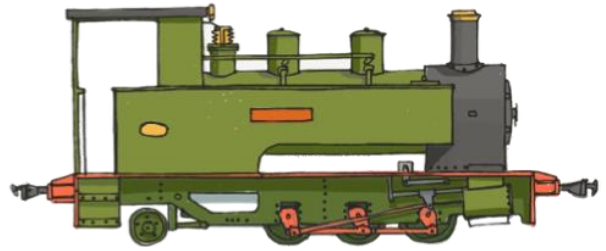


# Bowaters

## MODELS

specialising in distinctive 16mm models



### Bowaters Models – BMP Series Instructions



#### Requires

- IP Engineering Large Laser Cut Bogies
- Accucraft Chopper Couplings

#### Required Tools

- Fine Sandpaper/Emery paper or boards
- Small Files
- PVA Glue
- Super Glue
- Sharp Craft Knife

## Prototype Information

These vehicles were designed for operation on the 2ft gauge lines of South Africa. Originally, the passenger coaches were built for use on the Avontuur Line in the Eastern Cape. Originally they were all the same length and were later designated L4, some were extended by the then owner Cape Government Railways while others arrived already extended from the builders. The extended ones were designated L5. These coaches ran with suitable brake vans built at the same time which produced a very pleasing train to look at. All the coaches were built in both 1<sup>st</sup> and 3<sup>rd</sup> class configurations. These tended to remain on the Avontuur Line for their entire working lives with a number surviving with the modern day Apple Express operation. A number were sold off to other owners although only 2 of these sold off are known to survive with Sandstone Estates.

Later, a number of brake vans were built for use on the 2ft gauge lines. These were specially designed for the daily operations and saw use across the entire 2ft gauge network in both the Eastern Cape and Natal. The most common designs were the V5 and V16. Soon after introduction, the brake vans were seen in daily service and could be seen at the end of every goods train and every T&P working on the entire network. A number of these remain on what's left of the 2ft gauge network along with the three preserved operations at Sandstone, Paton's County Railway and the Apple Express.

## About the Kit

The kit is a wooden kit comprising of a set of laser cut wooden parts. On the Brake Vans and L5 Passenger coaches, 3D printing is used for the more complex shapes for ease of assembly.

## Chassis Fitting

This kit is designed for IP Engineering Large Laser Cut bogies. These are built as intended and are one of the last two items fitted to the models during assembly. However it is a good idea to build these early in the assembly process so they're ready to use at the appropriate time.

## Couplings

This kit is designed to make use of the Accucraft Chopper Couplings. These are mounted on the bottom of the chassis plate in the middle of the chassis.

## Instruction notes

With these instructions, there are images which show various stages of the construction of two coach kits. They are of the Prototypes for BMP-101 which isn't representative of the kit you have brought. They are for reference purposes only.

## Painting

Over time, these vehicles have seen mainly paint schemes.

### Passenger Coaches and V2 Brake Van

As built – Varnished Teak

1950s – SAR Imperial Brown

1960s-1970s – SAR Maroon and Grey

1980s – Apple Express Brunswick Green

1990s-Early 2000s – Apple Express Ivory and Brunswick Green

2010s – Apple Express/SAR Maroon and Grey

### Brake Vans

V5 As built - SAR Imperial Brown

V16 as Built – SAR Imperial Brown

V16 later operation – SAR Red Oxide

V16 Preservation – SAR Red Oxide

# Please Turn over

Please read through these instructions before beginning to assemble your  
kit





Now install the end chassis pieces. These sit off the end of the chassis piece between the two side sections.

