

HISTELEC NEWS !

NEWSLETTER OF THE SOUTH WESTERN ELECTRICITY HISTORICAL SOCIETY

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HAPPY CHRISTMAS & CHEERS TO THE NEW MILLENNIUM

Best of luck to everyone, the Committee hope that everyone will have a super time during the coming festivities.

ANNUAL LUNCHEON

This annual event, so successfully organised last year, is arranged again by our Chairman, Barrie Phillips. This time it is to be at Tiverton. What surprises has Barrie got up his sleeve? See attached notice for further details. Get cracking and return your form for the 29th January 2000.

THOUGHTS ON THE MILLENNIUM

With much talk about what or who has been the greatest personality happening etc of the Millennium. It is interesting to contemplate, from an industrial archaeological perspective, who or what has been the greatest inventor/invention of the industrial revolution? For example I would suggest Michael Faraday with his electro-magnetic induction. Disagree or agree?

If you have any thoughts on this, please send them to me. Peter Lamb (address elsewhere) and they will be published in the Spring Histelec News. Try to nominate a technical/scientific invention from the past 1000 years. If we have a big enough response, I could put them to the Committee for a decision on priority order and the top nomination will receive a prize of a bottle of bubbly. Closing date will be at the Annual Luncheon 29th January.

WEEKEND AWAY

We have had requests for another weekend away even year! Other comments have opined that it will be difficult to match Ironbridge any-where-else.

The Committee has considered both the many requests and the ideas nominated for year 2001. Firstly they have decided to seek for a one night stay at Lynmouth next year 24th/25th June. Secondly the results from the rough ballot at Ironbridge for the year 2001 showed a strong preference for Northwest Wales, staying around Portmadoc to see Portmerion/Dinorwic Pumped Storage/Ffestiniog Railway & Machynlleth Energy Centre.

PLYMOUTH ELECTRICITY CENTENARY

You will all have read with interest member Ted Luscombe's excellent supplement to our August Histelec News, celebrating the Centenary of Plymouth first public supply of electricity.

Ted also presented the paper at a lunchtime lecture at the Plymouth Museum & Art Gallery on Tuesday 22nd September (close to the actual anniversary), to an appreciative audience of some 40 people, including a significant number of fellow members of the Society from Devon and Cornwall.

With the co-operation of the Plymouth Central Library and the assistance of Alan and Rita Hooper, Ted mounted an excellent display in the Library foyer charting the early days of electricity supply in Plymouth, Devonport and Stonehouse (the three original towns). BBC Radio Devon covered these SWEHS promoted events, carrying a very comprehensive report on "Good Morning Devon" on the centenary day the 23rd September and an interview with Ted during their afternoon broadcast.

Many thanks to Ted Luscombe for all the preparation and for his tenacity in ensuring, that this important centenary in electricity supply was properly celebrated.

Barrie Phillips

WHAT IS HAPPENING TO SWEB

Most of you will know that South Western Electricity pic have sold the Supply Business and the title "SWEB" to EDF via London Electricity. The Distribution Business **will** now be called "Western Power Distribution" WPD. This means that the Distribution Business will have a new newsletter called "Power Lines".

Your Secretary and Treasurer have already had a meeting **with** the head of PR for WPD, Sarah Bullock, and Helen Whittall, the existing PR. who **will** work for LEB with the SWEB title. The WPD Head Office is moving on the 20th December to Feeder Road into offices converted from the old Stores Building. How jolly confusing it all is!!

IRONBRIDGE REVIEW

The weekend away in October was a huge success, not least of all because the weather was excellent. The talk by the Deputy Director, David de Haan on the Friday evening was very interesting and stimulating. Also the Saturday evening singing entertainment by the hotel staff member, Sabina Smith was excellent.

The Secretary would like to thank those, who sent him a thank you letter, they were much appreciated.

John Haynes has written the following whimsical appreciation :-Impressions of Ironbridge

The 46 members and guests who took part in the Ironbridge Weekend had a superb time. The Madeley Court Hotel was excellent and full of history. It was also full of steep stairs and low beams! The weather needed to be good, bearing in mind that many of the exhibits involved a lot of outdoor walking, and it turned up trumps (sunny and warm). I hardly need to say that the company was friendly, as we have all met many times before and have become one large happy family! I will not go into detail of what we saw at the various museums, which were spread over 6 sq. miles. Those who went on the weekend experienced them at first hand and no doubt have souvenirs, booklets and photos as reminders. Those of you who missed the weekend really need to put Ironbridge on your list of 'places to visit', as I could not begin to relate all that we saw and did during our time there. The only thing that we missed, due to lack of time, was the quiz that Peter & Valerie Lamb had prepared for Saturday evening. As I know many were disappointed, (*really? Ed.*)

I decided to compile a '20 Questions' quiz of my own, as a compensation for what you missed.

