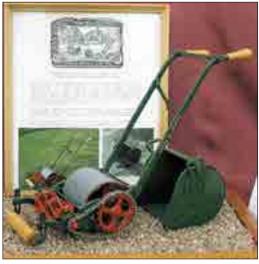
SOUTHERN FEDERATION NEWS







Seen at this year's London Model Engineering Exhibition.

ABOVE: Something different! Left: A Greens 10" 'Silens Messor' lawn mower of c.1900. Right: A Suffolk Iron Foundry Court Grass Liner of c.1900.. Both models at 1:4 scale were built by David Savage and were displayed on the High Wycombe MEC stand.

BELOW: 2008 sees the Blackheath Model Power Boat Club celebrating its 80th anniversary. On display on their stand were a number of models from over the years, including a previous Championship Cup winner, Patricia of Polruan.



FRONT COVER: A Gauge 1 4-6-2 Merchant Navy Class loco, Blue Star, by David Jones, displayed on the North London SME stand.

Photos: Mike Leahy

SOUTHERN FEDERATION NEWS



March 2008

Editor MIKE LEAHY

Views and comments expressed in this publication are not necessarily those of the Southern Federation of Model Engineering Societies

EDITORIAL

PERSEVERANCE pays. I am sure you will agree that the outcome of the Federation's quest to obtain a definitive ruling with regard to the interpretation of the Safeguarding Vulnerable Groups Act has been well rewarded. For the majority of clubs/societies it will be of no consequence. For some, particularly those involved with children's educational groups, there may be a need to consider the ramifications of the Act. (see page 3)

There are so many rallies and exhibitions these days that the calendar is becoming somewhat overcrowded. Although the Federation's Spring and Autumn Rallies have long been fixed at the third weekend in May and September respectively, we find, unfortunately, that other events will clash with both of them this year. Well, as they say, 'You pays your money, you take your choice'. We hope that you will give your support to both of our rallies.

With an early Easter this year, the running season is almost upon us. I hope that this year the sun will never-endingly shine and that the poor weather of last year is gone and forgotten. May your events be your most successful ever.

Mike Leahy February 2008

www.southernfed.co.uk

Items for inclusion in the June 2008 edition should be sent to the Editor

by **26th APRIL 2008**



From the Chairman

In this the first 'Chairman's Chat' for 2008, I trust all the winter maintenance projects have been completed in readiness for a new running season, which in many cases commences at Easter, just a few days away. Once again these notes are written within a few days of the Alexandra Palace exhibition: it was a pleasure to meet up with so many of our friends once again.

The exhibition itself was well supported throughout the weekend, as ever a well organised event that we have come to expect from Exhibition Manager, Chris Death, ably supported by his experienced team of helpers at Meridienne Exhibitions

By the time you read these notes, you will have received a mail shot inviting you to renew your affiliation fee for another year, along with details from Footman James in respect of insurance premiums for the next twelve months, which are unchanged from last year – let us hope with your help, this trend continues for the future.

You will have also received notification of the Federations Annual General Meeting on Saturday March 8th commencing at 2.00pm prompt. This is a very important event in the Federations calendar, it also gives your Club/Society the opportunity come along and air any grievances that you might have, or raise any topics of a mutual interest.

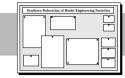
Once again, 2008 has got off to a good start for the Federations sales stand, as mentioned previously we were at Alexandra Palace, and only a few days ago at Brighton Model World. With more invitations coming in on a regular bases it looks as though we are in for a busy summer.

Events being supported by the Federation up to the next newsletter in June:-

A.G.M.
Milestones-Basingstoke
Harrogate Exhibition
Federation Spring Rally – Vale of Aylesbury
Vale of Aylesbury T.E. Rally

8th March April 26th/27thApril 9th-11th May 17th May 31st May/1st June

Brian Thompson



NOTICE BOARD

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SAFEGUARDING VULNERABLE GROUPS ACT 2006 As you are aware, the Federation has been in contact with a number of MPs, and in particular Mr Kevin Brennan, Parliamentary Under Secretary of State for Children, Young People and Families, seeking clarification of the above Act in view of what was perceived as its potentially serious impact on the hobby.

We have now received a reply giving Her Majesty's Government official policy, and permission to publish it.

Extracts from Mr Kevin Brennan's letter of 13th December 2008.

"The SVG Act aims to prevent those who are deemed unsuitable to work with children and vulnerable adults from gaining access to them through their work. Broadly, the SVG Act will apply to hobby societies where members take part in certain specific activities with children or, less likely in the case of model engineering societies, with vulnerable adults. The scheme does not make a distinction between paid work and those who volunteer. This is because in both cases unsuitable people should not have the opportunity to cause harm. Unfortunately, although many societies do treat child protection issues seriously, it is not always easy for a society or any organisation to spot an individual who seeks to harm vulnerable groups. We would not wish to seek to amend the legislation to exempt hobby societies and have them become a haven for unsuitable individuals who perceive it to be an easier way to access vulnerable groups. However, applications for membership for volunteers will be free.

Individuals will be required to register with the Independent Safeguarding Authority (ISA) where they engage in what the Act terms "regulated activity" in relation to children and/ or vulnerable adults. It does not follow that every society that has junior or senior citizens as members will be engaged in regulated activity.

In order to work out whether a particular member of a hobby society is covered, the society needs to look at whether their members are engaging in regulated activity. Taking regulated activity in relation to children first; the Act will bite on those, amongst others, who are frequently, or intensively (defined as more than 2 days in a 30 day period), teaching, training, instructing, caring for or supervising children where this is not incidental to the same activity in relation to adults. Therefore a member of the society operating the miniature railway would not have to join the scheme if they ran an open day for the general public teaching them about engineering and some children happened to attend along with adults. Equally if the society is open to the general public to join and part of the society's purpose is to teach, instruct, etc members about model engineering they are not automatically engaged in regulated activity by virtue of having junior members as well as adults.

If however, the society ran events where a member of the society went into schools frequently to teach children about model engineering, then they would be engaging in regulated activity. If the society had specific projects targeted at children where members frequently supervised the children, then they would again be engaged in regulated activity. As the code of practice (ie Southern Federation Bulletin #1) states 'relationships do build up between children and adults' and we seek to avoid unsuitable individuals using these relationships as an opportunity to cause harm. Therefore such individuals would have to register with the ISA and be checked by the head of the voluntary group.