**RESIDENTIAL**

Product	Rate	Term	APR
1st Choice	4.25%	Fixed to 30/31/27	4.25%
1st Choice	4.50%	Fixed to 15/21	4.50%
1st Choice	4.75%	Fixed to 30/24/24	4.75%
1st Choice	5.00%	Fixed to 30/24/24	5.00%
1st Choice	5.25%	Fixed to 30/24/24	5.25%
1st Choice	5.50%	Fixed to 30/24/24	5.50%
1st Choice	5.75%	Fixed to 30/24/24	5.75%
1st Choice	6.00%	Fixed to 30/24/24	6.00%
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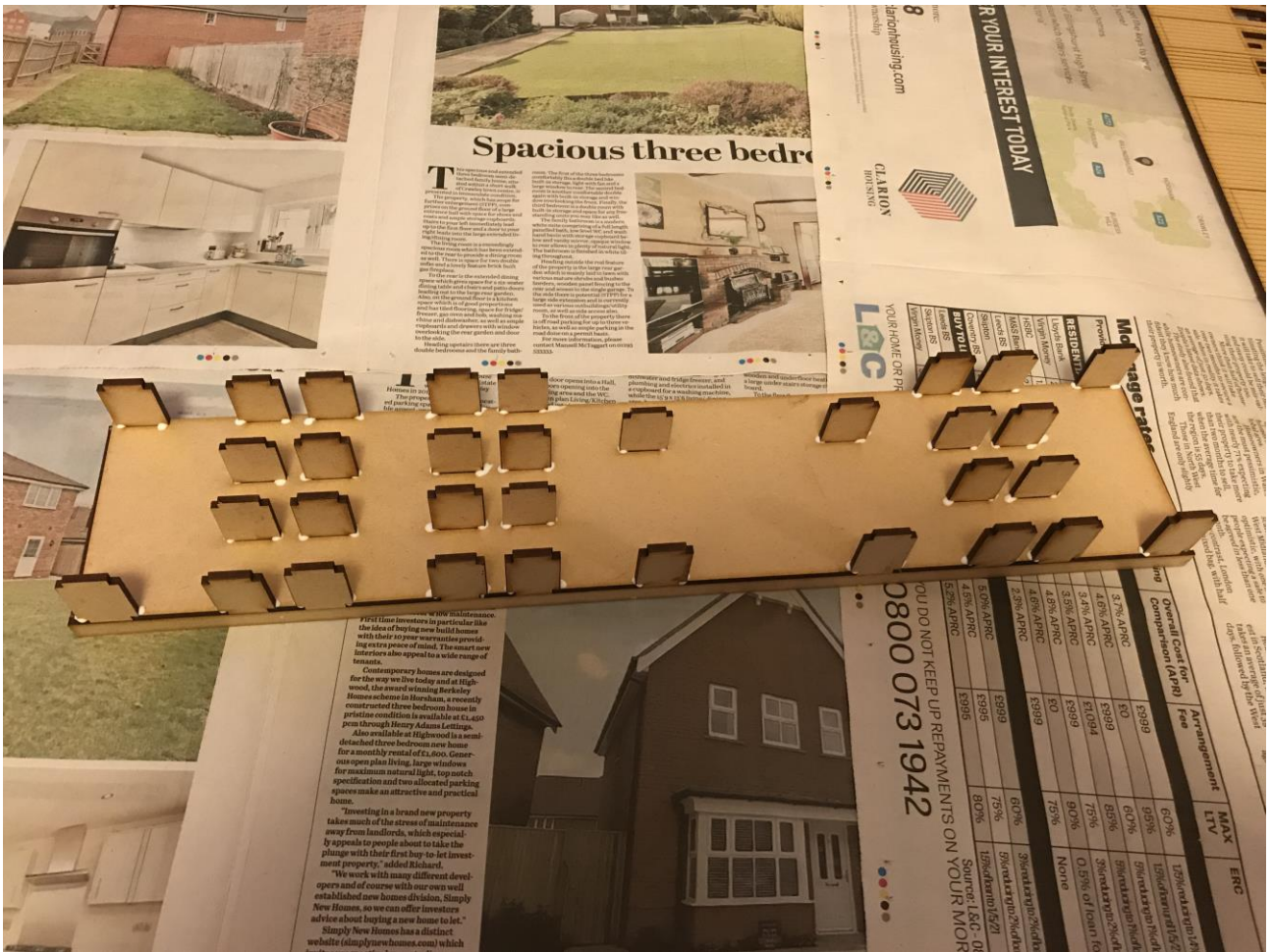
**BUY TO LET**

