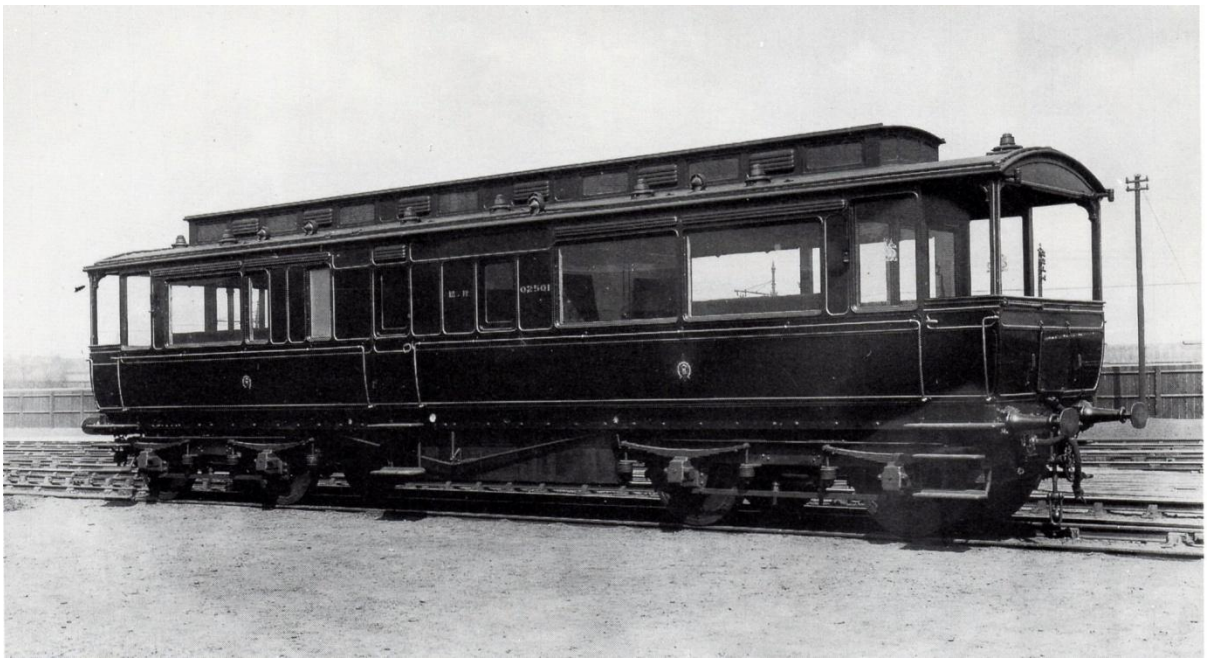
MIDLAND CARRIAGE WORKS

MIDLAND RAILWAY D462 ENGINEERS INSPECTION SALOON



HISTORY

The new inspection saloon was the first to be built in Clayton's period of office for use by officers of the company as they travelled throughout the Midland system on their official duties.

Only one vehicle to this diagram was built by the Midland Railway. It was ordered as Lot 49 in July 1880 and was originally built to drawing 490 in 1881. It was a splendid looking vehicle with a saloon and covered viewing platform at each end so that it did not need to be turned. The new No. 1 was 44 ft long over panels and was carried on 8 ft bogies.

In 1874 it was modified with addition of tie-rods to the solebars, to strengthen the under frame, and glass side screens were added to the end platforms. In the renumbering of 1902 No. 1 became No. 2501, this was changed to No. 02501 in 1904.

In 1905 it was fitted with electric light for examining tunnels. The brackets for the electric lights were fitted to the ends just below the roof. It also had one saloon shortened to accommodate compartments with lavatory and wash basin. The carriage interior lighting was still by gas at this time.

The parts included in this kit are to build this interesting vehicle as running after its final Midland rebuild in 1905. Originally numbered No. 1, this was changed to No. 02501 after rebuilding. Lasting through the LMS period and into BR days, it was renumbered by the LMS to 45034. Withdrawal was in 1948.

