Sydney Live Steam Locomotive Society

Anthony Road, West Ryde, N.S.W.

'Newsletter'

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Warwick Allison's 3½ inch gauge B2 locomotive 1671, complete with Royal Train marker lights. This locomotive, a Clarkson design, was built by Bill Harris, in Wales in the 1960s and 1970s. From 1919 to 1964 Bill worked for the Great Western Railway then British Railways. The loco, which appears to have never run, was bought to Australia by his son and then acquired by Warwick who has restored it. It has a good turn of speed, as befits the original! The fresh coat of Apple Green is striking! It is seen here following its first successful run. The work included Viton O rings on the pistons, revamped axle pumps, repaired lubricator and some valve gear adjustments as well as a repaint and period transfers.

May Running Day.

The weather for our last autumn running day for 2014 could not have been better. The sky was blue and the sun while getting lower in the sky was warm and there were no cold winds. Barry M was hard at work with the blower clearing the running areas of the many autumn leaves that had fallen since our gardening day the previous week end. Vic along with John and Arthur worked on the setting up as well. At morning tea time Warwick put on a show of photos from the recent convention and these were enjoyed for the rest of the day. We welcomed back Peter and Margo from their overseas adventure and Peter was back on duty as ticket seller. Martin Y was our gate keeper with Gai assisting for much of the afternoon

Ross had 0-6-2 Fowler "Toneya" hauling the green set on the inner with Ian Tomlinson as guard. The locomotive ran well despite a couple of minor, un-explained derailments. The second train on this track was hauled by Warwick with WAGR V1224 2-8-2. This train ran well all the afternoon. Steve Border started off as guard and was later called up to the signal box. Tony E took over this position and Jim M looked after the last few laps to finish the day. Assisting on the inner station were David T, Jim M and Arthur.

On the outer main Mick had the shay running well on one of the carriage sets. The locomotive was well into its stride lifting the train up the grade seemingly without any effort. Running past the shay as I came down the elevated the whirring powerful sound was very impressive. There was one incident during the afternoon caused by the failure of one of the bogie bolsters, going off with quite a bang! That carriage was removed from the consist and the train with remaining cars carried on without further trouble. Geoff Olsen was guard for this train.

The second train on the outer had Lionel's TGR R class 4-6-2 running as train engine assisted by Neil Mackellar

May Running Day Scenes
Above: Roger Jones (centre) with Ros and Andy Probyn from Maxitrak, on their visit to SLSLS.
Right: Garry Buttel and the B1 leads John Hurst and Nigel Gresley with Joe as guard.
Below: One of the party groups with a fancy train of their own!

with the B&O 0-6-0 switcher. The R class was driven by Max with assistance from Mark G. Lionel rode as guard and he was relieved by Max and Mark, when they were not driving. Peter D was station master assisted by the guards.

Ray Lee had his VR A2 in steam in the GL loco depot for a steam test and remained there for the afternoon. John T had the D55 but problems with the blower kept it from running.

We had a green locomotive pairing on the elevated with Garry and his B1 "Impala"4-6-0 running as pilot engine with John H's 2-8-0 "Nigel Gresley" as train engine on a six car set. They ran well for the afternoon and looked very attractive. Joe rode as guard on this train. Early in the afternoon I ran Z1915 with one car. The 19 ran well and at times was loaded to capacity. At about 3.00pm Paul had the Hunslet in steam and came on to the track with two cars to run till the end of the day. At this time I stowed my passenger car and returned to the elevated locomotive depot, dropped the fire and prepared the locomotive for packing up. After being the tea man for the elevated railway staff I helped on the station. Martin Dewhurst helped out on the elevated station after a stint in the signal box and was seen relieving Joe as guard on the six car train. Nick, with his friend David, Arthur, Luca and David T. Nick had a fair spell as guard on Paul's train and I had the last few laps as guard.

David T was track superintendant and noted that he had a number of unusual requests, even, signal box refresh-

ments. The signal box crew were Barry M and Martin D to start with. Steve Border took Martin's place early afternoon. The kiosk was well looked after by Elizabeth, Diane, Joy, Margo and Gai. Emily was there and fortunately had no injuries to attend to.

We had Roger Jones bring Andy Probyn and his wife, Ros, (from Maxitrak UK) for a look at our set up. They spent quite a time in the signal box and seemed to enjoy their time at our grounds.

At the end of the day we had given 2768 rides. This is about 600 above the May average. It was certainly a busy day and we had just enough of us to run everything. The party groups certainly go to extreme lengths at times; one party group today had a table with a train on a viaduct.

June Running Day.

For our Winter solstice running day the weather could have hardly being better. Vic had opened up very early as his time was limited and got well into setting things up when Barry M and Arthur arrived. They were followed by Graeme and Gai. Graeme was soon busy with the blower clearing the running areas of leaves. I did my usual walk around the elevated track checking for any foreign matter on the rails and trimming any vegetation within reach of our passengers removing the temptation for little hands. On the elevated now we have to remember to put out the three hoses for the watering facilities at the lever frame, two for the main line and one for the loop.

June running day saw Graeme Kirkby and the H class leading John Tulloch and the J class on 4 elevated cars with Gai as guard.

With good weather we expected a large crowd and today this was just the case. We gave 2980 rides for the afternoon well above average for a June running day. There were quite a few party groups a number of which had arranged to get set up before lunch time. With one group the mum was dressed as Wonder Woman to match her Superman son! Bernie was on the gate and had a very busy time for quite a long time after opening time.

Ross was first out on the track before lunch with Fowler "Toneya" 0-6-2 carrying out some driver training with Audrey, running on the inner main. After lunch Ross coupled the Fowler up to the Pullman set and ran this train very well till the end of the day with Tony E as guard. The other train on the inner was the WAGR V1224 with Warwick on the foot plate. Later in the afternoon David T took over the driving of the V, guards on the train were Greg and Peter D. Sue acted as station master assisted by Neal from time to time.

The outer main had Mick running the Shay on the central west set. The Shay ran well all afternoon having no trouble with whatever load it had. It certainly sounds excellent as it powers up the long grade to the outer station. Martin Y was the guard on this train. The second train had Lionel's TGR R class 4-6-2 running as train engine with Neil Mackellar driving the 0-6-0 switcher as pilot. Ian Tomlinson was guard for the afternoon while the station was attended to by Rob Murphy, Lionel and Peter D.

Running on the elevated it was really good to have Arthur back driving the heritage Mikado 2-8-2 with John H and 2-8-0 "Nigel Gresley" on a six car train. This was Arthur's first day back driving since his shoulder operation earlier in the year; I think he was very happy to have reached this stage of his recovery. This train ran reliably all afternoon, some of the loadings were quite heavy, as often now, we seem to have more adults passengers than children. I ran 0-6-0 Z1915 on one car taking passengers till about 3.00pm by which time Paul was running with Hunslet 0-4-0 on a two car train. We

Neil Mackellar and the switcher leads Max and the R class on the outer main while Ross and Toneya load up in the inner main platform on the June running day.

