

60 Years Ago

by John Rogers

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I first saw steam ploughs at work when I was a boy, before the 1914 war. My father was farming some 500 acres in Kent - corn, vegetables, and fruit. His farm had large rectangular fields, ideal for steam ploughing, so the local contractor gave him favourable rates.

My father told me how this contractor, Thos. Wood of Crockenhill, started in business. He was a farm workman and by hard work and thrift, was able to save a little money. He heard that Fowlers were offering to sell their steam ploughing tackle on hire purchase; so he went to see them, with an offer of £50 or so as a down payment on a set. They said this was not enough and suggested that if he could raise double the amount, they would consider it. In due course Wood did raise the required sum and was able to go into business as a ploughing contractor.

Then came the Franco-Prussian war of 1870; this did much damage to the land and Wood was able to get contracts to plough the land damaged in the fighting, which helped him to establish and expand his business. Subsequently he added haulage and threshing to his services; I well remember the visits of the threshing machine, which was driven by belt from a steam traction engine. Hurdles were set up round the stack and as the work went on, dozens of rats and mice came running out and were killed by men and boys with sticks – from one old stack we killed some 140 rats. One rat ran up the inside of my father's trousers; he was able to grip it tightly and kill it before it bit him. I then realised why so many men tied string round their trouser legs.

In those days the only mechanical power on the farm was provided by a gas engine, which my father installed when he took the farm in 1902. Its most important work was to pump water to a tank at the highest point of the farm, about a mile away; this supplied some 10 cottages, the farm house and stables. The engine also drove a chaff cutter and cake crusher and sometimes a circular saw to cut logs for winter fuel. When working on dark winter afternoons, it caused a most unpleasant flickering of the gas lights in the house, which went dim with every suction stroke of the engine. After the 1914 war we got over this trouble by installing electric lighting; the gas engine drove a dynamo which charged batteries to provide 100 volts.

Horses were used to transport produce to London some 20 miles away. The wagon was loaded in the afternoon and set off in the early evening; halfway the carter stopped to water and rest the horses and have a bite himself; then on through the night, getting to Covent Garden in the small hours of the morning. On one occasion the regular carter fell ill and his place was taken at short notice by the farm foreman - who had already done a day's work in the hay field. He was very tired and, not surprisingly, fell asleep during the latter half of the journey and did not waken until he arrived in the market, where the horse had taken him without his guidance. Of course there were no traffic lights in those days and probably not much traffic after midnight.

My father liked horses and was in no hurry to employ tractors; but in 1920 he was persuaded by an American to import a "Fageol" tractor from the USA. It had a Lycoming engine and wheels shaped like a star with many points, which gave a very good grip. It proved so satisfactory that another of the same make was obtained.

Now the farm, is run by my younger brother; it is fully mechanised; ploughing is done by diesel-engined tractors; combines have replaced the horse-drawn reapers and binders; hops are picked by machine. There are no horses and only about a third the number of men that were employed when I was a boy.

Note

John Rogers was a professional film maker who produced the 16 mm sound colour film "Ploughing by Steam" for the SPC in 1972.

The Burrell Thump

by George Eves

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It was often said during my steam days, that one is never too old to learn, or even be surprised, this was certainly the case with me, when I read about "Burrell Thump", in a recent issue of our admirable newsletter. After reading our Bob's general observations of his engine's behaviour, I just had to permit myself the gentlest of grins, because amid these thumpings and crossheads weaving S patterns, I began to wonder how the things ever functioned at all, because no gland packing in the world would last long in those conditions.

Not that there was any mystery, it was all brought about by incorrect valve events, i.e. steam being admitted to the bore before the advancing piston before it had readied the extremity of its stroke. Ideally the valve should crack to admit steam, a fraction of a second before the piston reaches the end of its travel and changes direction, this to cushion the opposing forces thereby set up. Now a lot of theories are battered around, especially in railway ivory towers about valve settings, but in the end nothing can better the old simple, well tried method of trial and error. Purists will raise their hands in horror at this, but no less a person than the late Alf Pepper explained it all to me a long, long time ago.

I am quite aware how wearying it can be, making and breaking steam chest cover joints, but I found it all very worthwhile in the end. In the first place valve setting has to be done when the engine is hot, and not as I have seen done several times in preservation circles when the engine is stone cold. The time is when the last wisp of steam has subsided into a droplet of water, because then you are beyond the terrors of contractions, for here thou matter a great deal. But it is the only way to obtain an efficient, quiet running and economical prime mover, and this applies especially to single crank compound Burrells, for then it becomes sheer magic to drive.

But mark you well, unless the crosshead, its guides and slippers are free of all slack, ditto pistons and big end, rods round and good fits in rear cylinder covers and glands, then you are not going to "get anywhere" as the goes. Indifferent valve events will bring about weaving crossheads, thumping big ends, and waltzing saucepans.

How do I know all this? Well I drove one for fifteen memorable years, so I think this entitles me to express an honest opinion. Their massive square webbed, unbalanced crankshafts made them hellions to stop on dead centre, when all known dodges proved futile to move it, this had enough out on the open road, but in the fields with your six furrow plough bodies sixteen and more inches deep in the ground and a tight cable to boot, nothing short of brute strength applied to a six foot long crowbar with unsalted words added, would prise the gears apart. But once I had mastered the engine's little foibles I came to love the 1870s monuments of steam engineering at its finest peaks.

Originally, this particular set of steam plough tackle, were the famed Fowler 12 h.p. singles which were a legend in my part of the world, who carved for themselves a niche in history, when after the dust of the Franco-Prussian war had settled, they were sent across the Channel to plough up the old battlefields, and one of the drivers was my old Dad. Now had contributor Rogers travelled into his neighbouring village of Farningham, Kent, on July 10th, 1937 and looked in the local arts and craft exhibition, he could have seen two excellent pictures of the engine mentioned, going about their gruesome task, because according to Eves senior, there were often other things besides weeds and brambles to remove from the plough coulter.

In 1908, in the name of progress, I presume, the Fowler cylinder blocks and motions were replaced with Burrell S.C.C. top hamper, and Dad swore they were never the same thereafter. But in the fullness of time, when my long cherished schoolboy dream of becoming an engine driver like my parent actually came true,

I learned to love the old Burrells, warts and all. I could write a book about them. At that time, had anybody spoke of shimmying crossheads and clunking big ends and tethered cook pots in vans, it would have generated hoots of mirth amongst those lovable old jossers I went to work with in 1911 as a mere stripling when driving a big engine was deemed an honourable calling. Steam waggon and railway engine drivers were deemed also rans by this elite. They wore their blue overalls with the same aplomb as do the Beefeaters their uniforms at the Tower of London, and they were equally at home in the church choir stalls on Sunday adding a noble bit of bass and tenor to the 40th Psalm, as they were in their engine tenders. On Saturday evenings in high summer you'd find them putting into a "yard o' brass" with the village band, on the riverside green, before the STEAM PLOUGH INN at Eynsford, while their allotments, did, as the Psalmist set down in the Good Book "wax with fatness".

O happy days in Kent, when a nimble threepenny silver "Joey" presented in the above hostelry, or in the ROYAL GEORGE at Shoreham three miles on, would begat you, the head of a crusty loaf, a hunk of local cheese, a plate of pickled onions, plus a half pint of Golding's Sevenoaks Pale Ale, to he savoured in the low ceilinged bar, while my old Burrell simmered contentedly outside under the tall chestnuts, with nary a white line in sight.

Or a single picket.