Product	Rate	Term	APR
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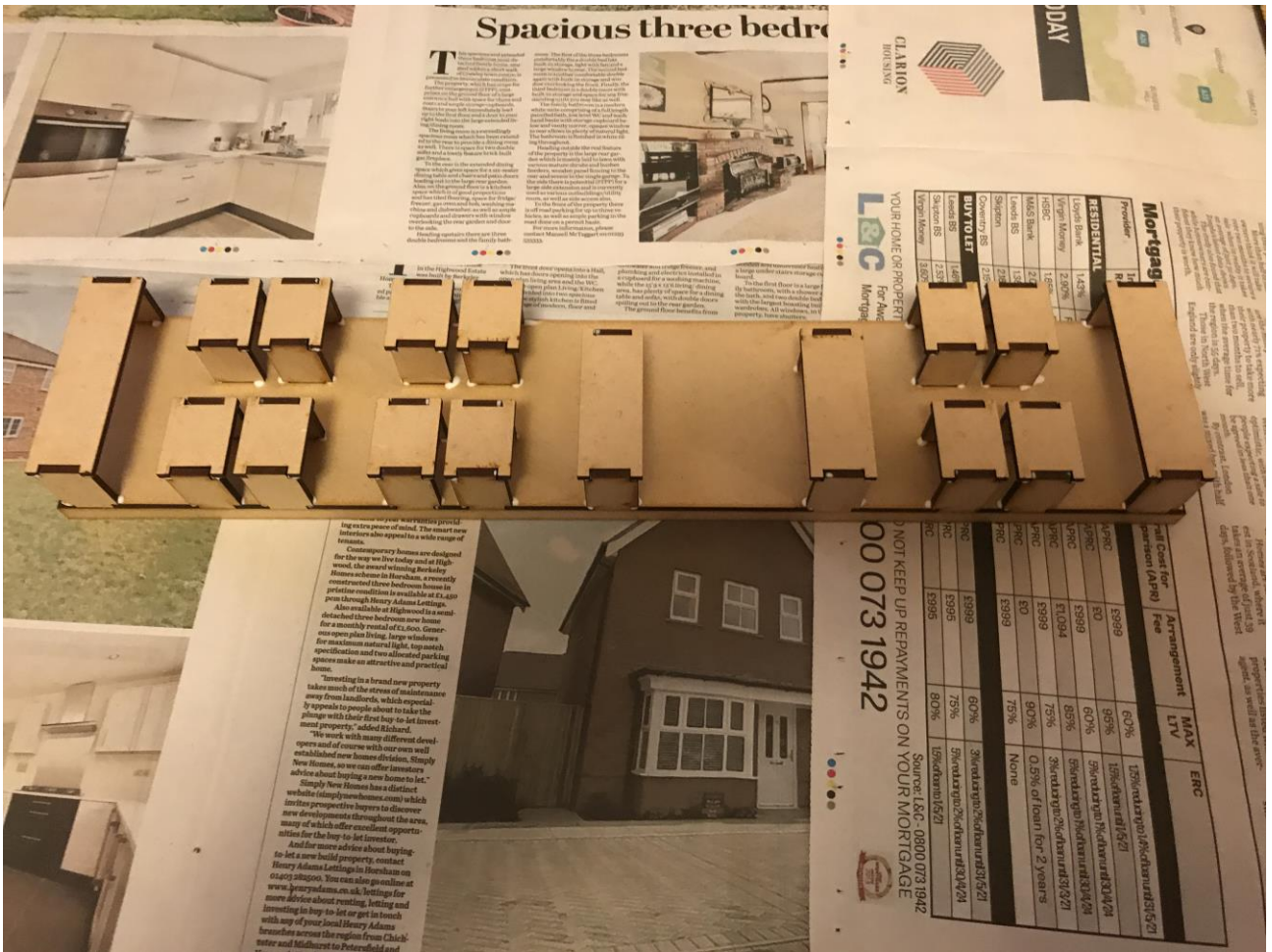
**KEEP UP REPAYMENTS ON YOUR MORTGAGE**

073 1942

Source: L&C - 0800 073 1942



Now its time to start the interior. Start by gluing the seat uprights into the slots in the chassis and around the edge.

