

POWERLINE UPDATE

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Update on Powerline Products and Production.

Stock.

We are on a regular basis getting requests from the modellers and collectors for Powerline products. These requests are by phone, fax and letter. The problem appears to be that shops have run out of supplies. Or more of a worry, tells the customer 'no longer available'.

We at Powerline Models Pty. Ltd. always refer the customer to their nearest hobby/train shop. The train/hobby shop is your local source of Powerline product.

To assist modellers and retailers we will in each UPDATE list some of the current stock that is available from Powerline Models Pty. Ltd. Customers should only order from Powerline Direct if unable to get supply from their local hobby/train shop.

Distribution of Powerline Products.

As advised in the January POWERLINE UPDATE, there are changes in the way we are getting to handle the distribution of our products.

It is felt there is a great need for more retailer back up, regular calls by Powerline sales representatives and a regular review of the Powerline product range.

But the biggest changes will occur with the change in Sales representatives in New South Wales. Distribution is already occurring for the whole of Australia from our Melbourne distribution centre. All stock that was held in Sydney will shortly be in Melbourne. Here is where one of the small holdups has occurred. Powerline had access to a new Mercedes Vito diesel van. Stock was in transit when the van, with less than 1400 kilometres, on the clock, broke down. Unfortunately Mercedes are still working on the problem, as this update is prepared.

This van was and is to form the basis of regular sales run from Melbourne to Brisbane and all towns on route. It will carry stock and it will also deliver pre-ordered goods to retailers. It will carry latest product samples and information to all our retailers to be kept up to date with developments. We trust Mercedes can find out what the problem is with the van because the first run was to have occurred during February with future runs being arranged every six weeks.

Exhibitions & Demonstrations.

Another use for the van will be to transport a new layout that is being built and which Powerline has a big interest in. It is a handy sized HO layout, simple to man and transport and will feature, where it can, Australian products and Australian prototype model railways and in particular products available from all hobby/train shops.

If any retailer or modeller is associated with a local train exhibition, we suggest you get in contact with us if you require a layout. (The new layout is one of several layouts of various sizes that are available.)

HOW TO SOLUTIONS.

We are also closely associated with a group that run "How to Solutions". They do demonstrations of making trees, laying ballast and doing small dioramas. Those lucky enough to have attended Liverpool or Brisbane Exhibitions last year will have been able to see "How to Solutions" in action.

However be warned. They are heavily booked on popular weekends. What organiser would not want an attraction that can hold 30-50 patrons spell bound for up to 45 mins at a time. The response of patrons to their demonstrations is excellent and many of them leave the demonstration clutching a tree that was made in front of their own eyes.

The LINK-LINE bottlebrush kit is the basis of one of their tree demonstrations. Local shops attending the exhibition need to stock up on this product to have it ready for the exhibition.

V/Line Passenger Corporation Coaches.

The new colour samples arrived from Hong Kong in the middle of January. The original samples that arrived late last year had a colour problem for the red & the blue. They came out light red/blue and just did not seem right.

After a lot of research, most at Spencer Street, new colours were selected. These proved to be about as close as we are going to get to the correct colours. The real problem is what is the correct colour? As most modellers realise, different batches of paint produce variations and after a coach has been in service for a time, the colour fades.

The contractor in Hong Kong also added the white lines that were missing in the original sample. We now await the final decoration sample (this has the logos and other decorations) and the coaches can go into production.

New Locomotive Wheels.

We have received in Australia, early in January, the new locomotive drive wheels that have been produced from the new die made to produce the insulated bushings. The wheels were put together with a new tool to ensure they are always assembled square and correctly.

The samples arrived early in January and checked for size and have been run in test locomotives. We had testing in Melbourne and Sydney. The new wheels have passed their running test and have been approved for production.

Together with the new traction tyres, we believe we should have solved all our problems with wobbly locomotives caused by the faulty tyres and incorrectly manufactured wheel sets. The real problem is it only takes one wheel set to make the whole locomotive wobbly.

This was the last item to be fixed before the 81 Class Locomotive could go back into production. Also the approval of the wheels was needed prior to the 48 Class going into production. It looks like a very busy production time come up.

Locomotive Speeds.

A lot of comment and debate has surrounded the SM/1 release of Powerline's big locomotives, 81-BL-G Classes. This debate has focussed purely on the mechanism, lighting and speed. All of which have been addressed in the up coming SM/2 mechanism except speed.

On Saturday 9th January 1999 Powerline Models attended the Warrnambool Model Railway Club's exhibition. Apart from the usual display Powerline also brought with it a Fleischmann Tachowagon that measures actual speed, average speed, distance and also features a stop watch and odometre, all in HO scale. This along with a single motored BL Class locomotive was made available for exhibitors to use.