June running day and David Thomas on V1224 pulls up the grade. Greg Croudace is guard.

were treated to a special sight late in the afternoon with the combination of John T and the 2-8-0 J class running train engine and Graeme Kirkby driving his recently acquired 4-4-0 NSWGR H class. This locomotive was one of a batch of I think three locomotives built by Arthur Mears many years ago and had been owned by Carol Leggett. The two locomotives hauled a four car train, Carol Leggett was one of the passengers and Lionel and later Gai were seen as guard. We are able to run NSW railway locomotive combinations on our track that most likely never occurred in real life. Joe was guard on the six car train and Luca operated the lever frame and looked after the station. After taking the Z19 off I ran a tea service for the elevated staff.

In the signal box Barry M and Martin D kept the trains running with Warwick filling in for Martin for a time. The kiosk had Elizabeth, Margo, Joy and Gai with Rosemary Webb giving some assistance. Emily was on hand for first aid but fortunately her skills were not required. Neal Bates was our track superintendant for the day. Some of the points were a bit slow operating due to the sticky oiled blades being affected by the cold weather. Once the blades had some work they moved more freely. Peter W was ticket seller with Alan Mackellar assisting in the background. It was nice to see Carol Leggett, she had come to see the H class in steam and running. It was a big day and with all present making a good effort to help keep everything running efficiently.

July Running Day.

Our mid winter running day, and, what a cold day it turned out to be. The forecast had been a little optimistic but the cloud had very few breaks and the cold wind kept up all afternoon. There was the odd hint of rain at times but we were lucky that that was all it was. Late in the afternoon the sun did shine out through a break in the clouds but it was very weak and did nothing to warm things. I was on the gate and I cannot recall ever wearing four layers of clothing with a fifth on hand in the event of rain!

Setting up was carried out by Barry M, Vic, John and Arthur H, Mark G, Graeme K and myself. As others arrived and locomotives were unloaded the grounds were a hive of activity. Mark and Vic attended to all the points with a clean and oil before running began. Barry M was very busy with the blower clearing the leaves and grass trimmings from the tracks. We welcomed Barry Potter and his friends Roger Kershaw, Greg and Les Bird from the Orange Society. While we were feeling the cold, for them, it was somewhat mild as their maximum temperature the day before was 4 degrees. They had with them three locomotives, Barry's D55, Roger's C34 and the Z27 from the Bird depot.

Ross had a steam test for his D5148 and then a few laps trial before lunch. Despite the cold weather we still had a good crowd. The initial rush took about twenty minutes to clear and after that there was a steady stream of visitors till late in the afternoon.

Running on the outer main we had C3901 "The Green Machine" with Jim and Dom Mulholland taking turns at the regulator. The C39 was assisted by Neil Mackellar and the 0-6-0 switcher. Neil took the loco off for a time to make some adjustments and then returned to the track. The C39 managed its loads on its own for this short time but was happy to have the 0-6-0 back as pilot engine. Carol Leggett was guard on this train for the afternoon. The second train on the outer was run by the Central West drivers hauling the Central West set of cars. Barry Potter ran his D55 as train engine and Roger Kershaw had his C34 in the lead. Greg Bird assisted with the driving and Geoff Olsen was guard for the afternoon. Paul B, Martin Y, Greg C and Peter D assisted on the outer station during the afternoon.

On the inner track Warwick's WAGR V1224 was coupled to the Pullman set of cars. Andrew drove this train for the first part of the afternoon. Bernie was guard and when Warwick took over the driving Andrew replaced Bernie on the guards van. The V had a leaking clack valve dribbling water down the boiler casing, then down the sand pipe to land on the rail just ahead of the driving

Ray and 3112 leads Graeme and 2401 while in the background Greg Bird and Roger Kershaw's 34 class leads Barry Potter's K class in the outer main station.

wheels. This was not very helpful! The second train on the inner was double headed with Graeme and 2401 4-6-2 as train engine and Ray with C3112 4-6-4 tank engine running pilot. Tony E was guard on the train and Ian Tomlinson was on duty as station master.

On the elevated John and Arthur were double heading on a seven car train with 2-8-0 "Nigel Gresley" and the heritage Mikado 2-8-2. Early in the running time I noticed the 2-8-2 running on the train on its own with a reduced loading. Later the Gresley was back at the head of the train and the pair ran till the end of the day. John had started out to trial some of the new coal and found that while it burnt well it did not seem to provide sufficient heat to maintain the level of steam required. After getting the fire burning better with our traditional char the fire arch was dislodged limiting the proper fire box performance. This required John to drop the fire, relocate the arch and start the fire again from scratch, with at least, a hot boiler and some steam pressure. With all back in place, the fire built up and the loco steaming as well as it usually does John rejoined the train running well till the end of the afternoon.

The second train on the elevated was hauled by Garry B with the LNER B1 "Impala" 4-6-0 running train engine with Les Bird and Z2708 2-6-0 as pilot. An unlikely prototype pairing but it was fine on our track. They performed well all afternoon. Joe, Luca, Simon and David T assisted with the elevated running acting as guards or attending to the station.

Neal and Jo arrived back from a holiday in Tasmania early morning and came straight to the grounds not to miss the running day. Jo looked after the ticket sales for the afternoon after some tuition from Warwick. Warwick realised that this task is one of the busiest jobs of the afternoon.

Track Superintendent was Steve Border with Mick also in attendance. Overall the day went fairly smoothly, even though very busy. In the signal box we had Martin D and Barry M attending efficiently to the working of points and signals. Ross obtained some experience of the operation while Emily had no business!

President Warwick and birthday party guests!

Signalman Barry Millner in control of the inner main view the action from the Signal Box on the July Running Day.

Diary.

August 30, 31	AALS Interclub and Small Gauge weekend at SLSLS.
September 2	Directors Meeting.
September 20	Public Running Day
October 7	Members Meeting
October 12	(Sunday) Family Day
October 18	Public Running Day
November 4	Directors Meeting
November 15	Public Running Day and next newsletter
December 2	Members Meeting
December 6	Members Christmas Party (evening) BYO everything, including food family and friends.

NB Check AME for a full listing of events

In the kiosk we had Liz, Di Joy, Gai and Kim looking after the refreshments for us and our visitors and doing a good trade.

The flags were flown at half mast in respect of the recent airline disaster over Ukraine.

Overall we did 2407 rides which were slightly above a July average and very good considering the conditions. This month our 12 month injury rate dropped to zero!

Attending to the gate can be interesting. We were thinking that the cold weather may keep people away but I have never seen people so rugged up for the day. One fellow told me that this was his first return visit in sixty years! Overall it is very nice to hear the compliments as the different groups leave at the end of the afternoon having had an enjoyable time.