Turning to regulated activity in relation to vulnerable adults, it's worth clarifying that being a senior citizen does not mean an individual is a vulnerable adult. Therefore it doesn't follow that members of model engineering societies who are senior citizens are vulnerable adults. The SVG Act provides a definition of "vulnerable adult" for the purposes of the Act. It provides, among other things, that a vulnerable adult includes a person aged 18 or over who receives a service or participates in an activity which is targeted at people with age-related needs, disability or prescribed physical or mental health problems. In addition you are only engaged in regulated activity in relation to vulnerable adults if you are doing specific types of activity such as offering assistance, advice or guidance wholly or mainly to vulnerable adults.

Therefore in deciding whether their members will need to register with the ISA hobby societies should consider again whether their services are targeted at vulnerable adults or at the public more generally. Where services are targeted at the general public, as seems likely in the case of model engineering societies, and vulnerable adults may or may not use those services, individuals will not need to be ISA registered in order to provide regulated activity such as offering assistance, advice or guidance to a vulnerable adult.

I hope that this reply will reassure modelling engineering enthusiasts, and that these societies will continue to thrive."

Note: Italic entry is for clarification; not in original letter.

Comment

The Federation had previously issued Guidelines (Bulletin 001, dated June 2005), and these Guidelines are judged still to be robust, and it is recommended that Societies adopt them as a Code of Practice. However, we must be ever vigilant, and take firm action on any undesirable individuals,

Based on Mr Brennan's letter, it would appear that the vast majority of Model Engineering activities should fall outside the requirements of the Act, but the onus is on Societies to ensure that their activities meet the criteria, in which case, no further action should be required on their part.

Further information may be obtained from the following websites:

www.opsi.gov.uk/acts/acts2006/20060047htm www.everychildmatters.gov.uk/vettingandbarring

ACKNOWLEDGEMENT Much of the dealings with MPs and the relevant Minister was undertaken by the Federation's Secretary, Ivan Hurst, for which we owe him our thanks.

GARRY GARRET The Federation sadly reports the death of Garry just prior to Christmas. A founder member and past Chairman of the Dockland and East London MES, he was for many years an active member of the Southern Federation's committee and regularly helped man the stand at exhibitions throughout the country. Additionally, he was a member of Canvey Railway & MEC, a frequent visitor to the Isle of Wight MES and, when ill health caused him to move to live with his family, had latterly joined Bournemouth & District SMF.

SOUTHERN FEDERATION ANNUAL GENERAL MEETING

8TH MARCH 2008 2.00PM

The Museum Severn Valley Railway Comberton Hill Kidderminster Worcestershire DY10 1QX

Free Admission.

Car parking in the Severn Valley Railway.

Bring your family who can visit the museum and/or ride on the railway.



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SOUTHERN FEDERATION SPRING RALLY

at the

VALE OF AYLESBURY MODEL ENGINEERING SOCIETY

BUCKINGHAMSHIRE RAILWAY CENTRE QUAINTON ROAD STATION AYLESBURY BUCKS HP22 4BQ

Saturday, 17th May 2008

Open Day - Sunday 18th May

Ground level track for $3^{1}/2^{"}$, $5^{"}$ and $7^{1}/4^{"}$ gauges.

Refreshments available at the Railway Centre.

Free entry to the Centre for drivers and their parties. Concessionary entry for other visitors on presentation of Club/Society membership card.

Steam loco to be in operation at Centre.

Overnight camping/caravanning available (prior notice required).

For further information & overnight bookings contact:

Clive Ellam Tel 01296 623433 E-mail cellam@madasafish.com

DISCOUNT Southern Federation members can benefit from a 10% members discount scheme for purchases from the new Shesto Ltd website. www.shesto.com

To take advantage of the above offer, you will require a special 'Discount Code' which you will need to input at the checkout of the new Shesto website. The code is available by sending an e-mail to the Federation's secretary, via the Federation's website www.southernfed.co.uk requesting the code which will be sent by return of mail at the earliest opportunity.

SPEAKER FOR CLUB MEETINGS

Paul Tracey of Avanquest UK offers to give talks about CAD to clubs/societies within the Federation. His company sells the popular **TurboCAD** software, which has versions available for both PC and MAC platforms.

Contact: Paul Tracey Tel: 01962 835081

E-mail: ptracey@avanguest.co.uk

www.turbocad.co.uk





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MASTERCARD

A number of pages from the printed version of Southern Federation News, which is circulated to all clubs/societies affiliated to the Southern Federation of Model Engineering Societies, have been omitted from this electronic version as they contain information that is either confidential or subject to the Data Protection Act.



DID YOU KNOW?

The Worlds Best Kept Auto Secret

I have been driving for decades. One would think I would have noticed the little secret on my dash that was staring me right in the face the whole time. I didn't and I bet you probably haven't either.

Quick question, what side of your car is your fuel tank filler cap? If you are anything like me, you probably can't remember right away. My solution is to stick my head out the window, strain my neck and look. If you don't do this in your own car you'll definitely have done it in a borrowed or hire car.

If you look at your fuel gauge, you will see a small icon of a fuel pump. The handle of the fuel pump will extend out on either the left or right side of the pump. If your filler cap is on the left, the handle will be on the left. If your filler cap is on the right, the handle will be on the right (see pictures below). It is that simple!









Why don't the dealers share such important information with car buyers? I don't understand why this isn't in the drivers manual? No mechanic I have ever been too or know has even thought of mentioning this to me? The only possible explanation can be that all these people probably don't even know!

Go out and share the worlds best kept secret with your friends as this is information is way too important to be kept secret!

John Capon - Canvey Rly & MEC



CLUB PROFILE

VALE OF AYLESBURY MODEL ENGINEERING SOCIETY

The Vale of Aylesbury Model Engineering Society (VAMES) is based on the Buckinghamshire Railway Society's site at Quainton Rd. just north of Aylesbury. It

was founded over thirty years ago and since moving to the current site has grown from strength to strength. It's a busy set-up, with nearly 30,000 passengers a year tentakina the minute trip round the 1km long line. When the society started-up thev managed to buy the track and fittings

from a garden railway, the 'Golding Spring Miniature Railway' and that name lives on at Quainton Road. The agreement with their landlords is that they run every day they are in steam. In effect that means every Sunday from Easter to the end of October, and Bank Holidays too.

The long rectangular site is home to a figure of eight track with a diamond crossing half way round. The first visitors see of the line is when they pass the standard gauge running shed and loco pit in Quainton's up yard. A level crossing takes you into the club's car park close to the steaming bays. A pleasant walk through a small wood brings you to the station and booking office.

A great deal of work goes on unseen by the visitors. Wednesday is by far the busiest day of the week. It's quite common for at least 20 members to be

there cleaning, tidying, building, rebuilding and attending to all the other jobs that keep the track running efficiently.