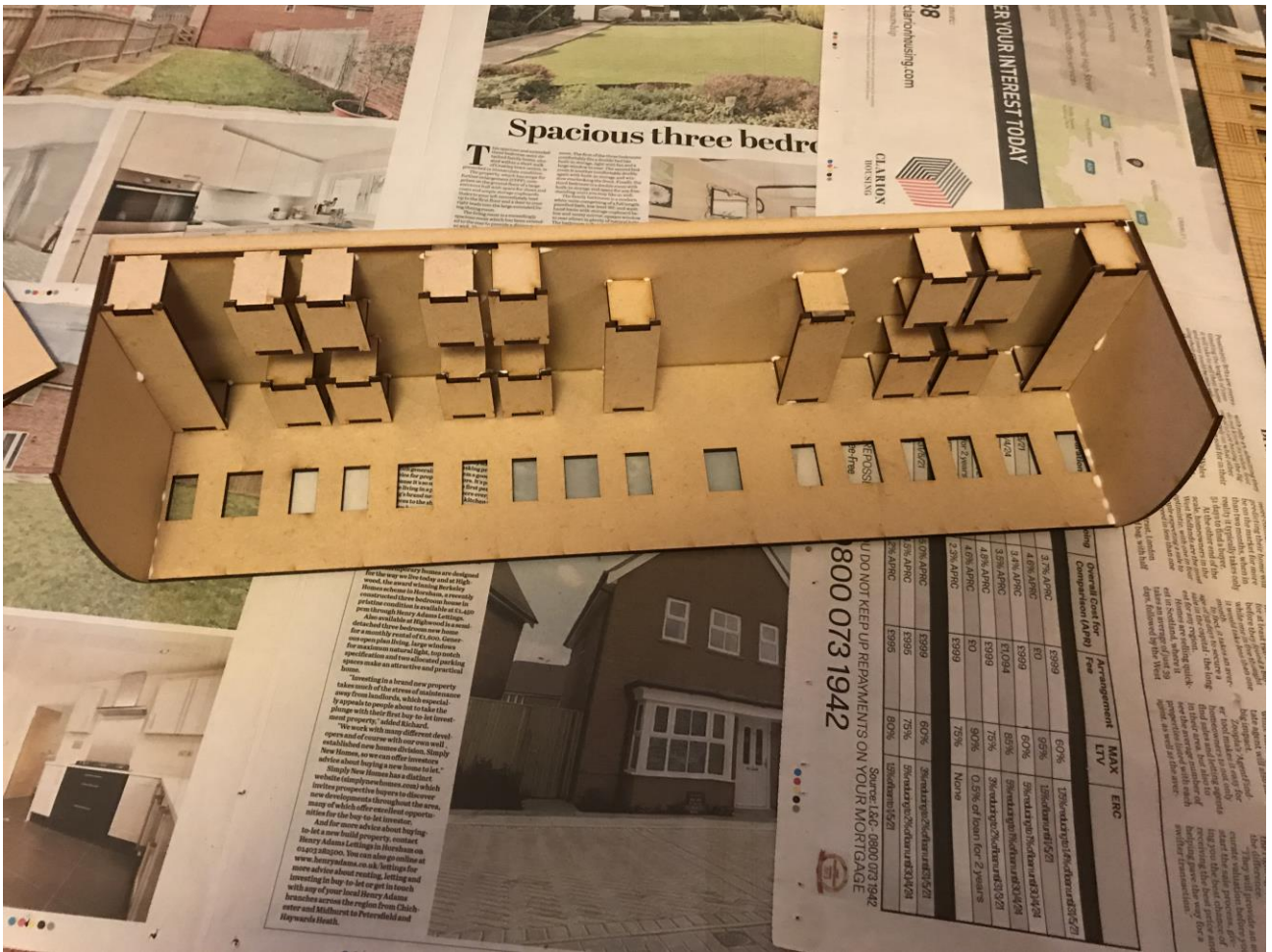


Now its time to attach the seat tops. There are 3 different sizes that fit into the appropriate widths between the uprights. We recommend using the interior partitions to ensure the gaps between the seats are the correct size. Don't glue these in if you do using them as a dry fit only.