Ironbridge Weekend Quiz.

1. How many cars got lost on the way to the Madeley Court Hotel?
2. How many people 'dropped off waiting for breakfast on the first morning?
3. Who was worried that he would bump his head on the low beams during the night?
4. Who was short of a shower-rose and had to change rooms?
5. Who moved rooms to the honeymoon suite?
6. Who left who abandoned in the Coalport China car park?
7. Who offered to go back to Cornwall with John Ferrier?
8. Who was summoned to the 'beaks' office"
9. Who refused to stand on top of the sundial?
10. Who was the last person to get his sweet on Saturday night?
11. How did his table-mates alert the waiter to this omission?
12. How many colours of 'hard-hats' were available at the Tar Tunnel?

13. How many people got extra marks for John Concybcare's quiz, by reading the backs of the pictures?

14. Who had hysterics at dinner on Saturday night?

15. Who doesn't know the Beatles were a 'pop' group?

16. What colour was the PVC sheeting over the scaffolding on the Iron bridge?

17. Who claims he had a glass of champers with the Friday wedding party?

18. Who rode on the footplate of Richard Trevithick's (replica) steam locomotive?

19. How many cameras were used for the group photograph?

20. Is 'Brie on Grid' a toasted cheese speciality?

I hope you have enjoyed this little quiz. Answers will be found elsewhere in this edition of Histelec News.

John Haynes

MEMBER'S NEWS

Diane Gale was interviewed recently by the Bristol Evening Post at Temple Meads Station about her views on train safety.

Peter Lamb has been at last to Craggside, Northumberland reputed to be the first house to have electric lighting in 1878. It was the home of Sir William Armstrong, the well-known arms manufacturer, friend of Joseph Swan.

ARCHIVAL ACTIVITY

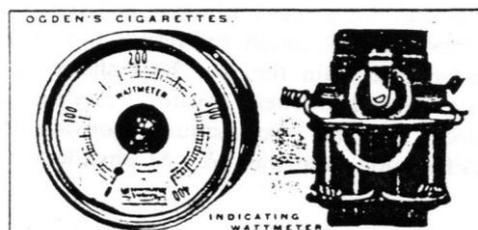
The Widecombe Film in video form was in demand again, this time The IEE requested its use at a Weekend Seminar at a Bristol University Halls of Residence in Stoke Bishop in July. The Seminar was entitled "History of Electrical Engineering".

CIGARETTE CARD CORNER No.4

John Haynes has a series of interesting old cigarette cards. Here is the first of the 1928 series no. 10 "Ogden's Applied Electricity", with the following reverse script :-

THE INDICATING WATTMETER

In the alternating current system, the current and voltage attain a maximum in one direction, fall to zero and obtain a maximum in the other direction generally at 50 times a second. They do not however rise to the maximum at the same instant. Therefore a wattmeter is necessary to measure the flow of power. This is done by a small copper drum, which is caused to rotate between its poles by an electro-magnet excited by two currents, the one proportional to the amperes and the other to the volts. (Now *you* know - *Ed.*)



BATTLE OF TRAFALGAR

Around twenty Five members and friends attended the splendid interactive talk given by John Dike on the Battle of Trafalgar at Sowton on Saturday 25th September. The talk was preceded by a lunch at the Blue Ball Inn nearby.

It was clear from the outset that this talk was to be slightly different from normal as John Dike intended it to involve his audience to the full. The character parts were assigned to various members. Peter Lamb became Nelson; Paul Hulbert, Hardy; Barrie Phillips, Pasco and Brian Grimshaw was Napoleon with a dreadful German accent!!!!. Other members played the parts of Powder Monkeys, Sailors, Boson, Officer of the Watch etc. The atmosphere of the Battle was enhanced by enthusiastic bugling and drumming throughout the proceedings.

John took us through the events leading up to the battle, _ where Nelson had blockaded Cadiz with his fleet; this allowed Nelson to carry on with his training manoeuvres at sea, while the Spanish and French fleet under Admiral Villeneuve were unable to do the same as they were stranded in port.