Then there's another group that keep the whole society and visitors well watered as the station also houses a Refreshment Bar serving drinks and

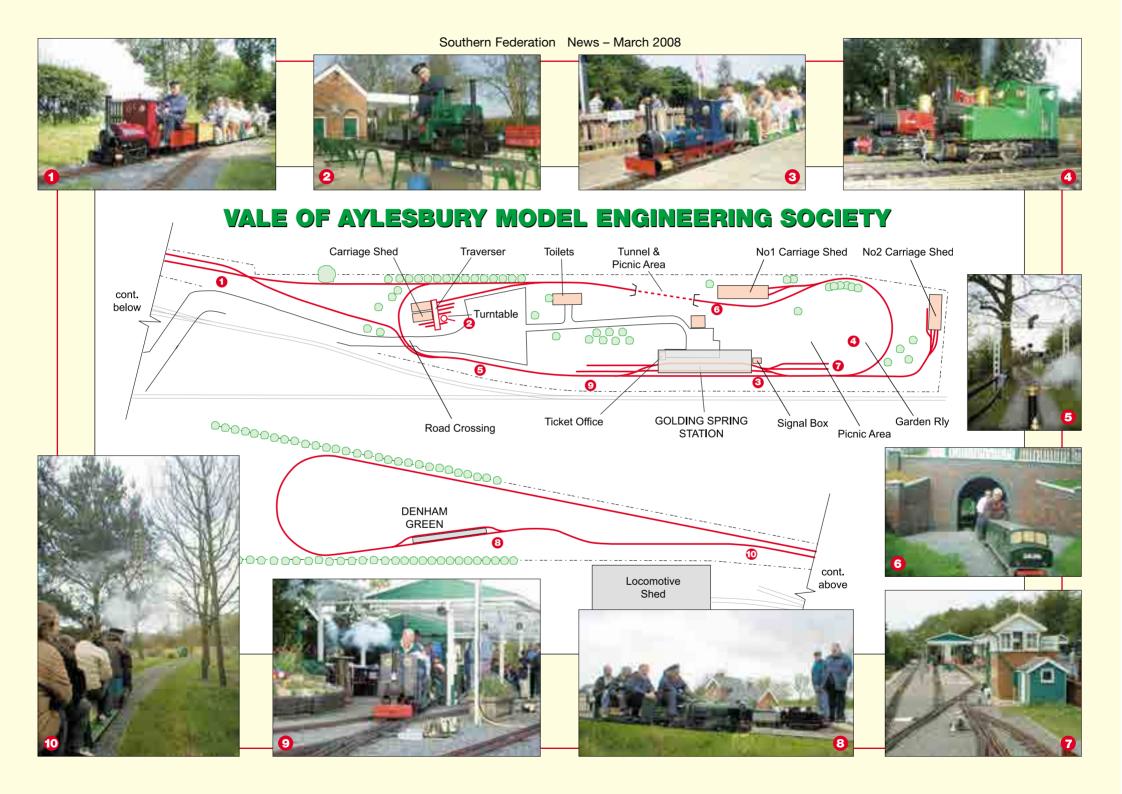
as the station also houses a Refreshment Bar serving drinks and cake and biscuits. With so many picnic tables on hand it's very popular with visitors. It's a fine body of ladies, by and large, that staff this

of ladies, by and large, that staff this facility and keep the customers satisfied. The classic un-sung heroes that don't often get a mention!

There's a thriving group of 'G' scale members in VAMES and their activities complement the other facilities.

There's a very important ingredient that attracts so many. Comradeship and good humour!

If you've never been to Quainton Road a visit is long overdue and if you venture up to the VAMES site you'll be sure to get a warm welcome and even a cuppa!



VALE OF AYLESBURY MODEL ENGINEERING SOCIETY

Location of premises Buckinghamshire Railway Centre
Quainton, nr Aylesbury, Bucks

Permanent Track Yes

Elevated/Ground Level Ground Level

Length of Track/Gauges 1,300 feet 31/2" - 3,300 feet 5" and 71/4"

Maximum Gradient1 in 100Minimum Radius45 feetVoltage available12VPublic/Private groundPrivate

Parking/Distance Yes – Adjacent Public Running Yes – Sundays

Track Steel
Guard Rail fitted No
Width over Guard Rail
Min Ground Clearance –
Trolleys for Visitors Yes
Distance from London 40 miles

Club Meetings First Fridays of each month – 8.00pm. Working

parties most Wednesdays/winter Sundays -daytime

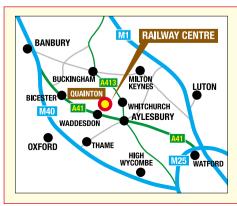
Additional Information Visitors welcome by prior arrangement with

Secretary. Extensive running space for miniature

road vehicles

Website www.vames.co.uk
SatNav Location Postcode HP22 4BQ

Club Secretary Mr Mike Clemence Tel: (01296) 623540



M40. At Junction 9 take A41 to Aylesbury, after Woodham follow brown signs to Buckinghamshire Railway Centre.

A413 (Southbound). At Whitchurch village follow brown signs to Buckinghamshire Railway Centre.

M25. At Junction 20 take A41 to Aylesbury, continue towards Bicester, after Waddesdon follow brown signs to Buckinghamshire Railway Centre.

AROUND THE CLUBS

Much of the content of this section of the magazine is gleaned from the various club newsletters, journals, e-mail magazines, etc, submitted to the Federation. Not all clubs have a magazine but that shouldn't stop you from letting others know about your activities. Reports from clubs are most welcomed. Please submit your article or magazine to the Editor.



Interestingly, the article regarding a boiler failure that appeared in the June 2007 edition this magazine has been reproduced, with translation, in a Japanese magazine. Kimio Hoshino, who no doubt some of you have met when he visited clubs in the UK, (see p30, Southern Federation News, Sept 2007) has sent a copy of Japan Coupler Friends Club Bulletin, No41 for our

perusal. He writes to seek permission to reproduce the article, which, of course, is given.

While your editor's comprehension of Japanese is zero (no pun intended!) the content of their magazine can be readily appreciated and the drawings understood. No doubt, model engineering is the same the whole world over.

NATIONAL CLUBS



By the very nature of the distance many of its members live from its headquarters in South-East London they are unable to attend the meetings of the Society of Model & Experimental Engineers. So that they may participate in some way, the Society has instigated a couple of innovative ideas. Rather than attempt to form 'branches' in other parts of



the country, m e m b e r s living in loose proximity to one another have arranged a number of informal gettogethers at m e m b e r s homes, now known as 't w i g s'. Additionally,

some of the events/talks held at Marshall House are recorded on video and DVD copies made available to members at a later date.