President's Birthday.

This was held at the grounds on the Sunday after the July running day. There was a big group of Allison family and friends and a large number of members present. Warwick and Andrew steamed the CC tank and the V1224 and Garry brought the B1 and Graeme the H. The V was coupled to a mixed train of a couple of GL cars and a suitable collection of Warwick's goods wagons. There were various drivers looking after these locomotives as well as members assisting with the BBQ. Happy birthday Warwick!

Roger Kershaw's 3403 from Orange is passed by Ray Lee and 3112 while the flags fly at half mast in respect of the Ukraine air disaster on the July running day.

Council School Holiday Guided Walk

On the 1 July (Tuesday) we hosted a guided tour of Darvall Park organised by council's bushcare coordinator. There were 2 tours each of 30 people and we provided some train rides from 11.15am to 11.45am for the first group, and from 12.30pm to 1pm for the second group. On the outer we had Arthur's heritage 2-8-2 on 3 cars being led by Warwick with CC 411. We ran well despite some slipping with the big engine. On the inner Zac Lee and the B10 led Simon's Simplex also on 3 cars. They did well to do what they did although some manual assistance was required when they stopped in difficult locations. On the elevated Jim and Dom Mulholland ran Pansy back and forth, so as not to remove the entrance bridge used by the group. It was a lovely day.

Many thanks to everyone else who assisted including Martin D in the Signal Box, Peter Wagner, Ian Tomlinson as guard, and also to David Archibald and Alan Mackellar. The first group walked down through the remnant blue gum forest to the north of our grounds and then enjoyed a train ride. The second group started with the train ride and then headed north across Park Avenue to follow Darvall Creek.

Arthur attending to the heritage 2-8-2 on the July running day.

Presidents Breakfast

After several days of rain we had a great weather day! About 25 members, family and friends had a sumptuous feed of sausages, bacon, onions, and tomatoes complete with a crusty bread roll. There was a good crew of cooks on hand and plenty of helpers and a lot of talk too. There was even a washing up crew that had started work before breakfast was served, very efficient! It was great to have no mess left over at the end!

Five locos attended with Andrew and Warwick trying out the B2 again on the elevated. While it ran well neither the injector nor the axle pump were functioning so an extended run on the hand pump was made. It steamed wonderfully and went like a rocket!

Ian Tomlinson & grandson had the 4-4-0 Maid of Kent running on the outer main, which they shared with Graeme Kirkby and his H class, running for the first time at the club after David did the boiler honours. Graeme had a short string of 4 wheelers to make an interesting train.

Andrew gave Vic's Rocket a boiler test, while Nick had the Maisie in steam for just about all the day. He must have done some fast running because Warwick remarked he was always behind him!

Graham Tindale brought along a Willesco steam traction engine to amuse the attended.

After the breakfast crowd had departed some work also took place. The guards vans and recovered cars were reassembled with their guard's seats, extinguishers, vacuum gauges, and tail lights and then marshalled to the correct train positions all ready for running day. Thanks to Andrew, Nick and Peter who assisted Warwick.

Annual General Meeting

At the AGM Mark Gibbons retired as a Director. Thanks to Mark for his passion and assistance as a Director - it is greatly appreciated. As the number of nominations equalled the number of positions the following were declared elected:

President: Warwick Allison
Vice President: Mick Murray
Secretary: Simon Collier
Treasurer: John Hurst
Directors: David Thomas, Ross Bishop and Neal Bates.

Congratulations to Ross and Neal on their appointment to the Board.

At the meeting that followed Zac Lee was elected a member of the Society, congratulations Zac! It was also agreed to fence the ground frame, and to move our September members day to Sunday 12 October.

Duty Roster..

Sept.	D.Thomas, B.Courtenay, N.Bates, G.Croudace, S.Larkin, D.Lee, L.Pascoe, S.Sorensen.
October:	J.Hurst, J.Leishman, J.Lyons, D.Mulholland, J.Mulholland, M.Yule, R.Bishop.
November:	A.Hurst, T.Eyre, P.Brotchie, G.Buttel, S.Collier, B.Millner, V.Scicluna, G.Tindale.
December:	D.Thomas, B.Courtenay, N.Bates, G.Croudace, S.Larkin, D.Lee, L.Pascoe, S.Sorensen.

Gate Roster.

September: Rob Murphy October: Scott Murray November: Mick Murray December: John Noller.

Works Reports

Grounds.

Some of the early morning workers have been outnumbered by ducks and sulphur crested cockatoos.

A list of maintenance jobs has been provided on the blue board in the club house for anyone interested in something to do. This has come from the annual inspecting engineers report. David T will be arranging some people to trim our trees of dead wood and provide us with mulch! John H has arranged to purchase a chain saw for elevated trimming and this has now been delivered to the ground and has been put to use. This equipment has a number of attachments and while a 4 stroke it needs to operate on a 50:1 mix. As we don't have any other equipment using 50:1 please take care! Arthur and crew have used the new chain saw and had managed to do a lot of trimming of long branches and things are now clear of head height and the clubhouse. There was a good crew feeding the mulcher with Ray L taking the mulchings down to the end garden. It was all perfectly placed enough to satisfy even David!

We removed some surface roots that were becoming a trip hazard near the elevated station. This was a team effort of Simon, Andrew, Martin, Warwick and Peter. Arthur, Sue, Graeme K and Warwick also cut some overhanging privet at the elevated station then mulched it.

Lionel and Sue refilled some of the coal bins. Peter W has provided a shade plate under the northern kitchen window to prevent the low sun angle bypassing the blinds

Arthur, Andrew and Warwick adjusted the spring on the shed roller door and lubricated the guides so it now operates as smoothly as it should!

Simon has been pruning the roses although he does note it is difficult to time the display for running day! David T has attended to the gardens further down the grounds. This continual effort is transforming the lower grounds. Just wait for spring!

Brian Muston attended to the BBQ fire door so it doesn't drop too far and is easier to operate.

Planning to replace the floodlights with LED types is in hand and hopefully this will be completed before the Interclub and Small Gauge day at the end of August.

Elevated Railway.

We investigated a misalignment on number 6 elevated stub points to discover the steel runner under the wheels had grown with rust and tipped up at the end, thus tipping the whole beam and misaligning the rails. It was prised out (it came off remarkably easily), cleaned up, edges prepped, bottom primed, then welded back into position by John L. Some angle grinder use smoothed the welding and Andrew then applied some sand cement mix to repack the plate. This quickly solved the problem.

