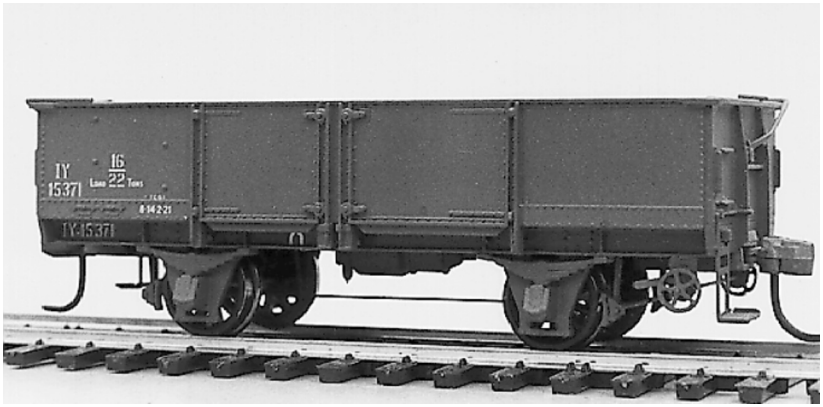
Steam Era Models
C/- P.O. Rhyll, Victoria, 3923.

VICTORIAN RAILWAYS IY' WAGON

Prototype Notes

The IY wagons were originally introduced to traffic as 20 tons capacity I wagons, featuring larger axle journals than the standard 16 tons capacity I wagon. Numbered 15220 to 15569 inclusive, they were placed on register from 1/10/1926 to 7/1/1927, but were recoded IY from 1929 and given a dual load rating of 16/22 tons. IY wagons were fitted with a wheel handbrake similar to that used on IZ wagons, instead of the lever handbrake fitted to 'standard' I wagons.



Model illustrated has been fitted with handbrake, shunter's steps and couplers (not included).

Assembly

It is recommended that this kit be assembled with a liquid solvent cement, such as MEK or Testor's. Whilst the assembly is quite straightforward, the following notes should be studied carefully as the sides and floor mouldings are 'handed' and must be assembled in their correct positions if an accurate model is to be produced.

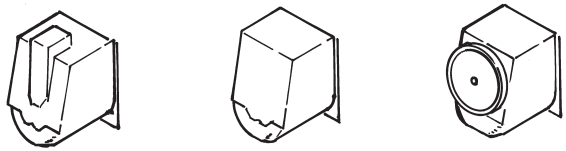
Carefully remove all pats from sprues as required. Use a knife or razor saw and do not attempt to snap parts off. Remove the moulded hooks from the backs of the side sills and brake shoes with flush cutting clippers. In all cases the 'fit' of parts should be checked before cementing.

To ensure a true and square assembly it is recommended that the 'draw' or taper moulded into the top edge of the side sills be removed as follows:

Glue a piece of 180 grit aluminium oxide sandpaper to a suitable flat surface, such as a piece of chipboard 100mm x 200mmm x 20mm thick. Use a piece of wood about 100mm x 40mm x 20mm with edges dressed square as a guide and clamp each side sill to the wood with fingers and thumbs. Rub the block and a side sill back and forth across the sandpaper until the top edge of each side sill is flat and square. It may be necessary to regulate the pressure of your fingers pressing down to remove the excess material evenly.

Four small discs have been moulded adjacent to one side sill. Whilst most IY wagons had axle boxes with flip top lids, in the 1950s some wagons were fitted with axle boxes that featured circular lids. To model a wagon with circular axle box lids, carefully file the detail off the surface of each axle box and cement a circular lid in place, as shown on figure 1.

Fig. 1



Before

After

Glue one side to an end to form an 'L' shaped subassembly. Note that the edge of the end should be approximately 0.15mm short of being flush with the sides as shown on figure 2. Glue the remaining side and end together to form a similar subassembly. After allowing some time for the cement to harden, glue the two subassemblies together to make an open box and check that the result is square.

Fig. 2

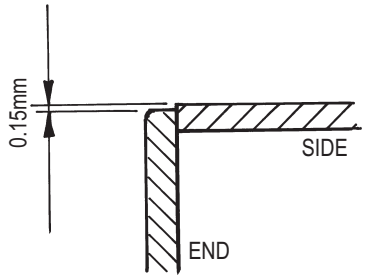
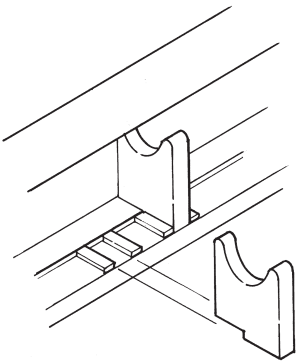


Fig. 3

Enlarge step on the bottom edge to clear flange of side sill



Check the fit of the floor within the box. It may be necessary to remove a small amount from each side using the sanding board and guide described previously. Do not glue the floor in place at this stage.

Place a delrin bearing into the hole in the back of each axle box and press the bearings into position using a pointed instrument, like a scriber. The delrin bearings are packaged with the wheels.

Cement the side sills to the floor, with the wheelsets sandwiched between. Check that the side sills and W irons stand up square to the floor, the axles are perpendicular to the wagon centre-line and that the wheels turn freely.

Cement the eight small gussets to the floor and side sills using the marks moulded on the floor as a guide. Refer to figure 3.

Make a support for the brake cylinder by cutting a piece approximately 20mm long from the runner adjacent to the brake shoes. Cement the support to the floor between the centre sills and then cement the brake cylinder on top of the support, as shown on figure 4.