On October 20th. 1805 Villeneuve brought his combined fleet out of the port of Cadiz, but he was having trouble keeping his fleet in line due to his captains' lack of practice sailing together. Nelson decided to split the English fleet into two divisions and carry out a flank attack on the French column of ships, but allowing the front third to sail on, concentrating his attack on the remaining two thirds of the French/Spanish ships. The idea being that it would take over an hour for the leading enemy ships to turn around to rejoin the action.

Nelson, aboard the 104 gun Victory was leading the English attack but was primarily seeking out the French ,, Admiral aboard the Bucentaure. As the battle raged, ships were fighting at very close quarters, cannon to cannon with the resulting carnage on both sides. With Nelson's victory in sight the English Admiral died in the arms of Hardy just after uttering the immortal words "kiss me Hardy". John considered that the English victory was due, in part, to the lack of training of the French seamen as they had been cooped up in port too long. Also Nelson had had some luck with the battle tactics he had decided upon.

John's whole talk was accompanied by music, spoken audio, slides, sound effects, cannon fire and audience participation. We all came away with a much clearer understanding of this great sea battle. If only we could teach history in our schools in a similar manner!!!!

Our thanks go to John Dike for a splendid afternoon's entertainment. *Brian Grimshaw*

A TOWN CALLED ALICE

For many, a holiday to Australia will include a trip to the Red Centre to visit the Uluru Kata Tjuta National Park (Avers Rock/The Olgas) and Kings Canyon. This can be an exhausting experience, up at 4am to be on a bus at 5 to see sunrise over Uluru at 6. Up again the next day at the same time to get the bus to Kings Canyon to do the rim walk before mid-day and before it gets too hot (40 deg C)! Most trips end up at Alice Springs, where the weary traveller can at last get a good-night's sleep.

If you ever go, it's worth extending your stay in Alice Springs by a day or so. as there is a lot to see and do. A trip out to the West MacDonnell Ranges is well worth while, as is the Royal Flying Doctor Service. "The Alice" is not as you might imagine from "the film", it is in fact a very modern town with shopping malls, good hotels and restaurants. The original Alice Springs is a few miles up the road and is the site of the old Telegraph Repeater Station, which is now a museum. If you're lucky you might even see some water in the spring.

The newly emerging nation of Australia of last century was very remote from the UK and a letter could take several months to travel almost halfway round the world. There was therefore a great need to improve communications with Europe and the technology of that day was the telegraph using Morse Code. Telegraph cables had been laid as far as Singapore and these were extended to Darwin by the 1860s. What was needed now was a connection to the south of Australia -Adelaide, where there were connections to Melbourne and on to Sydney. Sir Charles Todd the Postmaster General of South Australia, decided to make an overhead connection from Adelaide to Darwin, a distance of about 1,500 miles. The route was surveyed and constructed in less than two years and completed in 1872, an amazing achievement considering the conditions. A series of repeater stations were set up along the route and Alice Springs was one of them, the local waterhole being named after the wife of Sir Charles.

The telegraph line was a single wire with earth return erected on poles. The first poles were very attractive to termites and were soon replaced by a harder wood. These turned out to make very good firewood for the Aboriginal people and so the third set of poles were made of iron - 37,000 in total. The Telegraph Station has been restored as it was between 1895 and 1905. The Station Master was a man of great importance. Not only was he in charge of the largest Station on the telegraph line, but he ran the region's Post Office and was the government official responsible for Central Australian Aborigines. As the only magistrate in Central Australia, he held court at the Station; he sold rations to travellers and even acted as an emergency doctor, with instructions telegraphed from Adelaide! No flying doctor in those days!