The safety audit discovered some bad corrosion at the base of the home signal post at the elevated station. John L started work at the base of the signal, later joined by Brian M and Garry B. The plan was to remove the double pulley stand for the signal chain / wires so as to be able to access the eastern side of the post for inspection and derusting. This goal was reached, two fastenings removed and two sheared off, a 50 / 50 result was not bad under the circumstances! The signal wires were tied off and cleaning up was started. John L chipped away as much of the scale and rust as was possible, there is a patch of bad corrosion above where the patch pieces were to go. The broken bolts were cut off with the angle grinder and then drilled out. Warwick supplied a suitable piece of tube and Neal cut it into quarters. This was done in the evening before a Directors meeting and was very spectacular! Zac Lee needle gunned the steel signal base ready for welding on patches. The following Saturday John L was at work early with the angle grinder preparing the steel patches to size. It is amazing how well that big angle grinder works with a new disc! Brian Muston cleaned the site and as-

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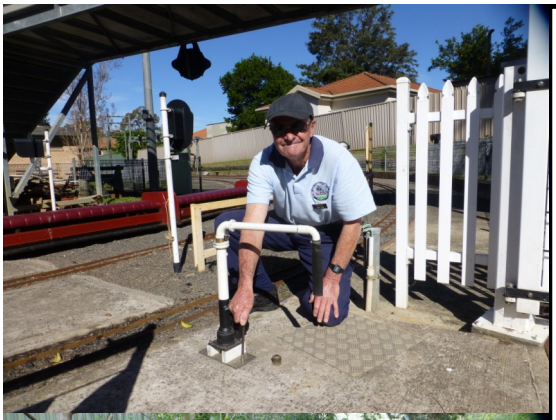
Editorial

I happened to see some of the Commonwealth Games coverage. Part of the Opening Ceremony stage set had a mock up of a hammer head crane recognising the city of Glasgow's industrial past. As well as that the view behind the Ch.10 commentators was of one of their actual cranes still in existence.

I wondered if anyone else seeing this was aware that "our" hammerhead crane at Garden Island is all but gone. Well, at least one other person noted that fact and sent a note to Column 8 in the SMH. I think that the note was published on the same day as the discussion got underway about the proposed "street sculptures" for the city of Sydney. The ribbon like arch over the George St. Park St. intersection at Town Hall, The giant upside down milk crate for Belmore Pk near Central Station and another one the location of which I cannot remember. It seems that many millions of dollars can be found for these but no one had any money to keep the crane. Our Industrial Heritage seems to not count for much.

On a brighter note we have seen that 6029 has steamed and moved under its own power in Canberra. This has been a great effort by the team that have worked over the past eight years. They should be congratulated for such a fine effort. John Lyons



Sydney Live Steam Locomotive Society Co-Op Ltd.
President's Report-2013/2014

1. Running Days & Events

The 12 months passenger figures were 26371 (12 months to end of April) compared to 25779 for the same period last year. We lost no running days to rain unlike the previous year where we lost 2. This means that some of our days in the last 12 months had generally lower figures than the previous year. However we did have 2 injuries during the period, which was unfortunate but less than the 3 of the previous year.

As a result of the injuries, the 24 month injury rate is steady at 009%, and the 12 month rate is also 0.009%, but reduced from the previous year. Even though our operation runs well, we do need to be very careful to ensure we maintain it very safe, as this is what the public expects.

Thanks to Chief Train Controller Barry Millner for handling the train organisation and Signal Box supervision. Thanks also to Track Superintendent Mick Murray. Mick has worked on delegating this role to others and it is most appreciated that this responsibility can be shared. This year there will be a number of members who will fulfil this role.

In the kiosk, we are very grateful for the assistance of our regulars Liz, Di, Joy, and Margo, and others who help from time to time. Ticket selling was handled by Brian Hurst and Peter Wagner. Again special thanks to Emily who is most reliable and providing professional first aid assistance to whoever is in need.

Our charity day for RedKite last November had 1788 rides, which was a little less than we usually provide for them.

The Society's special events for members and friends at the Christmas Party and New Years Eve, were both very pleasant affairs. Our special members days were held in June, September and March which was a visit to a (wet) Craig Hills. Our Small Gauge Day in November had fine weather but a Total Fire Ban on the Sunday brought it to a premature conclusion. A number of members attended the convention in Melbourne.

2. Financial Results

I would like to thank John Hurst for his efforts this year. The financial report was available immediately at the end of the financial year. We spent less than the previous year, probably due to no major ongoing project being undertaken although we did produce 4 new passenger cars and spent money on new bogies, and installed new cupboards. The end of year resulted in a small profit. Having sound financial management is a benefit for us. Thanks John.

3. Our Membership

We ended the year with 64 members (including country members & those awaiting acceptance), sadly as a result of 5 members passing away during the year.

Thanks to John Lyons who has continued with our newsletter, now 38 years in the position. The regular Saturday email has continued and is good up to date information for supporters of the Society as well as members. Thanks to Mick and Mark who have stepped into the breach when I have been unavailable. We have also received good coverage in AME, Model Engineer and Engineering in Miniature both as reports of club activities, photos and even articles submitted by members.

Many thanks to Mick Murray who does our formal amusement device inspection which is a requirement for the Code of Practice and shows due diligence on our part in keeping the operation safe. Mick also organises our track superintendants for running day and to those who have assisted, Neal Bates, Mark Gibbons, David Thomas, Steve Border and David Lee, many thanks.

Thanks as always to David Thomas, Andrew Allison and Bernie Courtenay who handles our boiler inspections.

Special thanks also to Peter Wagner who is regularly or ticket seller and to Chris Hurst who has also helped out and to our signalmen, Mark, Barry, Steve, and Martin. David Thomas is constantly at the gardens and our grounds would not be as pleasant without his efforts. I am sure he would welcome some other gardeners!

I would also like to thank our secretary Simon who puts in many hours in handling our correspondence and arranging various projects around the grounds. Without Simon to let contractors or suppliers in it would be very difficult to do even minor things such as the blind replacements, toilet floor upgrades and such like.
A special thanks to Mark Gibbons who is stepping down as a Director. Mark has been a Director for 8 years, although he did have a 5 year break between his two terms. Once a Director however, you never seem to leave one of those who put in that little bit more. Mark has been passionately involved in many aspects of the Society and we hope his standing down will let him finish his Blowfly and remain active in the Society in different ways. Many thanks Mark.
I haven't mentioned the many other members who assist as guards, stationmasters, drivers, and help maintain the grounds. Many thanks to you all.

4. Projects
The provision of plastic sleepers has been completed and some work has also taken place in adjusting the top and line. Mark Gibbons has done regular maintenance on the point motors while Mick Murray regularly looks after our bogie maintenance. Both are essential tasks and they deserve our thanks. No less than 20 members were involved in the four new carriages and this was certainly one of the best team efforts for some time.
John Lyons has led some levelling on the elevated track and generally looked after the new station area.
The covering of the ground level riding cars with soft seats was undertaken and completed by Arthur Hurst. A fan has been installed in the inner main carriage shed by John Hurst. The ballast pit has received a concrete floor and this should keep our ballast cleaner, and make it easier to unload and dig out. Thank you to everyone who has contributed not only to projects but also grounds maintenance throughout the year.