Just prior to the closure, for upgrading, of the East London Line, of the Underground, a party of members were able to visit the Brunel Museum at Rotherhithe and journey through the Thames Tunnel to Wapping. This tunnel, the first under a navigable river anywhere in the world, was started by Sir Marc Isambard Brunel in February 1825. Eventually, after a number of disastrous and with Isambard Kingdom floodings, Brunel in charge of work, it was completed in 1841, and was opened to the public as a foot tunnel and shopping arcade in 1843. Stallholders set up in each alcove along the sides and centre to sell souvenirs of this eighth wonder of the world It cost one penny to enter and cross under the river and about two million people a year did so. Eventually, it was taken over by the East London Railway Company and has been used as a railway tunnel ever since. Once work has been completed it will become part of the London Overground. Plans are afoot to incorporate a new home for the museum in one of the old entrance shafts to the tunnel

Maxitrak Owners Club, reports the success of their rallies last year and informs us of the dates of this year's rallies, 22nd June at Saffron Walden & District SME and 2nd August at Surrey SME.

Currently, with 255 members the Model Steam Road Vehicle Society shows how large it is compared to other clubs. However, along with a number of other clubs and societies, it has difficulty filling officers and committee posts and still seeks someone to take the Chair.

In spite of problems encountered over the past months with flooding and rain (washouts can have a serious effect on the

financial viability of large events) it has been decided to once again hold the MSRVS Rally at Tewkesbury Rugby Ground, **28th/29th June**.

A part from a number of new designs for Steam locomotives available from the National 2¹/2¹¹ Gauge Association they have been progressing the designs for two electric locomotives. That of a Class 66 is well under way with a couple of trial chassis

being built. The other project, based on a Swiss Crocodile, has reached the stage where if there was sufficient interest shown then a chassis could be built to prove the design - there is no point in pursuing designs in which members have limited interest.

The Association is organising a number of rallies, throughout the Summer, at a variety of venues around the country. (See p34/35, the Events Diary for details).

NORTH OF ENGLAND



perated by the **Beamish MEG**, the rack railway at the Beamish Museum is unique in the length of steep track (1 in 9 – 1 in 11) over a length of some 600 feet, of which 450 feet is rack fitted. While a Koppel locomotive has no problem it is at the margin for adhesion-only locomotives. At their official opening, Richard Gibbon with his Wren made a brave attempt but had to stop before finally reaching the summit.

The 7¹/₄" gauge Shay built by Alan Bowran of Carlisle ME group has long been an object of admiration and the BMEG were delighted to get a request to attempt the rack gradient. On Saturday, 7th August 2007, the first successful non-rack ascent of the Beamish Cog railway was achieved. The only modification required was the removal of the cowcatcher rails which would have fouled the rack teeth. Alan wisely declined the offer of a second run, perhaps reflecting

that even a little oil on the track might turn a triumphant ascent into a fiasco.

To ensure that club locos are cleaned at the end of each running session, at the City of Sunderland MES, equipment has been purchased to make this task more easy to accomplish. This includes a paraffin/air gun to wash all the track rust from the wheels and motion gear; just few moments with this gun and all the dirt is removed effortlessly. Quick release components cuts of the air pressure and makes the changing of guns very easy, no spanners required. A trigger controlled compressed air gun can be readily exchanged for the paraffin gun to blow away any paraffin residue. To complete the cleaning job, another gun filled with a mixture of 1 part oil and 3 parts paraffin is used to ensure the locos motion gear has a coating of oil to help prevent rusting during non operational periods.

City of York & District ME, had worked on the construction of River Mite, the 15" gauge 2-8-2 running on the Ravenglass and Eskdale Railway, when it was originally built by Clarksons of York. He was invited to Ravenglass to a special ceremony to mark its return to service after a major overhaul and, as the only one present who had worked on its construction, was asked to perform the unveiling ceremony and give a speech.



THE MIDLANDS & EASTERN COUNTIES



With passenger demand having outstripped the passenger hauling capacity of available locomotives a new electric locomotive is to be purchased by the **Norwich & District ME**. Meanwhile work is in hand to construct a canopy over the platform of the ground level track and given reasonable weather it is hoped to be able to complete the project before the next running season.

Peterborough SME's Miniature Loco Rally (PMLR) is to be held over the weekend of 31st May/1st June. Their raised track is almost 1200 feet in length and can accommodate 31/2", 5" and 71/4" gauges. They have only two more years at Thorpe Hall before the lease expires, so go and enjoy the pretty setting in the old orchard while you can.

The Society informs us that this year's

Sacrewell Miniature Traction Engine Gathering, to be held on **19th/20th July**, at the Sacrewell Farm and Country Centre, will be a John Haining themed event. Anyone with one of John's many designs will be welcome to come and display their model. For an entry form contact Pete Jackson, Tel: 07712 980196.

Cambridge MES have completed negotiations to acquire the use of additional land adjacent to their tracksite, thus enabling an extension to their track to be made. Currently the land is overgrown with brambles and dead trees so a considerable amount of work has to be undertaken just to clear the site. Members who fancy some exercise are encouraged to come and give a hand. Meanwhile work is in hand to install the new level crossing, which has been prefabricated off site.

DRILLING BRASS

When drilling brass with an ordinary twist drill there is always the problem of the drill snatching as it tries to twist its way through the metal at the helix angle. It is often the case that when drilling through thin metal the hole produced is 'lobed' and over size.

I was asked once by a 'woodwork' man who wanted to drill the 'half' round brass strip to fit the keel of a dinghy he was building for the correct size drill. Not having a drill near to the size I said that I would make him one, and also include the countersink so that the job could be completed in one operation. The job was started by taking a piece of silver steel rod about '/2" dia. and turning the first inch to a diameter to easily clear the screw. The end was tapered at about 90° inclusive angle. The next part of the bar was also tapered at 90°. The rod was reversed in the chuck, checking that it ran reasonably true and reduced to about '/4" dia. The rod was now filed to the half way line as shown. The cutting end of the rod was now heated until it turned a nice bright red and held at that temperature for a few minutes to soak. It was then plunged vertically into a can of water and quickly swished around to cool it down. The metal was cleaned with fine emery cloth until bright, it is now very brittle and can easily be broken. The large end, furthest from the cutting edge, was warmed in a small gas flame, very

slowly. Colours will appear in the surface of the metal. First a light yellow colour (straw), which will slowly darken (dark straw) then to brown, purple, dark purple and then blue. These colours are best viewed in subdued light. The colour required is brown and the slower the heating the greater stretch of colour will be produced. Quench. Rub the flat surface on an oilstone and it is ready for use.