LIVERY

Body sides, clerestory sides and ends, Midland Lake. Mouldings on the sides and ends were black. Clerestory sides were originally lined, but later this was dropped. The mouldings on the body sides were lined each side with gold, before the turn of the century, however it was changed to yellow for non-passenger stock. Later still all non-gangwayed stock also had yellow lining. Gangwayed passenger stock always had gold lining in Midland ownership.

Solebars and headstocks were originally Midland Lake and lined in yellow. Between 1902 and 1914 this lining was dropped. From 1914 all below the body sides and ends became black. All below the solebars / headstocks was black with the exception of the wooden wheel centres which were sometimes painted Indian Red.

The roof was grey in service, often black up to the rainstrip on the lower roof of the clerestory coaches.

The Midland crest appeared twice on each side, this would not have been used on late repaints, although it is believed that it lasted longer than on ordinary service stock. The LMS initially continued the livery of the Midland, however later repaints would have followed the simplified style outlined above. In early British Railways ownership the vehicle would have received crimson and cream livery.

Further information about liveries can be obtained from Essery & Jenkinson's book "Midland Carriages an Illustrated Review", which includes information about lettering positions and styles employed can be obtained from the Historical Model Railway Society.

GENERAL

This kit is originally from the stable of Janick Models. It has been modified and upgraded and is continually being improved. Although it can be constructed with the body built on the chassis, it is recommended that the body and chassis are built separately. The two sub-assemblies can then be either glued or bolted together after painting.

Please read the instructions all the way through before commencing assembly and familiarise yourself with the accompanying diagrams.

Whilst every effort is made to ensure this kit leaves our premises in good condition and complete, occasionally errors do occur, in the event of complaint, please contact us at the address at the end of these instructions.

CONSTRUCTION

Coach Body

It has been recommended by some modellers to remove the tabs on the inner sides prior to assembly as this may give a better appearance to the finished model but this procedure is entirely up to the individual builder.

Curve the tumblehome on the inner sides (1) and bend the bottom flanges at right angles to the coach side. Use the coach end to obtain the correct profile. When satisfied with the shape of the inner side, curve the outer side (2) to match the inner side. Clamp the inner and outer sides together (wooden sprung cloths pegs are ideal for this) and solder along the top edge and through the window openings.

Fold over tabs at the ends of the sides if not removed.

Curve the tumblehome on the ends (3) and fit ends to the sides, ensuring they are square.

Trim inner ends (4) to fit and solder in place between the sides. Trim beadings (5) & (6) to fit along the top edge of the verandas and solder in place.

Fit the louvered vents (7) & (8) to the body side above the doors and windows. Drill out the holes in the body for the door and grab handles but do not fit until after painting.

Chassis

Fold up the floor unit (9) and fit the solebars and buffer beam overlays (10) & (11). Fit buffers, vacuum and steam heating pipes to the buffer beams.

Fold up the bogie mountings (12) (Do not use the one on the main chassis fret, a replacement is enclosed with the bogies).

Fit the vacuum cylinders in place (13), the cylinders face to the outer ends of the coach. Fit the queen post castings (14) to the floor, up against the solebar. Make truss rods from the 0.9mm wire provided.

Fold up the battery box (15) and fit overlay (16) in place. Fit battery box and gas cylinder in the places illustrated on the drawing.

Make up the steps (18) and fix to the solebar. NB. On a model that has to negotiate tight radius curves, the steps at the outer ends of the coach may obstruct the movement of the bogies. This can be overcome by cutting the steps into two halves, the lower half being fixed to the bogies, so that the steps swing with the bogies.

Interior

Cast resin coach seating is provided but will need to be modified to suit the height of the windows.