5. Model Engineering Activities
Mark Gibbons' Blowfly is progressing and it seems activity is increasing as the end draws closer.. We see Simon's B1, Max Gay's 38 class is now running as is Wayne Fletchers 34 class, David Thomas's S class is also near to operation while progress is still occurring on the 620. John Tulloch has been working on his K class, John Lyon's progressing the 25 class, and my 13 class is now in steam. Graeme Kirkby has a 17 class being restored to operation. Andrew has restored a Maisie and Ross Bishop has overhauled both his 50 class and Toneya. Other members efforts are always welcome to be seen on the morning tea table.

6. AALS & AMBSC & Other Visits
The convention this year was at Bulla in Victoria and several members attended. TLSS put in a lot of effort and the 140 locos that attended were well accommodated in loco and the grounds. Members also attended other clubs invitation days. Again we visited members Sue and Brian Carter at Paddy's River on the first Saturday in May. This was not the best weather day but the hospitality was exceptional. We are usually well presented at other clubs invitation runs.

7. Our Future
We are still awaiting the completion of the new West Ryde shopping centre development but at least its open for parking, even though a time limit applies, contrary to what they told us at the beginning.
The Board will see a small but significant change this year and hopefully this will inject some more ideas and enable us to continue to improve the grounds and our society.
Members have already agreed to a new water tank for the elevated station, a rebuilt elevated loco road and revamped level crossing gates across the elevated. As well there will be track and carriage maintenance to do. There are plenty of events on this year for members to attend as well.
The grounds really do look great. We are appreciated and the public attendances are going to continue to test us on Saturdays.
Thank you for your contributions through the year, and lets look forward to another successful year.

Thank You.
Warwick Allison 3 June 2014

Annual Inspection of Non-boiler Plant and Equipment - 2014

The annual inspection of the Society's grounds and facilities was conducted on 10 May 2014 pursuant to the requirements of Section 4 of the Australian Association of Live Steamers Code of Practice for the Operation of Miniature Railways, Road Vehicles and Plant - Hazard Identification and Management (Sub-section 4.5: Owner/user Inspection of Non -boiler Plant and Equipment).

I was assisted in my inspection this year by Neal Bates and Steven Border, and the two extra pairs of eyes prompted an amount of discussion, as well as some extra items for the list of things to do. The most important outcome was to identify ways to improve the inspection process and associated documentation. Thank you to Neal and to Steven.

The Society's Policy, General Appendix, Qualifications, Assessment of Competency, Hazards and Controls analysis and Maintenance policy and supporting documents generally comply with the recommendations of the Australian Association of Live Steamers Code of Practice for the Operation of Miniature Railways, Road Vehicles and Plant.

There was the usual listing of dead tree branches requiring attention, and it was noted that tree lopping and pruning had occurred during the year, effecting a reduction in the overall hazard. David Thomas is preparing a scope of work for the professional tree people and the list has contributed some items.

Time has taken its toll, and there is a need for some corrosion repairs and protective coating of the signal post at the Elevated Station and the Hawkesbury River Bridge. Additionally the decking of the Entrance bridge and the Ground Level bridge are in need of attention.

A copy of this year's checklist has been placed on display on the notice board in the clubhouse.

The Society's Rolling Stock, Track, Infrastructure and Signalling, continues to be maintained in a generally satisfactory manner. The Running Day Inspections of Carriages, Track & Structures and Signals (per the SLSLS Running Day Inspection Sheet 2008) have been performed and signed off in a generally consistent basis throughout the year under review.

A review of the Society's Risk Register and Hazard Control Matrix was conducted by Warwick Allison and myself on 24 May 2014 and the Matrix has been confirmed as appropriate to the Society's current operations.

A copy of the current Hazard Control Matrix is displayed on the notice board in the clubhouse.

Warwick has provided an updated "Review of Hazard Assessment" for the current year, a copy of which has been appended to my report for 2014.

Mick Murray
Inspecting Engineer

Unheeded Medical Advice.

On the 13th of September this year it will be the 160th. anniversary of the opening of the Hobson's Bay Railway Company's line from Melbourne to Sandridge (now Port Melbourne). One of the respected Melbourne newspapers of the time published an article from a prominent Melbourne medical practitioner warning of the dangers that rail travel would cause. He considered that it was not natural for humans to travel at high speeds for extended periods of time and to do so would be certain to precipitate serious health problems.

If that Doctor could be re-incarnated at the present time he would be amazed at how wrong his diagnosis was. The speeds reached by that early railway have been far eclipsed by the further developments of the various forms of transportation that we all now simply take for granted. Going beyond the everyday transportation the occupants of the International Space Station are orbiting the earth at an incredible speed for extended periods of time.

(Thanks to Elizabeth T for that piece of information.)

Editor's note. The source for the date, 13th September was "The Australian Book of Trains" published 1947

Left: Neal Bates oxy-cutting the signal post repair patches. Right: The result with John finishing off the welding.

sisted as John welded on the first patch. It took a fair bit of welding. After lunch Neal Bates welded on another patch assisted by Peter Dunn. The following Saturday John L completed the welding and applied some cold gal paint. Some of the welding might look a bit rough. Knowing the theory of vertical up welding and actually doing it are two different things. Working in such a cramped location was not easy either but it should stay in place. The pulley stand was replaced with new fastenings and some never seize. Some fish oiling and further work remains to be done.

In discussions about the elevated station guards indicator (originally given to us by Graham Tindale) it was realised we need to use the rotary contacts on the signal to operate it. This unit was seized so Andrew cut it off with an angle grinder for attention. He then removed some damaged timber from the post and sealed the result with primer. Warwick has repaired the lower quadrant signal rotary contact unit. The shaft had rusted solid and the bakelite contacts broken. A new shaft was machined and new contacts made from teflon with the existing brass segments inserted into slots in the teflon. This was reinstalled onto the elevated signal. Andrew installed a new pin into the operating rod for the reattached signal rotary contacts. This needed some adjustment as well. In view of the concrete soon to be done around the ground frame, it seemed prudent to install the guard's indicator wiring and Andrew, Ross B and Martin D dug the appropriate short trench. The end of the previously installed conduit was found and a suitable cable installed up and into the guards indicator. The underneath of the ground frame was cleaned out and washed also, thanks to Martin and Andrew. Andrew investigated the guard's indicator lamp to see what would be needed to install a globe. Warwick then manufactured an LED unit to take the place of the old globe and this has been installed and wired. Martin D is arranging the wiring in the box and the guard's indicator should be working soon!

Martin D has been doing some investigations into the characteristics of reed switches in order to improve our point detection arrangements. He has discovered some interesting facts that with a rearrangement of the switch positions should give us improved reliability.