The 'woodwork' man was surprised to have it in about half an hour, but didn't believe it would cut. So onto the drill press and soon I had been pushed aside and he finished the job. The tool disappeared into his pocket, "your not having it back".



PEEMS - Pickering EEMS

The device in the centre of the badge of the **Birmingham SME** represents the steam road engine built by William Murdoch in Redruth.

Cornwall in the 1790's. As reported in the Society's *Newsletter*, a project to build a replica of the engine achieved success in 2007. There is documentary evidence that Murdoch constructed a large steam carriage at the Tuckingmill

Brass Foundry, near Redruth. There are no drawings or other records of William Murdoch's large steam carriage, so the replica, known as the Murdoch Flyer, constructed by the project team is a conjectural one and was set up to establish whether a large locomotive of

Murdoch's design could have worked. The objective was to build a vehicle that would run at least a quarter of a mile under steam on fairly level ground.

After four years of research, design, building and testing miniature locomotives, the team started construction of the full size steam driven locomotive in 2004. The timber was cut

to size, laminated, glued and bolted to form the locomotive chassis. A wood turning



The replica Murdoch Flyer

lathe was constructed in the workshop to make the column. The wheels and undercarriage were then made. The boiler had to comply with current legislation and safety standards. Boiler drawings were examined and approved by Lloyds Register and an order was placed for the boiler to be made by Bell Boilers of Gloucestershire. It was completed and delivered to Redruth at the end of July 2005. This marked a key milestone in the building of the locomotive

and meant that construction work could proceed. A first test firing of the boiler was accomplished in December 2005. With construction completed, the full size steam locomotive underwent commissioning trials on Sunday 20th May 2007.

Don Crisp, past Secretary, Social Secretary, Vice President, and President for two terms died in December 2007. He was probably best known throughout the hobby as being one of the Director's of the 'old' A J Reeves & Co (Birmingham) Ltd.

W7ork carries on at the Hady tracksite of the Chesterfield & District MES; the riding car shed is almost finished and the ground level track extension is moving forward. The idea is to lessen the gradient and give another line into the top wood which will be unimpeded by locos taking the original route into the bottom station. Some infill is needed to build up the embankments by the side of the golf course and the public path and that will be generated by digging a cutting after the Top Station nearer the school roadway. Refurbishment of the club house continues and plans are afoot for a combined new steaming bay and carriage shed layout, possibly with a roof for the whole area.

IT'S HOW YOU SAY IT

A German lad in describing his hobby has to say the following: 'Das Hobby, dass darin besteht, verschiedene, zugtypen zu shen' literally translated as 'the hobby that involves seeing different types of trains', or in other words - trainspotting!

Luigi Naruszewicz The Thunderer – Northolt MRC

Newsletters have also been received from:

Crawley ME - Bournemouth & District SME - Southampton SME - St Albans & District MES Winchester MES - City of Oxford SME - Frimley & Ascot LC - Harrow & Wembley SME - Pimlico LR Worthing & District SME - Halesworth & District MES - North Norfolk MEC - Northampton SME Saffron Walden & District SME - Reading SME - High Wycombe MEC - North London SME Welling & District MES - Chesterfield & District MES - East Herts MR

LONDON & THE SOUTH EAST



The Pinewood MRS were visited, on Saturday, 22nd September 2007, by a production team making a pilot for a possible new series on behalf of BBC Scotland

Paul Konig's C19 was the principle locomotive used by the camera crew for action shots. The programme presenter, Adam Rutherford, was taught by Paul, in too-few easy lessons, how to be a train driver. A sit-aside truck was positioned in front of the cow-catcher with the cameraman, producer and sound engineer seated facing backwards to film the locomotive in action.

The first attempt at filming missed the opportunity to record for posterity 'the face of anguish'. Not the presenter's face as he

drove a loco, solo, for the first time, but the look on Paul's face as his locomotive disappeared round the loop with eight wheels spinning, sparks flying towards the sky and a carefree film crew travelling backwards in front of the locomotive, towards the bridge. Filming continued for some two hours with the club secretary playing an important role in the last phase of filming - being specially chosen to lie on the flat wagon to act as ballast to counter the weight of the cameraman and his equipment.

Progress is a little slow at the moment on the renewal of the track at the Jocks Lane site of **Bracknell & District MES**. However, with the confirmation that they



The BBC film crew at Pinewood MRS

The New Pinewood Express – Pinewood MRS
Photo: John Keane

are to host the Autumn Southern Federation Rally on the **20th September** (**Open Day, 21st September**), plans are in place to speed things up and make the event a success. A slight change is required to the signals to protect the unloading area. This will be a stand-alone signal, as it is not intended to fully operate the signalling system during the event thus enabling visitors a unimpeded run.

Those who may be holidaying in the Isle of Wight towards the end of the Summer season may like to know that the Isle of Wight MES will be holding their Biennial Exhibition at the Riverside Centre, Newport Quay, 20th/21st September - and it's FREE!

FINE CUT

Norman Godfrey

"I do not lay claim to inventing this, just handing it on"

Like many, I'm sure, I find difficulty with ageing eye sight and finger dexterity in applying a very fine cut (say one thou.) on the lathes cross slide, particularly so on small lathes where the screw feed calibrated dial is small and the graduations even more so. One easy remedy is to set the tool post holder slide way over to six degrees, and then use its screw feed to apply the cut. One thou. on its dial now equates to .0001" on the radius of the work. (Three degrees will give it on the diameter!)

Now on the tool post holder dial you can use ten graduations (much easier to see) which will only move the tool into the work by one thou. All down to trigonometry! (To be absolutely correct the angle is 5.771 deg.)

Two points to remember though, on working to these close tolerances is that the tool is sharp, and set to the correct height, and depending whether you are turning the out side diameter or the bore will effect whether you apply a positive or negative angle.

Vectimod - Isle of Wight MES

uring the last few months' members of The Committee at Bedford MES. have been making plans to celebrate the 40th Anniversary of the Society. It is a long held belief that it was formed in 1968. However, as preparations were also in train to launch a new web site one member volunteered to ask the oldest surviving members about their memories of the early years. It transpires that, in fact, the club was founded in 1948, started off with some enthusiasm, then joined forces with Bedford Model Boat Club, until 1968. There is a belief, that there was also a prewar club, founded in the mid 1930's, which was dissolved at the outbreak of war as members left to join the fighting services.

However, this revelation has set one member, Steve Lee something of a challenge. He is the organising brain behind their annual Miniature Traction Engine Rally, and following on from the damp squib of 2007, when they were washed out. Steve has set himself the task of organising 40 engines to take part in 2008, as part of the celebrations.