ALICE continued

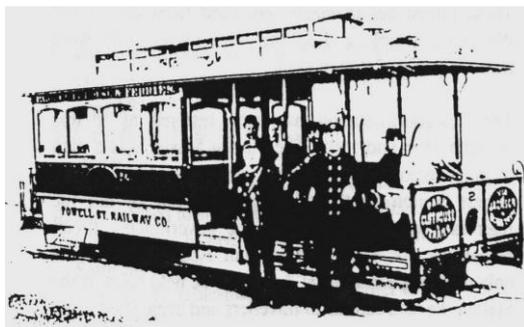
The Telegraph Office was the heart of the Station and it never stopped beating. It was constantly manned to allow for the time differences between Australia and overseas, and, most importantly, to boost the Morse Code signals, so that they were carried at full strength over the great distance of the Telegraph line. Before repeating instruments were developed, the work was carried out by two men, one taking down the Morse Code message, as it came in and the other re-transmitting the message to the next station. The message would be repeated many times on its journey from Sydney to London. The battery room provided the power for the Alice Springs section of the Telegraph line. Each battery consisted of 80 electrically-linked fluid-filled jars, which covered a quarter of the Power House floor area. As well as the battery on duty, another was kept on standby, while a third was being recharged. And because this system had to be kept in perfect working order 24 hours a day, all staff learned how to maintain the batteries. Eventually technology improved and the Telegraph line became redundant and closed in 1932 - I wonder what those old Telegraph Operators would have thought of e-mail?

David Hutton

CALIFORNIA -there I went

For industrial archaeology, one wouldn't think of going to the USA, but I was surprised at the diversity of interest in the West Coast Territory, when I visited there in June this year.

In San Fransisco I was amazed to find the cable cars, which still operate up and down the steep streets of that City after 126 years. The cars were first commissioned on 1st September 1873. The system was designed by a Briton, Andrew Hallidie, born of Scottish parents in London in 1836. The system is quite extra-ordinary with moving cables running in ducts under the road. In the early days the cables were powered from centrally situated steam engines, and today electric motors. The clever invention was the gripping device, which enables the cars to grip and ungrasp the moving cable. At the old power house is now situated a very interesting museum, where you can see the motors and the four cables leaving and entering the building below ground.



An Early San Francisco Tramcar

I was fascinated equally by the Hoover Dam, which was the largest dam, being 726 feet high, to be constructed at that time between 1931-1935. The main reason for its construction was the control of the River Colorado to provide water to thirteen Southern Californian Cities, including Los Angeles. A secondary reason was the harnessing of the river for producing electricity. The massive dam and power-house is still spectacular to this day even after 64 years. **Peter Lamb**

TREVITHICK'S STEAM LOCO at Blists Hill, Ironbridge

(Some notes of visit on Sun. 17th Oct '99)

David Peacock and myself visited the site at 4.30 pm to see the loco in steam. We had been at Blists Hill the day before, but the loco had been covered up and not in action. David and I got talking to the engine driver (Alan), who was a great Trevithick enthusiast. When we said we were from the SWEHS, he told us that he had spoken to several of our members earlier in the day. He said that he was a retired electrician and that it was odd that electrical people should be so interested in a loco, which did not have one electrical wire in it!

As it was late afternoon, the boiler pressure had dropped to below 30 psi. Its normal running pressure is 50 psi. However, in view of our interest the driver said that he could make one last run up and back along the 50 yards of track. He offered us a foot-plate ride, but there was only room for one person with him on the engine. Therefore I rode along the track going forward and David Peacock took my place for the return trip. As it was then time for the loco to be 'put to bed', we watched as the driver dropped the fire and wedged open the pressure valves on top of the boiler to reduce the steam pressure to zero. While chatting to the driver we learned that this was not a copy of the loco ('Penydaren') that was involved in the wager of 500 guineas in South Wales in 1804. The Blists Hill loco was only about 3/4 the size of 'Penydaren' and of a slightly different track gauge. It had been the first of the two to be built and had been put together in the Coalbrook Valley using cast iron produced in the local blast furnaces. The steam cylinders at that time were only used at 30 psi, but Captain Dick (as Richard Trevithick was known) wanted 50 psi. He therefore did some experiments at Coalbrookdale, and took the pressure up to 150 psi. He was on his own in the workshop, when he carried out this test!

We were told that the original engine took about 4 months to build. The replica was built at a cost of £17,000 by GKN-Sankey apprentices and took 14 months to complete, even with modern machinery. The boiler on the replica is a modern design, so as to pass the insurance inspection for safety, but the rest of the loco is true to the original. The replica is about 10 years old. Incidentally, the owner of the Ironworks in South Wales, who made the bet, did not want to pay up as the bet represented £500,000 in today's money.

Trevithick's Loco continued

that Trevithick's loco could not pull 50 tons along a 10 mile cast iron track. Not only did the loco accomplish this, but also there were about 70 men sitting as well as the freight). He took several months to pay, and was forced to do so, to save loss of face, since the bet had been made in public.