The white picket fencing for the elevated station exit & level crossing and ground frame has been delivered by John H with his big van.

This has allowed excavation for the concrete pads around the ground frame and the elevated station exit which was done under very grey skies and some rain. While the ground frame area was boggy, the elevated station excavation was bone dry! Arthur, Garry and Warwick attended to the ground frame, and when this was done we relocated to the elevated platform and started there. Simon commenced the formwork for the ground frame and this precision work will provide an excellent result! With Neal's & Jo's assistance some shear pin holes were drilled and provided with pins and the reinforcement was placed. One interesting discovery was a 3ft deep round hole uncovered near the elevated platform! We think it is the rotten remains of a timber telegraph post.

John L spread the spoil around the picnic area near the elevated station and Jo carried on with this task later. The concrete was poured on the following Wednesday with 10 members to assist! The brew was excellent and everyone was very pleased with the outcome. It was noted the weather conditions were perfect! Most unusual! Thanks to Arthur, Warwick, John L, David T, Graeme T, Barry M, Graeme K, Simon, Garry B and Martin D. Following the concrete Martin did some more investigation into the elevated signalling circuit box.

The first Saturday in August was a lovely day and Brian M was there early removing the form work from the previous Wednesday's concreting. He was soon joined by Warwick and Arthur and assembly of the picket fencing began. Mark G and Peter W joined the team cutting the panels to size. Ross formed up for the extension to the small retaining wall near the elevated track level crossing. By the time you are reading this it should be completed. The rear angle to support for the ground frame deck was done with some sensitive measuring, drilling and adjustment. Martin D completed the wiring for the guard's indicator and it worked straight off. This was a great team effort to complete so much in the time available. The day ended with only a small length of fencing to complete. This would have been completed but for the failure of Warwick's impact drill.

Ground level railway.

Ross B and Warwick attended to a green car where the bolsters were detected as being out of parallel. The weld was ground out and the bolster repositioned and re-welded by Ross.

Lifting of the inner main loop was a high priority on the track. The points were 25mm lower at one end than the other! Thanks to Andrew, Ross, and Neal who helped Warwick with this. This is the first of a number of top and line maintenance works Warwick has in mind around the track when time permits. With no need to replace sleepers etc, the work was done in 2 hours and needed only one barrow of road base and one barrow of ballast to restore. This shows the benefit of the re-sleepering work we have done with the plastic sleepers.

The tapered plate near 19 points was raised to reveal an

The new ground frame fencing under construction.

Les Bird and his 27 class leads Garry Buttel and the B1 on the elevated on the July running day.

ant's nest which was dug out and then treated before it was replaced. Sue, Andrew, Nick, Lionel, David L and Warwick attended to this job. Some similar packing was done on the adjacent inner loop. Some ground level viewing of the inner main took place to determine what rectification was appropriate. Given the time available some selective lift and packing was carried out. Mark G went around with Peter D and picked up some of the sunken joints on the outer main. Some investigation into cabling for the automatic signals was done by David L and Peter W. Current thought is to install a signal near the bridge to protect the bottom curve and prove the system.

Loco & Rolling Stock News

Brian M showed a frame for a bogie passenger carriage being made for Nick.

Nick had his Blowfly boiler which Simon and Mark had done some work on and which boiler inspector Andrew looked at. Later Andrew did a hydrostatic test on John Hurst's Nigel Gresley. Andrew has also tested Ross's 5148. Ross had a tail light he was making on show. Very intricate! David T brought along his completed turret with valves for his SA 620 class. Paul Brotchie showed us his 23 class frames currently in production.

Members News

Congratulations to Zac Lee who is now a full member. Best wishes to Jim Lieshman who has been fitted with a remote control pump controller! and to Vic Scicluna who also has had some internal repairs. Paul Taffa has also had some medical repairs and is OK. Mark had some early Cec Gunning film transferred to DVD and was showing this at morning tea. There has been some discussion on attracting new members. Both model engineers and those interested in running a miniature railway are needed. Give it some thought. We need members who are committed to attending our operations. Perhaps you know someone? We are currently at 65 members.

Visit to Wascoe Siding

A report from Warwick. Many members attended a great day at Wascoe when they had their invitation day. The weather was fairly warm early but did cool a bit as cloud cover came over and a few spits of rain. However this in no way spoilt the day and there was a good crowd there.

SLSLS was well represented with 16 members and 6 locos. Simon had Simplex, Brian M had the Steam Tram, Brian C had Perseverence, Graeme Kirkby had 2401, Zac had the B10 and I had the CC79. John L brought along his D wagon and HG van for me to pull. It certainly makes the train complete!

There was a good selection of other very nice locos in attendance, and a 1 gauge track was laid and ran a variety of motive power, from steam to electric.

They provided us with a very nice lunch (I thought the sausages had an endless supply!) and certainly looked after us very well indeed. Wascoe and SLSLS go back a long way and it was great to visit them again in force.

Member's Family Day Sunday 12th. October.

This day will give us a chance to have a relaxed day with family and friends of the Society. Bring your own lunch and refreshments, locomotives, rolling stock, children, grandchildren and friends. We should try to support this initiative.

Parts for David Thomas' 620 class are taking shape.

Newsletter Circulation.

We need to find out just how members would like to receive their Newsletter. At the present time there is a choice of online delivery or the usual hard copy handed out or posted. The problem seems to be a variation between who want online and who want hard copy. Please let John Hurst or myself, John Lyons, know what you would prefer. I know that some members like an extra one to send to friends, would those friends like an online copy? If we get an indication that the number of printed copies can be reduced we could move to having the printed edition in full colour.

I know that some members have indicated that they are happy with other SLSLS correspondence sent online but not the Newsletter. Please let us know your preference. Many thanks, John Hurst and John Lyons.

Boilers: Copper vs. Steel?

By Ross Bishop

Twenty years ago, in 1994, my 5 inch gauge Fowler 0-6-2 "Toneya" steamed for the first time. It was the eighth engine completed, and the pinnacle of my model engineering endeavours thus far. It was made from the finest materials with no amount of effort spared to achieve the highest standards of detail and finish that I was capable of at the time.

It was almost incongruous that the engine was built with a Briggs boiler as the type is widely considered to be inferior to a copper locomotive type. I held the belief that Briggs boilers were not suitable for every prototype but for narrow gauge cane loco types they were ideal. So it was deliberate choice in the case of "Toneya" to not only prove the suitability but also demonstrate that a proper installation, with an appearance worthy of a finely detailed model, was entirely possible.

If one refers to AME Issue 69 of Nov – Dec 1996, a two part article begins wherein I confess my sins, one being the absence of a superheater initially and my disappointment as a consequence. I was ready then to build a superheated copper boiler as a replacement but chose to try one last thing before doing so.