Of course he has risen to the challenge and would like to extend, on behalf of the Society an invitation to miniature traction engine owners of all sizes to come along over the weekend of the late Spring Bank Holiday, **24th** –**26th May**, to take part. All engines, from the humble Mamod or Wilesco types upward, are welcome; there may even be a couple of full-size engines in attendance.

There are caravan spaces, with hook-up if needed, plenty of car parking, excellent refreshments, coal, etc. on site plus three railway tracks ranging from 2¹/₂" to 7¹/₄" gauges, giving the ingredients for a good weekend. For further details, Steve can be reached on 07952 529460 most evenings.

Ickenham & District SME intends to celebrate the 60th anniversary of the founding of the club (8th October 1948). Their engine shed has seen a recent upgrade to its facilities. All the services have been moved into the roof from their previous position below each steaming bay road. Each steaming bay now has above it, a run of two parallel bus bars supplying 12V



Photo: Patrick Rolin

power for blowers. Parallel to this is a water pipe which has hose outlets at regular intervals along its length. A compressed air line has also been installed in the roof.

The other recent big change in the engine shed is a lockable battery charging, for the many battery-electric locomotives that now regularly appear at IDSME running days,

Undertaking research for his next project John Dean, writing in the journal of the Chichester & District SME, tells us that "the next step was to see if I could locate a set of original works drawings that I could have copied." An approach to the National Railway Museum has revealed that the locomotive he is interested in, a Stroudley G class Single, was never listed on the OPC microfilm catalogue which was always a good source for drawings. The NRM has the OPC drawings as well as many of the best

collections of photographs that were previously available from other now defunct sources. He is informed that the remainder of the NRM's extensive drawing collection is in deep storage awaiting archiving and that they will be able to confirm whether the G class drawings exist in February 2008. The NRM received a generous Lottery Grant which is being put to good use by making the entire collection of items available on a searchable database which will make research a lot easier, a new library/research facility has also been built for personal callers where a much greater selection of items will be available. (This new facility, opening 1st March, is known as the Search Engine project and will transform the way the NRM cares for its huge hidden collections and change the way they are made available for hands-on public access. Cataloguing and digitising the archives is beyond the scope of this current project.-Ed) See www.nrm.org.uk/research/index.asp

Apprentice members, Russell, Jamie, Edward, Robert, Matthew, Dean, Sarah, Becky, Jack and Ryan, of the **Chingford & District MEC** with the help of a few experienced members of the club, have been, over the last two years, refurbishing the club's 7¹/4" gauge shunter. As well as the shunter itself, the driving trolley has also been rebuilt, lengthening it in the process, to allow it to sit two people and accommodate a vacuum pump under the seat.

LINE MARKING

When one comes to marking out lines on a piece of 'black' mild steel, try rubbing ordinary blackboard chalk over the scribed lines and see how they show up.

Newsletter - Romney Marsh MES

The S & T Department of **Sutton MEC** report recent developments in technology have resulted in very bright LED's being available which are now being used on motor vehicles, traffic lights and railway signals. They have the advantage of very long life, low current consumption and extreme brightness without the use of reflectors. In order to keep abreast of these modern developments the S& T Dept has been experimenting with and is now installing LED's in the ground level signals. Ever since their first installation, filament illuminated signals on the ground level track have not really been bright enough in the brilliant sunshine and may contribute to the occasional SPADS (signals passed at danger) that occur as drivers dreamily pass them by. There can now be no excuse. The new aspects are very bright and can be easily seen in strong sunlight. They also have the advantage of being self-coloured and appear black when extinguished thus avoiding confusion caused by reflection from coloured lenses.

However, the new aspects are more directional than the old and need careful sighting when being set out, to make sure the beam is in the driver's line of sight.

SOUTHERN SHORTS

Harlington LS celebrated its 60th anniversary in August last year.

Rebuilding of the clubhouse at **Guildford MES** is well under way. Please note the dates of this year's Guildford Rally and Exhibition, **12th/13th July**.

WALES & THE SOUTH WEST



uernsey MES have recently acquired nearly 2000 feet of 10¹/4" and 7¹/4" dual gauge track which is now in storage pending negotiations for it to be laid down at a garden centre on the Island. On 16th September 2007 the Society, supported by various other modelling clubs, successfully celebrated its 20th birthday with a massive display of model engineering and model making.

Well, they did it! They had a complete raised track circuit by the time Santa visited the Ashton tracksite of

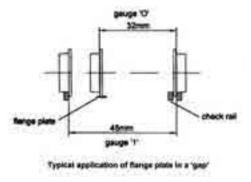
Bristol SMEE on 2nd of December. About twenty new sections of track and they had only twelve working days to do it in and whilst that may sound ample to lay twenty sections it was finished with only one spare day. Since then, they have started to lift track and the target, by the start of the running season, is to lay 34 new 10-foot panels of track. This session will see a switch in sleeper material. For some time now, members have expressed concern about the state of the new wooden sleepers, so they are going for plastic. Enough material has been delivered to make 960 raised track

sleepers. Colin MacEke and his team have sawn eighty 10-feet lengths of black recycled plastic of the correct section for sleepers into ten-inch lengths. For two Friday mornings the three of them were employed in a scene that reminded one of the dehumanisation of man by the introduction of production line techniques. Talk about boredom and dedication to the cause! Three cheers for the Black Sleeper Sawing Section!

The new tracksite of Newton Abbot & District MES has undergone dramatic changes over the last few months. A very large crawler type excavator has been used to landscape much of the area, moving spoil and, in places, raising the ground levels. Meanwhile, the old track at Sandringham Park has started to be dismantled for scrap, although certain items, such as the traverser and steaming bays, will be renovated and installed at the new site.

The committee of **Plymouth MS** have **L** unanimously supported the continued use of the CFE (City College Plymouth), particularly when this year the fees have been doubled and the club has to fund the entire academic year in advance. As the workshop evening has been well supported in 2006 and 2007costs and expenditure should break even. The message is "use it or lose it". This year at least three builders have completed locomotives, Alan Smith and his 71/4" guage Locomotion which was awarded a Highly Commended at the Midlands Exhibition, Peter Lamberton with his 5" gauge Loch, was awarded a Bronze medal and the Bill Deane Memorial Trophy at September's MEX. John Briggs has also completed his very nice Sweet Pea.

Young Rhys Sully, winner of the Southern Federation Annual Award 2007 and a member of Cardiff MES, has been hard at work constructing a dual Gauge 1/'O' gauge track. Problems arose when creating a dual gauge set of points for the 'O' gauge wheels had a tendency to drop into the gap. All was solved by the use of check rails and flange plates for the 'O' gauge rails.