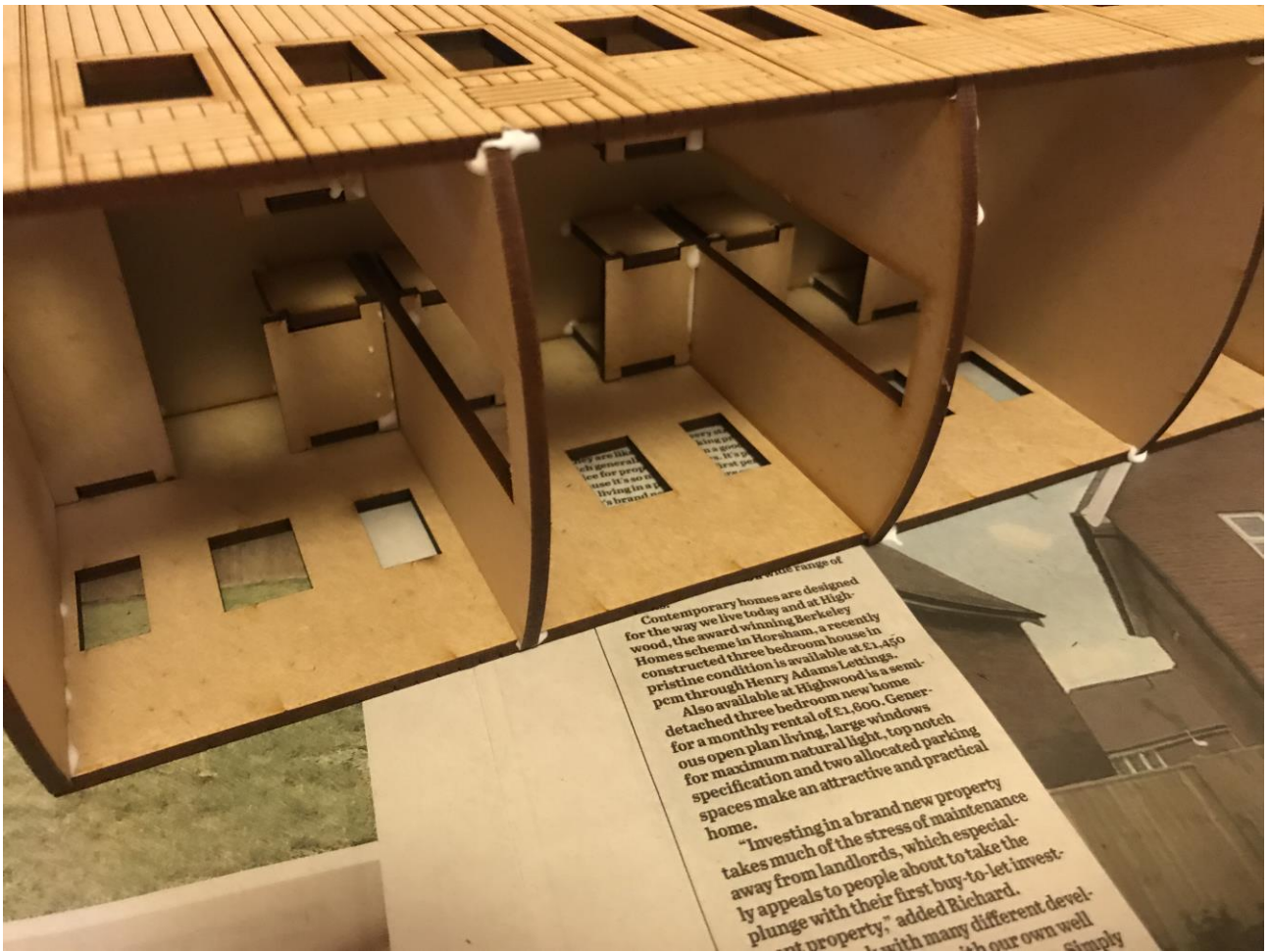
Now its time to build the body. The end pieces sit on the ledge now created from the chassis bracing and the end of the chassis. They also rest against the end seats to get a square fit.





Now its time for the sides. These sit below the notch in the top of the ends and the sides of the coach. There overlap the sides of the chassis and sit on top of them.





*Turn over for the second reference image.*



*Turn over to continue the build.*



*On the L5 and L4 Passenger coaches, the internal partitions mean you don't need any extra roof supports for the roof. For the V5 and V16, we recommend installing them at suitable intervals to ensure a strong roof.*



Now attach the roof. This is formed of separate roof strips to give a prototypical finish to the roof.



Now attach the footboards. These are long strips the same length as the roof abet wider. However, as we have done on our model, you could use spare roof strips for this if your line doesn't have the clearances needed to fit a full thickness footboard.



*With the roof and footboards now on, you can now install any 3D prints if appropriate. The L5 water shown above goes over the top of the single windows between the compartments as per the prototype. It sits in the middle of the coach.*

*Turn over for the Brake van installation locations.*





*On the V2 and L4 brake vans, the duckets are glued on the ends of the coach between the single door and the end of the vehicle.*



*On the V5 and V16, the brake ducket is glued approximately 3/5ths of the way up the model at the end of the coach. This is the end furthest from the double doors on the V16 and closest to the single door on the V5.*



*Time for the bogies to be installed. These sit approximately 2 inches from the end of each coach. These give a prototypical location and allow for maximum movement of the bogies on curves.*



*The Couplings are then glued onto the centre of the bufferbeams just below the end pieces.  
Alternatively, you can drill holes into the bufferbeam for them to be bolted in.*

*Apart from painting, this completes your model!*



We hope you enjoy your Bowaters Models kit! If you have any questions, don't hesitate to contact us on [info@bowatersmodels.co.uk](mailto:info@bowatersmodels.co.uk)

We thank you for your custom.