## **HOW TO HANDS ON**

# Go Retro Make your late Mini look like a '60s classic by fitting MkI tail lights.

oing for the classic Mk I look on your late model Mini gives you the best of both worlds. You get the modern refinements such as wind-up windows, newer switch gear and a more powerful engine, plus the looks that made the original Mini such a success back in the '60s.

Many of the changes required to complete the transformation can be made with bolt-on parts. Adding boot lids, grilles and chrome trim to your modern Mini is straightforward, but to pull the look off properly you're going to have to be more

adventurous. There are two main differences: smaller, rounder tail lights and exterior mounted door hinges. Both of these can be fitted if you've got access to a welder and you don't mind a bit of hard work.

Tackling this sort of job can be a bit daunting, especially if your Mini is already painted and looking nice, but if you need to do some repairs anyway then why not go that little bit further? This month we will look at fitting the MkI tail lights, the easier of the two modifications and the one that most people go for when building a retro Mini.

You will need a few things before you begin; a pair of rear light clusters and the conversion panels are a good start. We bought our lights from eBay, but new ones are available from many of the specialists that advertise in Minimag. The conversion plates were bought from Hadrian Panels, but again most specialists should be able to source these for you.

You'll also need a selection of tools including a decent MIG welder, tin snips, grinder and a few spanners, as well as some terminal pliers and snips for sorting out the electrics.

### **TOOLS REQUIRED**

MIG welder, grinder, tin-snips, spanners, hammer, crimping pliers, body filler and electric sander.

#### TIME TAKEN

Just a couple of hours max.

#### **SAFETY**

Always wear eye protection while welding or grinding and remember to remove any flammable substances from the immediate area.



First job is to remove the old light units. This is done by undoing the securing nuts from inside the boot and then disconnecting the electrical connection. We sold our old units on eBay to recoup some of the cost of the conversion.



3. As you will be welding at the back of the car you also need to remove the fuel tank. Welding in close proximity to the tank is a risky business and you are endangering your own life as well as those around you by doing it!



2. New and second-hand lights are available; when buying second-hand units ensure that they still have the wiring intact and that the lenses are in good condition. As mentioned, the Hadrian Panels conversion plates can be sourced from most good Mini specialists.



4. You will need to remove the paint from around the old light aperture. I prefer to use an air saw with the blade just scratching the paint off. You can use a sanding disc in a grinder or similar, but take care not to remove too much metal at the same time!

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5. Like most things, the plate will need a little bit of trimming to get it to fit properly. You may also need to shape it slightly to follow the contours of your car. Mark the panel where you need to trim it.



6. Then use some good quality tin snips to trim the panel to size. Ideally the plate should sit just below the lip around the old light aperture. If it sits proud then no amount of filler will be able to blend it in successfully.



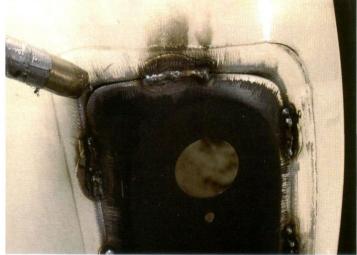
7. Once you are happy with the shape and profile of the panel, clean up the edges to remove the protective layer of paint and tack them into position. You only need a few tacks at this stage, just enough to hold it in place whilst you make any last minute adjustments.



8. The best way to check that the panels fit well is to use your hand (allow the welds to cool first!) and feel the transition between the new panel and the rear of the car. This should be as smooth as possible.



9. If any areas are slightly proud then use a body hammer to make any adjustments. If you have not removed enough metal from the panels then you'll have to grind through the welds and start again.



10. Once you are 100 per cent happy you can begin fully seam-welding the panels into position. Use short bursts of welds around 1 inch long, moving around the panel. If you try and weld it all in one go then the heat may warp the panel.



Allow it to cool every few minutes then start welding again. Repeat this until you have completely welded the panel in place. It's now too late to go back, so let's hope you like the retro look!



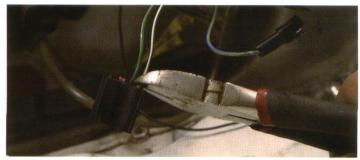
2. Once the panel has cooled down, dress back the weld using a sanding pad in a grinder. Remember to wear eye protection and, as when welding, move around to prevent unwanted heat build up.



13. A quick trial fit of the MkI light unit confirms that everything is OK. All you need to do now is repeat the process on the other side, then mix some filler and finish the job.



4. We applied a coat of etch primer first as we are still a long way off being ready for filler and paint. Use a good quality filler to cover the weld line and, providing you took your time and did it correctly, you should only require a very thin layer of it.



15. The old connectors that fitted into the original lamps are now surplus to requirements so chop them off. Do this as close as possible to the plug to allow plenty of wire to fix to the new lights.



6. The old MkI lights use bullet style connectors, so get half a dozen female bullet terminals and simply crimp them onto the existing wires. Ensure that the terminals are crimped securely, otherwise the lights may fail.



7. The colour code is the same on the early and late Minis so simply connect the corresponding wires together. You'll have one spare wire left over on the old loom, as the new lights do not have a reverse fitted.