As 2007 is now consigned to history, the Cyfarthfa Park Miniature Railway of Merthyr Tydfil and District MES had half the visitors as in previous years. This was partly due to halving running dates, to every other week; the other contributing factor being bad weather! A new club steam locomotive funded by the Heritage Lottery Fund was finally assembled in late September, but the inclement weather since has prevented the locomotive from being tested on the track.

Midway through the year an approach was received by another park in an adjoining borough, with a view to moving the Society's track to another venue. Unfortunately to date, the funding has been unavailable for the project. Nevertheless, an approach was received in early December for resiting in Cyfarthfa Park with enough land for a clubhouse, and raised and ground

CLACK (CHECK) VALVES - Peter Parks

An injector problem can often be caused by a clack valve fault. Many commercial clack valves leave something to be desired. I have seen some where it is possible for the ball to disappear down the outlet passage, some where the ball lift is incorrect and some even with neoprene balls.

There are two distinct situations here. The first is designing one to make yourself and the second is dealing with an existing clack valve, which is suspect.

Let us take the first and design a valve, which may be used with an injector, a hand pump or an axle driven pump but not a mechanical lubricator (we will deal with that as a separate issue). The first thing to do is to determine the size of the pipes, as this will dictate the minimum sizes of all of the major parts of the valve. The pipe size may be determined by the outlet from the injector or pump.

The ports both in and out of the valve must be the same size or greater than the inside diameter of the pipe so that the valve ports can pass the same flow as the pipes. This then sets the ball diameter which should be as near as you can get to 1.4 times the size of the port in order that it meets the edge of its seat at a tangent of 45 degrees. The size of the ball determines the minimum diameter of the chamber which should be equal to or greater than the cross sectional area of the ball plus the cross sectional area of the pipe. The internal thread for the cap must be borne in mind here, as a standard M.E. thread of either 32 or 40TPI will be needed.

Next, the position of the outlet port must be considered, because it must be in such a position that the ball cannot roll sideways and disappear down the outlet and thus into the boiler never to be seen again! This position is ideally such that the centre line of the ball is no higher than the bottom of the outlet port when the ball is at its maximum lift.

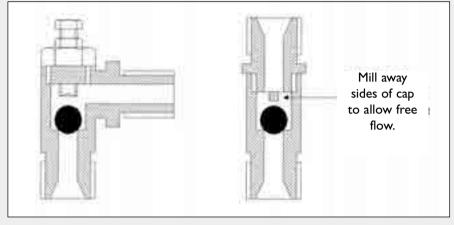
Now here we get into a very grey area, how may the maximum lift of the ball be determined? Opinions differ even amongst the most experienced of model engineers. LBSC often said ¹/₃₂", Martin Evans followed suit and Keith Wilson says ¹/₃₂" for a hand pump and more for an injector. I am sure others have their opinions based on both theory and practice. I think that the best way forward is to make an adjustable end cap with screw and lock nut, so that the screw can be adjusted up and down over a range of approx ¹/₃₂" to ³/₃₂" and bearing in mind that at the maximum lift the ball must not go down the outlet. Then the screw can be adjusted for height whilst in use and when the height has been determined a permanent cap can be made and fitted and the adjustable one kept for further use. Make sure when making both caps that the bottom end of the thread does not obstruct the outlet port. The adjustable cap as above can be used to confirm or otherwise the correct working of an existing clack valve It is worth noting here that if a 40TPI thread is used, one complete turn alters the height by .025". Similarly with a 32TPI thread the height alters by .031" per turn. The end of the cap should have a light countersink to settle the ball after it has lifted to stop it 'hovering' or 'chattering', which might cause an injector to splutter.

The above is relevant to a 90-degree valve. All of it applies to an in line clack valve apart from the end cap. Here please do not slavishly follow LBSC and place a cross pin above the ball. It is a source of leaks and future trouble. Probably the best way of dealing with this is to drill the cap straight through and then mill away the sides of the end as per the drawing.

Next comes the problem of where in the injector system to place the clack valve and is one or two needed in line? Here again there are differing opinions. LBSC and many of those who followed placed a 90degree clack next to the injector. Other designers use one at the entry point on the boiler with the outlet pipe from the injector going straight to this clack. Others use two clacks one by the injector and one at the entry point. Many drawings avoid the issue. So why no fit two and try it and see what happens? If it works fine, if not remove the ball from one of the clacks and try again. I know of a $7^{1/4}$ " gauge King where the injectors work best with the second ball removed. I will be most interested to get feed back on this aspect of the subject because little has been written about it and

it really needs exploring in depth. With a hand or axle driven pump there are two valves, one in the end of the pump and one at the inlet point on the boiler.

Finally we come to a clack valve to be used with a mechanical lubricator. Here because of the viscosity of steam oil, a spring is needed to close the ball otherwise the above applies. It need only be a light spring and should be made from stainless steel or phosphor bronze wire.



NADMES News - Newton Abbot & District MES

level track. They are currently in the early planning phase with the local authority, to enable these proposals become a reality. Meanwhile, the Vice-Chairman is spending all his spare time on building his 5" gauge *Big Boy*. It is believed that he'll be the only model engineer (5") with a low loader! The Society has recently setup up its own website, *(see p9)* to further the name of the Society and to attract new members.

The 'Garratt 50' gala at the Welsh Highland Railway celebrates the 50th anniversary since the last Garratts were produced by Beyer Peacock in 1958. However, it also celebrates the 50 years of Beyer Peacock Garratt production, as in 1908 the Garratt patent was created. The event will take place in Dinas Station yard on the Welsh Highland Railway in North Wales on the 5th-7th September.

They are trying to invite as many model engineers as they can, to spread the word to anyone who has created a Garratt type loco in $2^{1/2}$ " gauge upwards, to show as many examples of the loco type as possible.

The aim is to have assembled for the show. 50 Garratt models in sizes from their own 2' gauge examples running on their 13 mile railway, down to probably Gauge 1, but with as many of the larger items on show as is possible. As an example of their quest, in Model Engineer 3253, 15 July 1964, Mr A W G Tucker is mentioned twice as having built two Garratts a 2-6-2+2-6-2 in 21/2" gauge and his Championship Cup and Duke of Edinburgh Trophy winning 2-8-0+0-8-2 loco Samuel Jackson. Does anyone know where these beautifully engineered models are, or how the WHR can make contact with the present owners? Contact Dave Kent, Tel: 01766 890452



GUIDANCE FOR THE WORKSHOP

You only need two tools in life – WD40 and Duct Tape
If it doesn't move and should, use WD40.
If it shouldn't move and does, use duct tape.

If you can't fix it with a hammer, you've got an electrical problem.

