Laser cutting

If you have been at the club recently you will have seen some very detailed lasercut buildings and rolling stock parts. However I thought I would share a couple of simple projects to share with you:

Replacement windows. I have an N gauge building facia from a Kibri kit that required 4 new windows as the originals were used in another project. This is a simple job requiring only rectangles. Below left, an original window from the kit and right, the new laser cut window which is still to be glazed. To help reduce any distortion from heat during cutting, the window holes are cut in 2 stages. Think of a chess board, the white squares are cut out first and then the black squares. By using different layers in the artwork you can control how the laser cutter cuts each piece, left to make it's own decision, it may not do the order you expect or want..



The second project was to create a complete end wall for a building. The original building is made from machined plastic card and the end wall is completely blank. The building will now be located on a corner and will be an

office so I wanted an end wall with windows. This was a little more complex as it is made from 2 layers as is the original building front and must match the existing parts. The first layer is made from 1.5mm thick material and has cut outs for windows and doors. The second layer has the window frames, when the two are lined up you get the complete wall with windows frames. This is completed by a sheet of clear glazing behind and some strips of Evergreen styrene on the front to give a few details. There are some fine lines on the front to help with this. Below left, the new end wall and right, the front of the building from the kit.



Both of these projects turned out quite well and were a good learning exercise. The holes have been cut out to the expected size (you have to allow for the thickness of the laser) and we can now import drawings from TurboCad having solved the conversion of units problems that the dxf format has. I will now be working on the station roof and some complete buildings for cutting and this will take quite some time to draw up. If you have not used the laser cutter yet, think up something simple and have a go. James is keeping a list of speed and power settings for different materials so the cutting stage should be as simple as possible for you. There is a material stock list on page 23.

Paul