At the expense of 2 fire tubes, a stainless superheater shaped like a giant safety pin was installed, with one leg poked down a fire tube each side. The superheater made a circuit of the firebox just below the crown where it received direct flame from the fire to superheat the steam. Now, as you know the only real heating surface in a Briggs is the tubes and to lose 2 of only 17 was a considerable step in the wrong direction as well. I was not entirely optimistic about the intended outcome!

Wrong again! The after-thought superheater was a resounding success making the engine the excellent performer people have come to know. The steaming capability of only 15 fire tubes was entirely adequate even under the most arduous conditions. With no real justification to scrap the Briggs thereafter, thoughts of changing to copper were laid aside as were the materials for doing so. And so it was for twenty years of regular running.

The decision to replace the Briggs now has little to do with the boiler itself. The twenty year old steel boiler is in excellent condition thanks to meticulous care and attention to water treatment and dry storage. The performance has not wavered and with the exception of renewing refractory every 5 years or so, it would continue to give good service for many years to come.

The simple explanation is that the materials were there, the unrequited desire was there and the model was deserving of revitalisation. A rebirth, if you like with a new version of balanced slide valves, the old rubber suspension replaced with coil springs, a hydrostatic lubricator (just for fun), additional frame stretchers and a new copper boiler complete with new ball valve regulator and conventional radiant superheaters.

There being quite a following of the project both from displaying progress at the club and sharing emails with members over the past year, it was no surprise that many enquired on Saturday (April 19) as to how the first run went. Actually, it was a unique opportunity to compare the two boiler types on the same engine operating under virtually identical conditions. Almost a controlled experiment as it were.

To the question, "Is it better?" I would answer, "It is different". Fuel consumption, 2 shovels per ride, is identical. Steam generation is more than adequate – it was before. It hasn't made it or broken it. It just <u>is not</u> the same!

To separate some of the issues for the purpose of comparing the two boiler types, sitting side by side on the bench, there is no doubt the copper boiler is a much nicer "thing" to behold than a welded black pipe no matter how you dress it up. On synergy with the rest of model, i.e., a labour of love, fine materials and workmanship, copper wins every time. On longevity in the face of neglect and abuse, the copper should outlive the steel many times over. On ease of manufacture, no boiler is easy. While the nature of making a Briggs is nothing like that for copper, to finish the whole installation well, is still a lot of work.

To discuss more factors effecting performance consider the comparisons in the table below:-

	Former Briggs Type (Steel)	New Locomotive Type (Copper)
Plate Thickness	10mm	3mm & 4mm
Number of Tubes	15 x 16mm (5/8") OD 2 x water tubes (5/8")	18 x 16mm (5/8") OD 2 x 32mm (1¼") Flues
Total Heating Surface	4150 cm2 (excl Superheater)	6560 cm2 (excl Superheater)
Grate Area	240 cm2	240 cm2
Water Capacity	10 litres	12 litres
Weight of Boiler	50 kgs empty	30 kgs empty

The original Briggs firebox showing the water circulating tubes and coil superheater.

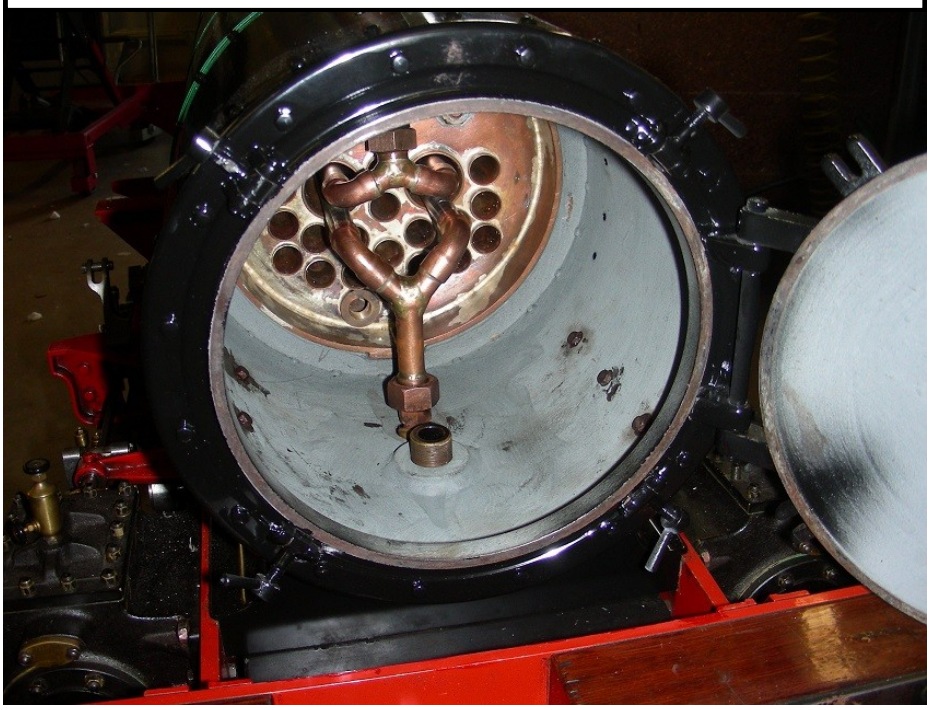
The main differences lie in heating surface and weight. The copper boiler has nearly 60% more heating surface for only 20% more water (although grate area is unchanged). There is also 20kgs less metal to heat. It is not surprising then that the copper boiler is rather livelier than the steel. However, this manifests itself in both positive and negative ways making possible cases for both the Briggs and copper boilers.

I always found the Briggs thermally very stable. It was slow to get hot and slow go cold. Not altogether "un-engine-like" actually and a characteristic that I rather liked. You had to be ready to make steam ahead of time. On the other hand, once the throttle was open and until the fire came up to temperature, the Briggs would hold on, presumably drawing stored heat from the heavy steel shell to boil the water with only a slight reduction in pressure.

Recall that water under pressure boils at a higher temperature as pressure increases. Conversely, for a given temperature, a slight reduction in pressure causes the water to boil vigorously without additional heat being required. At 100 psig water boils at 338 deg F (170 C). At 90 psig water boils at 331 deg F (166 C). If, after a few "choofs", the pressure falls to 90 psig, and the temperature of water and metal has not yet made a corresponding adjustment, then the water suddenly finds itself a few degrees above boiling and begins to boil furiously.

One presumes the extra 20 kgs of metal in the Briggs acted to prolong the period of temperature adjustment to the reduced pressure giving the impression of "hanging on" or dampening the effect of the sudden change in demand for steam. Perhaps the transfer of heat from metal to water even assisted steam production until such time as the fire picked up and the steaming rate became sustainable. If this assumption is correct, once the throttle closed again, heat transfer from metal to water would reverse with heat being transferred from water to metal again dampening the attendant rise in pressure. The cycle aligned nicely with the nature of the gradients over the course of a lap, performing a similar function as a battery or other storage device to even out changes in demand.