Roof

Form the roofs using the ends as a pattern for the shape. Solder together the etched clerestory sides (21) and ends (22). Fix to roof base centrally either glue or solder. Mark out and drill the roof for the cast torpedo vents and gas lamp tops. Fix the castings in place. Roof rainstrips can be made from the wire provided. The clerestory roof top can be fitted in place after painting and glazing.

The model can now be cleaned up and painted. When painting is completed, glue the glazing in place. Fit the grab and door handles.

Wayoh Bogies

As an improvement the original kits the white metal bogies have been replaced with Wayoh bogies.

Wayoh bogie kits have been designed to allow easy assembly using basic hand tools.

Identify from the list below, all the parts provided BEFORE you commence assembly and study the exploded diagram, which shows the various etched parts in their ready to assemble form. Cut parts from the fret and form as shown. The assembly order detailed in the instruction sheet is suggested but can be varied if necessary. We recommend you run a fillet of solder inside the folds of the etched parts to give strength and prevent sagging during use.

Clean off any remaining flash from the resin castings and mark out and drill the axle boxes to give a clearance hole as necessary so that the castings fit over the brass bearings.

Parts List

2 x Brass pivot studs
2 x 4BA steel washers
8 x 10BA Brass screws
8 x Brass axle bearings
2 x Etched frets for 2 bogies
2 x 4BA steel nuts
4 x No 16 split rivets
8 x 10BA Brass nuts
8 x Brass washers
4 x Resin side castings

Assembly

Solder centre stud 1 to part 2.

Solder parts 2 and 3 together and attach to underside of coach floor.
Make sure the half etch is on the underside of part 3.

Solder rubbing plate 4 to part 5.

Fold ends tabs of side frames 7 inwards and add a filet of solder.

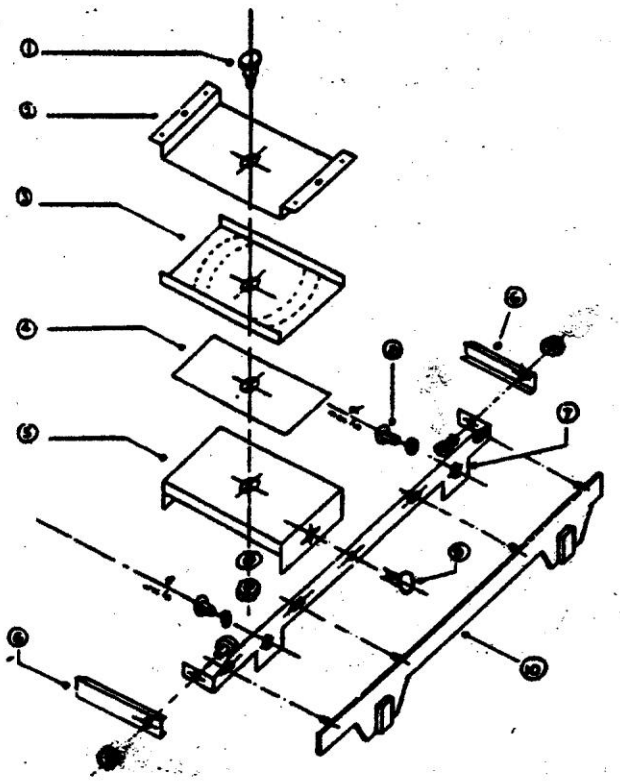
Solder brass axle bearings 8 to side frames 7. Note: Brass washers can be fitted to the axle bearings to reduce side play if required.

Attach side frames 7 to bolster 5 using rivets 9.

Fit the resin side overlays part 10 using 2-part epoxy or your preferred adhesive.

Fit wheel sets into bearings and secure end stretchers 6 with brass screws and nuts, you may prefer to solder the screws into the returns of the brass side frames. Do not over tighten the nuts, the bogie frame should flex slightly. When you are satisfied the bogie is free running, a touch of solder will secure the nut to the screw.

WAY H COACH BOGIES



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