OK as loang as it also meets the angles of visibility specified in VSI 10.

If the light emitted is quite dull or is significantly reduced [as it would be on the black vehicle shown at the bottom of the previous column] or discoloured because of the outer cover colour or tint then they should be rejected.

While most coloured covers will cause the lamps to show colours outside the required range, a very light gray, or light blue outer cover like the one on the right, may not move the colour of the tail, stop or turn signals outside the acceptable range [amber light has a component of blue light and red often does, too] and even the reversing light colour may still be bluish white which is also OK [white light has a very large component of blue]. However, if the light emitted is quite dull [as it would certainly be with a medium to dark gray or blue cover] or the outer cover is any other colour then the lamp unit should be rejected.

So when the various lights are turned on, the question to ask is "Is it obviously a tail light, a stop light or an indicator?" And don't forget to check the reverse lights. This all may sound complex but remember, when they are on, tail and stop lights are red, indicators amber and headlights, parking lights and reversing lights are white.

One last thing to check with aftermarket units is the red rear reflectors. Many of the clear lens types have been found with this important item missing. If the original unit had an inbuilt red reflector then they have to be on the replacement unit also. This also applies when swapping OEM lamps for OEM lamps. For example, with the VX Commodore range, the Executive, S and SS rear lamp units did not have red reflectors - they were built into the rear skirt. So these units cannot be fitted to the Berlina or Calais both of which had the red reflector built into the lamp unit unless the skirt is changed too.