The superheater headers as made for the new copper boiler.



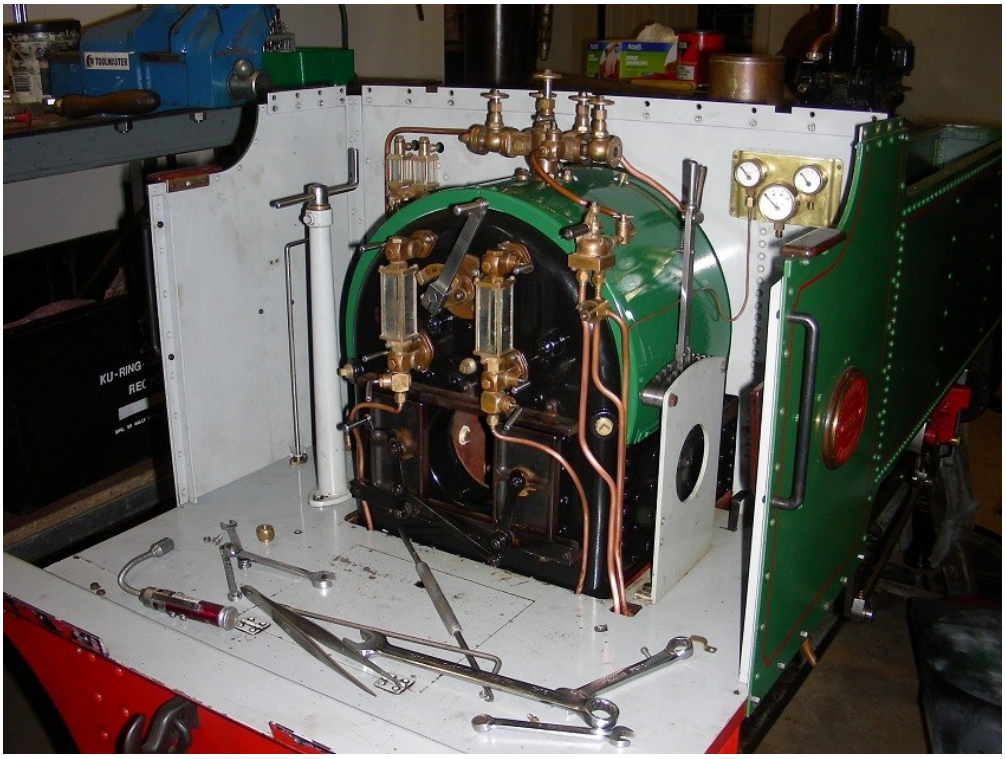
On leaving the station, with the Briggs, I'd have a breath of blower on and aim to round the bottom curve with a good fire and 95 on the clock. The sluggish response thermally allowed these preparations to progress without an immediate rise in pressure. Rounding the curve and starting to steam back up the 1 in 60 to station elevation, the boiler pressure barely changed. About halfway up, the safeties would lift, so on with the feed until through the station area and picking up the brake shoes again. All very routine.

The copper boiler is noticeably more volatile and quite different to operate. A small error will see the pressure drop quickly. Conversely, it responds rapidly with the needle climbing around the gauge before your eyes. You can be 25 pounds down one moment and blowing off 20 metres later! The effect of that volatility when hauling a 7 car train at SLSLS is that, to do the job well, quite a different technique is required.

Not surprisingly, with the copper, I'm all

over the place! If the fire is bright there's too much steam. If the fire is dull I lose much needed pounds where I need it most; pulling up grade out of the curve. Also, as a result of trying not to make excessive steam while drifting down grade, the firebox temperature is intentionally lowered (door open, damper shut) causing the superheater to be cold at the beginning of the climb. In spite of a larger surface area of superheater I find the engine wetter as I start to steam up the grade than previously.

On the subject of superheater temperature, I made some rudimentary tests on the McLaren traction engine's superheater and found that low firebox temperatures due to fresh coal or having the fire door open so cooled the superheater elements that they cooled the steam rather than heated it. Once the firebox temperature increased this situation quickly reversed with superheated steam temperature rapidly rising above boiler temperature. However, there is a lag between opening the throttle, the fire responding to draught and the superheater transferring the heat. Meanwhile you are left wondering if you had a superheater at all!



The false back head made for the Briggs has been transferred to the new boiler.

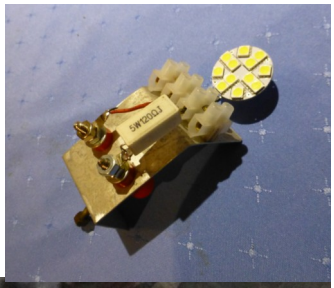
Overall, there can be no denying the copper boiler is a nicer unit and a prudent investment in the future. Having said that, I think the thermal stability of the Briggs was an advantage and suited the nature of the workings at SLSLS. Given that I'm still devising the new "best practice", there are alternatives to experiment with to find the best use of blower, damper, injectors and firing technique. Options exist to make permanent changes to blast nozzle or grate as well. Those choices will be made once I get better acquainted with my engine reincarnate. One thing about model engineering is that it's never dull!

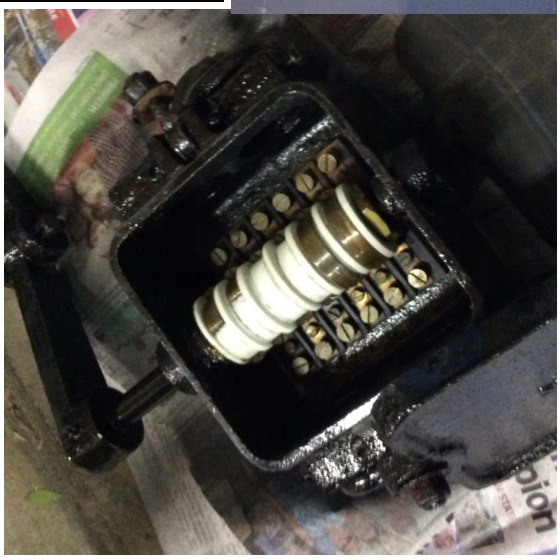
Postcript: Since the article was prepared I have opened the blast pipe by 1mm giving an increase in area of 25%. This has made the boiler slightly less volatile.

Right: The new guards indicator LED assembly.

Below right: The restored rotary contact box for the lower quadrant signal with teflon contact segments.

Left: The working result!





Above: Brian Carter and Perseverance at the Wascoe interclub day. The passenger car is constructed using laser cut plywood.
Below: June Running day and three trains pass at the bottom of the grounds. Its a busy place!

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Public Running Day is the **THIRD** Saturday in each month from 1.30pm. Entry is $2 adults, $1 children. Rides are $1 each.
To ride on the trains, enclosed footwear must be worn.