The Newsletter - Bristol SMEE

EVENTS DIARY 2008

1/2 Liskeard MS — Annual Exhibition 8 FEDERATION ANNUAL GENERAL MEETING — Kidderminster Railway Museum — Severn Valley Railway 24 Northampton SME — Easter Monday Running Day APRIL 5/6 Taunton MES — Exhibition — Heathfield School, Monkton Heathfield, Taunton 19/20 Southampton SME — Open Weekend 20 Isle of Wight MES — Annual Rally	
- Kidderminster Railway Museum - Severn Valley Railway 24 Northampton SME - Easter Monday Running Day APRIL 5/6 Taunton MES - Exhibition - Heathfield School, Monkton Heathfield, Taunton 19/20 Southampton SME - Open Weekend	
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APRIL 5/6 Taunton MES – Exhibition – Heathfield School, Monkton Heathfield, Taunton 19/20 Southampton SME – Open Weekend	
5/6 Taunton MES – Exhibition – Heathfield School, Monkton Heathfield, Taunton 19/20 Southampton SME – Open Weekend	
19/20 Southampton SME – Open Weekend	
20 Isle of Wight MES — Annual Bally	
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26/27 Model Engineering Exhibition – <i>Milestones Museum*</i>	
26/27 Worthing & District SME – Worthing 2008 Model Scene Exhibition	
MAY	
National 21/2" Gauge Association — Locomotive Rally at Romney Marsh MES	
Welling & District MES – Spring Open Day – G1, 31/2"g & 5"g	
9-11 Model Engineering Exhibition — <i>Harrogate Showground*</i>	
17 FEDERATION SPRING RALLY — Vale of Aylesbury Model Engineering Society*	
18 Vale of Aylesbury MES – Southern Federation Host Society Open Day*	
17/18 Woking MR – Visiting Loco Weekend – 71/4" gauge only	
17/18 Merstham Model Steam Show	
17/18 Chesterfield & District MES — Open Weekend	
24-26 Bedford MES – 40th Anniversary Traction Engine Rally	
25 Harlington LS – <i>Charity Open Day</i>	
26 Northampton SME – Bank Holiday Running Day	
31 National 21/2" Gauge Association — Locomotive Rally at Worthing & District SMI	Ε
31/June 1 Vale of Aylesbury MES — <i>Traction Engine Rally.*</i>	
31/June 1 Peterborough SME — <i>Loco Rally</i>	
JUNE	
1 City of Sunderland MES - Open Day	
7 Amnerfield MR – <i>Diesel & Electric Open Day</i>	
8 National 21/2" Gauge Association — Locomotive Rally at Rugby MES	
7/8 Sweet Pea Rally — City of Oxford SME	
7/8 Cardiff MES – 18th Welsh Locomotive Rally	

14	Harlington LS — Visiting Clubs Day	
14/15	North Wiltshire MES – Rally Weekend	
14/15	Harrow & Wembley SME — Open Weekend— Miniature traction engines welcome	
14/15	Rochdale SMEE — Narrow Gauge IMLEC	
15	Saffron Walden & District SME — Open Day Rally & BBQ	
21/22	Bournemouth & District SME – Annual Open Weekend	
22	National 21/2" Gauge Association — Locomotive Rally at South Cheshire SME	
28/29	MSRVS Traction Engine Rally – <i>Tewkesbury**</i>	
28	Amnerfield MR – Steam Open Day	
JULY		
12/13	Guildford MES – Traction Engine Rally and Exhibition*	
19/20	Peterborough SME – Sacrewell Miniature Traction Engine Rally and Gathering.	
19/20	Catch Me Who Can Celebrations – Bridgenorth Severn Park	
19/20	North Wiltshire MES – <i>Charity Weekend</i>	
18/19	Canvey Railway & MEC – Long Weekend Open Days	
20	Canvey Railway & MEC - Long Weekend Model Exhibition & Open Day	
25-27	Chichester & District SME – Birthday Celebration Weekend	
26/27	City of Oxford SME – Dreaming Spires Rally	
26/27	Kinver & West Midlands SME – Open Week End and Exhibition	
AUGUST		
2	Maxitrak Owners Club – MOC Rally – Surrey SME	
3	National 21/2" Gauge Association — Locomotive Rally at Sutton Coldfield MES	
9/10	Leeds SMEE – August Rally	
15-17	Bristol Model Engineering Exhibition — <i>Thornbury Leisure Centre**</i>	
16	National 21/2" Gauge Association — <i>Locomotive Rally at Fylde SME</i>	
16/17	Burnley & Pendle MRS — <i>Open Weekend</i> — 71/4" gauge only	
23-25	Harrow & Wembley SME – Open Weekend– Miniature traction engines welcome	
25	Northampton SME – Bank Holiday Running Day	
SEPTEMBER		
5-7	Garratt 50 — Welsh Highland Railway	
5-7 6/7	Chesterfield & District MES — Open Weekend	
7	City of Sunderland MES - Open Day	
13/14	Birmingham SME — <i>National Locomotive Rally</i>	
14	Saffron Walden & District SME — Open Day Rally & BBQ	
14	Harlington LS — Exhibition Day	
19-21	Model Engineer Exhibition – Ascot Racecourse	
20	FEDERATION AUTUMN RALLY — Bracknell Railway Society*	
20/21	Isle of Wight MES — Biennial Exhibition	
21	Bracknell Railway Society – <i>Southern Federation Host Society Open Day</i> *	
21	Northampton SME — Steam Up	
27	National 2 ¹ / ₂ " Gauge Association – <i>Locomotive Rally at Surrey SME</i>	
OCTOBER	Tradicital 2 /2 daugo ricocoladion 2000 metro many at ouritry civil	
4	Welling & District MES – Autumn Open Day – G1, 31/2"q & 5"q	
5	National 21/2" Gauge Association — <i>Locomotive Rally at Chesterfield & District MES</i>	
19	Northampton SME — Steam Up	
17-21	Midlands Model Engineer Exhibition – Warwickshire Exhibition Centre**	
* The Federation Sales stand will be in attendance ** Sales stand will be in attendance subject to receiving an invitation		

^{*}The Federation Sales stand will be in attendance ** Sales stand will be in attendance subject to receiving an invitation
When visiting other clubs/societies please let the hosts know you are coming, as it helps with catering and planning the event.



ABOVE: Displayed on the Ickenham & District SME stand at Alexandra Palace, the picture of the Large Radius Milling Attachment, by Peter Pardington, is almost self-explanatory. The 8" radius of the expansion link would require a far larger rotary table than was available. This ingenious device permits far better control, minimising backlash from the worm wheel.