John Haynes

AMBERLEY CHALK PIT MUSEUM, W. SUSSEX

Are you aware that the Seeboard Electricity Museum, known as the Milne Collection, has moved from Tonbridge to the Amberley Museum, Arundel? It was assembled in the 60's and 70's with the full support of the then Chairman of Seeboard Archie Milne, who was at one time an officer of SWEB.

The Collection is in a hanger type building and is dedicated to education. The current curator says "it is not a glass-case museum, but one that is hands-on, illuminating the evolution of science and engineering, whilst at the same time preserving important exhibits from our industrial heritage".

ANSWERS TO IRONBRIDGE QUIZ

1. Seven or eight
2. I don't know, I was one of those asleep
3. David Hutton
4. Peter & Cynthia Body
5. Mike & June Hield
6. David & Pat Hutton abandoned John & Ellie
7. Pat, the pianist
8. Peter Lamb
(the "beak" was the hotel manager - Ed.)
9. Keith Hulbert
10. John Haynes
11. Shouted 'Oi' to the waiter (how rude. Ed.)
12. At least five.
13. The majority of us.
14. Jenny Williams & others who shall be nameless
15. John Haynes
16. Blue and white
17. John Ferrier
18. David Peacock
19. At least twelve
20. No, it's an anagram!

CHRISTMAS CAKE RECIPE

1. Sample the whisky to check for quality
2. Take a large bowl. Check the whisky again. To be sure it is of the highest quality, pour one level cup and drink Repeat. Turn on the electric mixer, beat one cup of butter in a large (fluff) bowl. Add one teaspoon of sugar and beat again.
3. Check the whisky again in case it has deteriorated. Turn off the mixer. Beat two eggs and add to the bowl, chuck in a cup of dried fruit. Mix on the tuner, if the dried fruit gets stuck in the beaters pry loose with a screwdriver.
4. Sample the whisky once more. Next sift two cups of salt or something. Who cares? Now sift the lemon juice and strain the nuts. Add one table . Spoon or sugar or whatever is handy.
5. Grease the oven. Turn the cake tin through 350 degrees. Don't forget to beat up the turner. Throw the bowl out of the window. Check the whisky again and go to bed.

PROGRAMME -put dates in your diary YEAR 2000

Thurs.6th Jan. Bristol Get-together - Lunch 12.15pm
Cambridge Arms, Coldharbour Road

Sat. 29th Jan. ANNUAL LUNCHEON

At 12.30pm Tiverton Hotel. Tiverton with morning visit to Tiverton Castle

Thurs.3rdFeb. Bristol Get-together - 12.15 lunch
Cambridge Arms, Coldharbour Road

Thurs.2nd Mar. Bristol Get-together - 12.15 lunch
Cambridge Arms, Coldharbour Road

Sat. 18th Mar. AGM + Talk "SOMERSET LA."

2.00pm at the Electricity Training Centre, Taunton by Roger Eckersley with lunch at the Merry Monk

Thurs.6th Apr. Bristol Get-together - 12.15 lunch
Cambridge Arms, Coldharbour Road

Sat. 15th Apr. VISIT UNDERFALL YARD,

BRISTOL Old Workshop of Bristol's City Docks with lunch at the Pumhouse Pub beforehand

Thurs 4thMay Bristol Get-together - 12.15 lunch
Cambridge Arms, Coldharbour Road

Sat. 20th May "ISLES OF SCILLY ELECTRIFICATION" TALK BY TWO JOHNNIES

at Exeter - joint talk by John Haynes and John Heath
Thur. 1st Jun. Bristol Get-together 12.15pm lunch
Cambridge Arms, Coldharbour Road

Sun. 25th Jun. VISIT GLEN HYDRO-SCHEME and LYNMOUTH & LYNTON CLIFF RAILWAY

Possibility of one night stay in local hotel
Thur 6th July Bristol Get-together 12.15 lunch
Cambridge Arms, Coldharbour Road

Thur.3rd Aug. Bristol Get-together 12.15 lunch
Cambridge Arms, Coldharbour Road
Thur. 7th Sep. Bristol Get-together 12.15 lunch
Cambridge Arms, Coldharbour Road

Sat. 30th Sept. VISIT HINKLEY NUCLEAR POWER STATION

Including pub lunch at Cannington
Thur.5th Oct. Bristol Get-together 12.15 lunch
Cambridge Arms. Coldharbour Road

NEXT EDITION

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