Mr John Cracknell of Spiros Folley generously allowed the locomotive and tachowagon to operate on his layout. The train consist was the BL Class, a dozen plus wagons and the tachowagon following up the rear. The locomotive, wagons and tachowagon ran all day Saturday on Spiros Folley. The results recorded by the Fleischmann Tachowagon were a maximum speed of 110.9 Kph and an average of 93 Kph. All speeds are in HO scale speed as are all measurements taken by this fine piece of technology.

The results achieved by the BL Class, max speed 110.9 Kph and average of 93 Kph, were compared to those achieved by the prototype and jokingly it was revealed that the model outperformed the real thing. This was using a single motored SM/1 mechanism with one modification, the lights bypassed. Further testing will be carried out at future exhibitions to give more references for comparison and to allow individuals to witness for themselves the results. So watch out for a Powerline locomotive and Tachowagon at an exhibition near you.

Revised Power Unit. SM/2 Update.

The SM/2 mechanism is the up grade to the SM/1 and features 2 voltage regulators and 2 diodes replacing a bank of diodes. This allows the motors and lights to run independently so that the motors get full voltage, instead of losing between 1.8 and 2.4 volts. Combined with improved light guides, new traction tyres reworked wheels and an improved means of wiring. The results to be achieved are brighter lights and better locomotive operation.

The PCB P1290-1

This Printed Circuit Board is the first PCB to be utilised by Powerline and the first by an Australian Model Train manufacturer. This PCB is used in the SM/1 mechanism to provide and control power to one or two motors, provide power to the lights and make the lighting constant and directional, and lastly to make the mechanism DCC compatible and easily converted.

This PCB uses diodes to make the lights directional and a low voltage lighting system to make lighting constant. All power goes to the PCB and all power to the motor(s) and lights come from it. With this system everything appeared to be fine until we received our first production run when it became apparent that this system had its limitations. It is important to note here that the mechanism was designed to run at scale speeds and not the super break neck speeds of other models/toys.

The limitations of this PCB is that it robs the system of about 1.8 to 2.4 volts due to loss of voltage through the diode bank. The result is that the motor(s) do not get full voltage and the lights relying on the motors to draw power are dim. When applying load to the mechanism you will note that the lights get brighter. The end finding is that the locomotive appears slow and the lights appear dim.

For those who want more speed out of their locomotive and are not concerned about the lighting the solution is a simple one. Remove the body of the locomotive from the mechanism/chassis by removing the two screws underneath the locomotive and carefully slide the body off. Once removed you will now see the PCB which sits across the top of the mechanism. Now using a soldering iron you carefully solder two sections of the PCB using a piece of rod, wire or solder. The first is at the single motor end of the locomotive from 1T to 1P.U (top motor wire to pick up wire). The second at the other end of the PCB or the second motor end of the locomotive is 2T to 2P.U (top motor wire to pick up wire) or in simple terms the opposite to the first soldering application. This technique gives full voltage to the motors but cuts out the lights. (rough drawing 1B)

For those wishing to by pass the PCB totally the technique is simple. On a single motor locomotive you solder the white wire next to the motor to the top motor contact or wiring point. Then you attach the pick up wire from the non motored end and solder this to the bottom motor contact or wiring point. For those with dual motored locomotives you solder the white wire at each end to the top motor contact or wiring point at that end. The next job requires two pieces of wire 11-12 cm in length. Selecting one end, say the left, solder one wire to the top motor contact or wiring point and then solder it to the bottom motor contact or wiring point of the right motor, the opposite or other motor. With the second wire you do the opposite. Solder the second wire to the top motor contact or wiring point of the other motor, the right one, and solder the wire to the bottom motor contact or wiring point of the opposite motor, the left one.

For those who want lighting and full power to the motor(s) Powerline has developed a new PCB which should be available late in 1999 with the next release of locomotives. The new mechanism featuring this new PCB is the SM/2 mechanism. More about this is available elsewhere.

Wire breakages

A low percentage of the 1998 release of Gs, BLs and 81s were found to break there soldering joints at the motor wire contact. This was found to be caused by bad heavy soldering causing a rigid weak point, a captive wire(captive between body and weights etc) or the wire being a bit too fine. The solution is a heavier grade of wire and a modification to take flex and strain away from the soldering joint.

To start the modification the body must be removed by first unscrewing the retaining screws from underneath and carefully sliding the body off the mechanism. Next the coupler on the power bogie(s) must be removed by unscrewing it from the bogie(s). Next the three wires, two motor wires and one contact wire, must be removed from the PCB. This is done by melting each joint individually and pulling that wire free. Once this is done to all three wires you then unscrew the bogie retaining screw which is located above the bogie on the PCB. Once the bogie is free you desolder each motor contact/ wiring point and remove the wire. Be careful not to melt the motor retainer or the white wire.