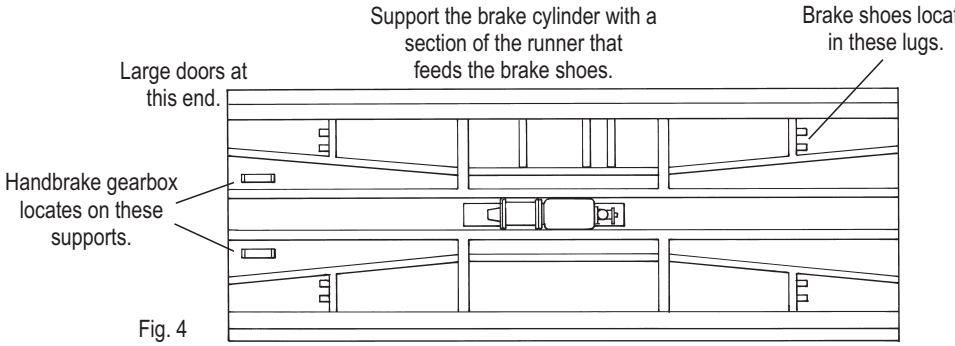


Fig. 4

Cement the underframe assembly into the box formed of sides and ends. Ensure that the underframe is positioned the correct way around so that the gussets line up with the stanchions between the doors.
Six brake shoe mouldings are provided, but only four are needed. Cement the brake shoes to the floor using the lugs moulded in place as a guide. Ensure that the brake shoes do not drag on the wheels.
The rope hitches are moulded as a separate item. Carefully remove the feed gate from behind each hitch and cement one to the web of each side sill, below the large door, as shown on figure 5.
Bend to template (figure 6) the wire provided to produce two ridge gear stanchions. Drill 0.7mm diameter or #69 above the bracket moulded on each wagon end and glue the stanchions in place, raised or lowered as desired.

Fig. 5

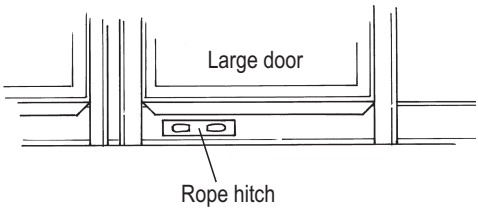


Fig. 6

The kit is designed to use Kadee No.5 or No.58 couplers. The draft gear box may be glued directly to the floor moulding after first removing the side lugs.
Shunter's steps and handbrake detail are available separately in brass etching kit E5. The central gearbox locates on the supports moulded adjacent to the coupler draft gear at the 'large door' end of the floor.

Painting and Decals

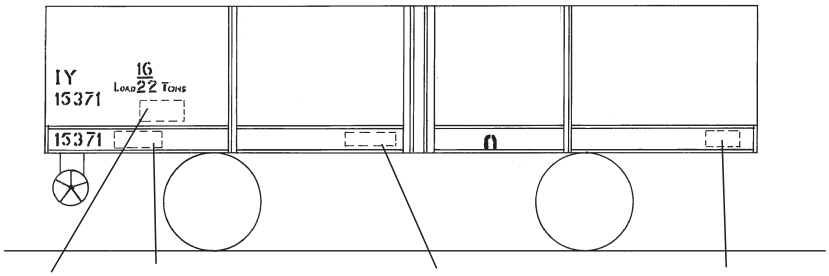
IY wagons were always painted VR wagon red/brown. We recommend Steam Era Models VR wagon red spraying enamel for the wagon exterior and underframe. The interior of the wagon should be painted a dark grey such as Humbrol 'Metalcote' to represent unpainted steel.

1926-1958 Style

Code & number 5"
Load & tare 2¼" & 2"

1958-1972 Style

Similar but transpose code/number with tare



T.C.Q.L.
9.4.0.0.

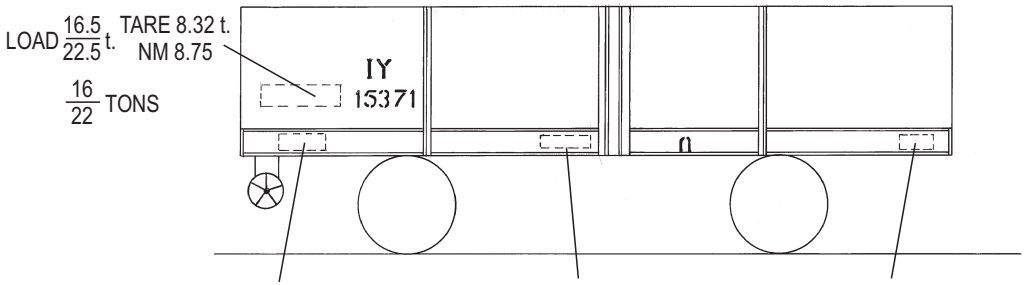
18" Black patch
oiled 4/6/58
WX 4/6/58

18" Black patch
PV 2-6-58 NM

12" Black patch
NML
6-58

1972 . . .

Code & number 7"
Load & tare 1½"



18" Black patch

18" Black patch
PV 3-72

12" Black patch
DW 3-75

To Apply Decals

Trim decals close to lettering to remove excess film.

Immerse in water for ten to fifteen seconds, then set aside on a tissue until decal straightens out.

Slide decal into position. If it is necessary to adjust the final position, use a small brush that has been dipped in water.

Use a tissue to soak up excess water.

The use of a decal setting agent such as a Solvaset is recommended to assist decals in snuggling down over rivets etc.

A flat finish such as DDV or estapol matt applied to the entire model will give a uniform dull finish.

NOTE: DECALS ADHERE BEST TO A GLOSS SURFACE.