The modification to remove strain is as simple as drilling two 1.5mm holes in the motor retaining clip. Looking from the rear the left hand hole is drilled roughly centre or in line with the shaft at the rear of the motor. The hole on the right is drilled high, level with the top motor contact or wiring point. The heavier wire is fed through these hole and soldered to their respective motor contact or wiring point. When the wires come out the holes they must go down, level with the bottom of the motor, and then up and soldered into the PCB. This removes most strain from the wire by giving a larger flexing area.

The wire used is available from most hobby stores and is in the LINK-LINE range of wires available from Powerline Models.

48 Class Locomotives.

The decoration drawings for the Austrac locomotives have been sent to our contractors in Hong Kong for preparation of the painting of the locomotives.

These decoration drawings are rather complicated. For the first time we have sent these specifications on disk. Our R&D section is advancing rapidly into CAD drawings and setting up our latest drawings by computer.

Fortunately our contractors have a computer expert who is able to use these disks. The march of modern progress.

But Murphy's law always has a hand in these matters. They use a different brand of computer and different software. Nothing goes smoothly.

Fortunately our R&D staff are sharp enough to see what happened and came up with a solution, in Australia, to assist the contractors computer staff. We will be instructing them concerning computerisation and what programs to use.

The end result of all this is a delay of 3 weeks. Unfortunately unavoidable, but once all parties can talk to each other by computers and know their capacity, the faster we all can work and get things done.

Another small problem, we had to send the most complicated decoration drawings up first. The Freight Corp. Blue 48 class or even the 830 green decoration would have been much simpler and perhaps easier to sort out.

Once the decoration drawings have been transferred and copied into masks and stencils, production of the 48 Class Austrac can proceed. It will of course be built with the new modifications to the chassis, lights and motor. Plus extra details.

Cork & Tools.

Powerline through the brand name LINK-LINE produces and markets a range of tools & accessories for modellers.

This range includes cork underlay. This has been in short supply for some time, but we are assured that the Powerline Production Centre will be producing adequate supplies in the near future. The cork is packaged for HO & N layouts.

Tools are always available and the range from pliers, to soldering aid and wires. Wires come in many colours, push buttons with different colour tops, plus miniature switches. All the items are of great use to modellers. Full details were published in January POWERLINE UPDATE.

RP25 Axle Sets.

Part of the upgrade of Powerline products was to produce a RP25 style wheel set to fit our locomotives.

The axle sets were to be change over for existing wheel sets. The object was to give the modeller the best possible standard wheels. We were to have produced them in bright and blackened sets.

There has been a big delay in the production of these RP25 wheel sets. The contractors who produce the wheels made an unacceptable product in 1997. So much so that the complete production run was returned to them.

Our R&D division has spent months trying to explain to the contractor what the wheel should be and how it has to be made.

In the last week of January a new sample batch came to Australia. We are pleased to advise that with all the checking we can do to them, our R&D people have passed the new samples for production. With this the wheels should go into immediate production.

Supplies should be available in late March 1999. The wheel sets will be marketed in packets of 6 axles. Change over is as per instruction sheets that come with your locomotives.

Other Production Updates.

There is always a small problem when dealing with Hong Kong & China. The Chinese New Year. This causes a complete shut down of factories and offices. This year it is from 10th. February to 26th. February.

Everything is pre New Year break or after.

We have in process the reworking of the 81/BL/G class locomotives. The planned sequence of production is the 81 class, followed by the BL then the G class.

The start of the scheduled reworks of the 81 class, if everything goes right, is March 1. This means shipping by the end of March, on the market in Australia some time in May.

As soon as the 81 Class has been made, then the BL & G classes will go into production. Goods available in Australia June/ July.

These re-runs will be with the new wheels, PC boards, new wiring set up and vastly improved light guides.

Spare Parts.

Listed on page three is the spare parts we have in stock. We are running short of parts for the earlier motor unit for 81/G class locomotives. It is many years since they were run and parts do not last forever.

But with the 48 class we do have some parts. The replacement motor for the 48 class . We are now using the new motor. With existing 48 class mechanisms there is a need for some minor alteration to fit these excellent motors. The new mechanism has been altered to fit the new motors.

Commonwealth bogies are out of stock but they are currently in the process of being rerun and supplies should be available in March/April. They will come in the same sea shipment as the V/Line Passenger Corp. Coaches.

New Coupler.

As this Update goes to press, the new couplers are being made at Dandenong. It is expected that they will be available in mid February.

These couplers are the standard Powerline coupler but the shank has been made to fit a #5 box. This means that Powerline locomotives & rolling stock can be easily coupled up to various American rolling stock or any rolling stock that has a #5 box.

