
The Electrification Of Shaws 1894-'96

by Joseph Quaney



At a party the man who was later to become my father, Kerr Quaney, met a girl named Beatrice, fell in love with her, and, after a short

courtship, they decided to get married. The days passed in a delightful whirl of preparations for the wedding.

They were married in the pro-Cathedral in Marlboro Street, Dublin, and were inundated with confetti, blessings, presents and good wishes from a crowd of friends and relatives.

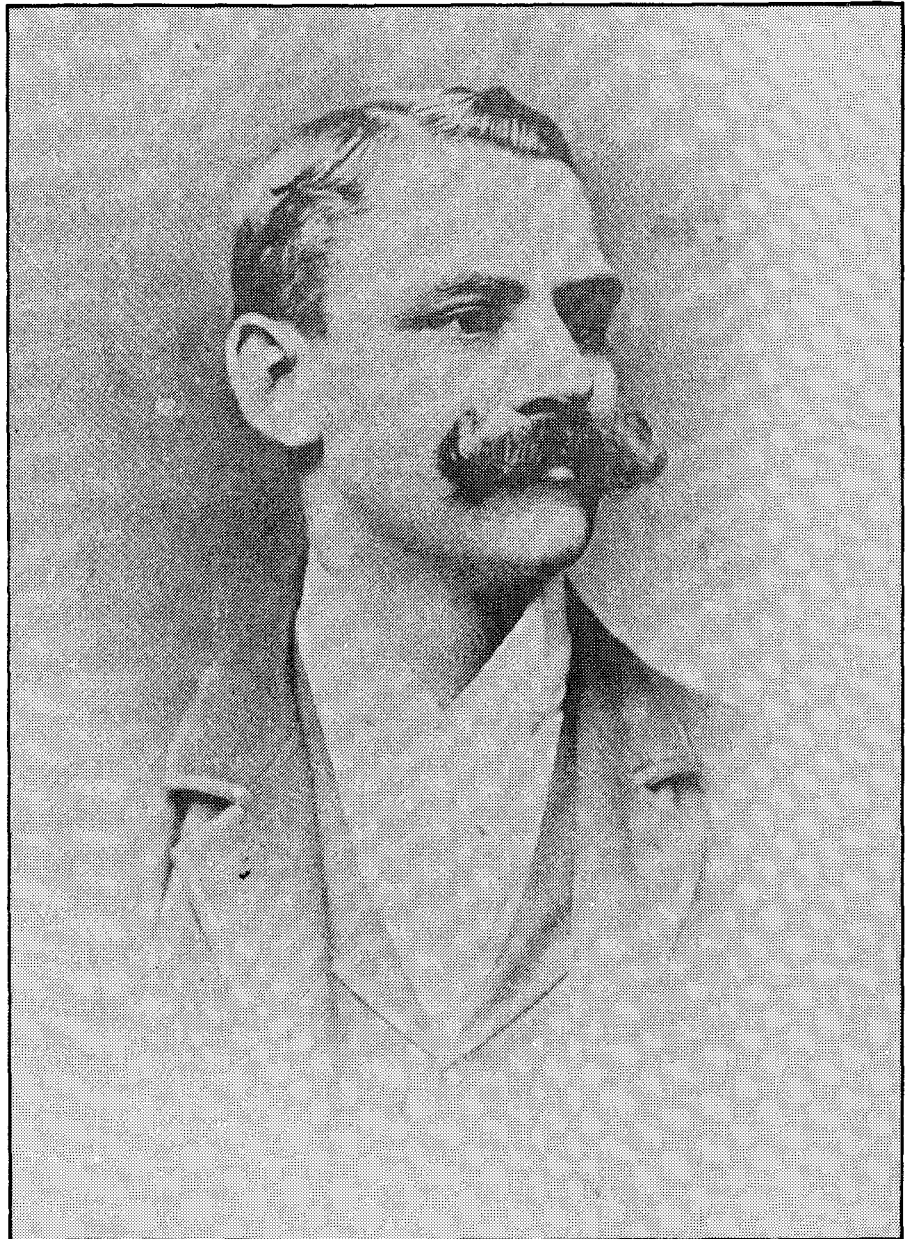
When they arrived home after the wedding breakfast, a letter awaited Kerr from a firm of bacon-curers in Limerick. It was in connection with an advertisement for the services of an electrical engineer to which Kerr had replied a month before and forgotten about. The letter contained an invitation from Mr. Shaw to visit him in the capacity of consultant, to advise him in the matter of changing his factory from old-fashioned, hand-operated methods of production, to modern electrically operated equipment.

The happy pair decided to be practical and spend their honeymoon in Limerick, with the prospect of Kerr taking up a post there later. They just managed to catch the afternoon train to Limerick, and booked into an hotel there on arrival.

After a wonderful honeymoon during which they explored the city, visited King John's Castle and other romantic places on the banks of River Shannon, the day arrived when Kerr had to keep his business appointment.

Mr. Shaw, a handsome middle-aged man, received him cordially and made him feel at ease. He was interested in industrial progress and especially in electricity and its application to machinery. They discussed his bacon-curing and carcass-processing plant and its output in detail. He took an instant liking to Kerr.

"We're working here with worn-out, obsolete appliances and my aim is to build the most up-to-date factory in Ireland", continued Mr. Shaw, with the



Joseph Quaney, the author son of Kerr Quaney, the electrical engineer who came to work at Shaw's Bacon Factory in 1894.

outspokenness and assurance of one to whom money doesn't matter.

"Name your salary, Kerr, and you'll have a free hand with everything; we'll plan the whole thing together", he said, convinced that he had met the right man.

The sudden question about salary stumped Kerr. There was no 'rate' for electrical engineers in those days, as the profession was not properly established and one of Kerr's weak points was to underestimate his own value.

On the spur of the moment he named a salary which was about half what Mr. Shaw thought he would expect. Mr. Shaw, shrewd businessman that he was, never blinked an eyelid, but just expressed delight at having secured the services of a competent engineer. With a mutual feeling of confidence and friendship, they shook hands and the interview ended.

Kerr returned to the hotel, elated at having secured steady employment for the next couple of years, as his savings were running low. Beatrice was delighted at his success. As it was beyond their means to continue living in an hotel, they went house-hunting next day, and ended up by renting a small house in Davis Street.

A week later furniture and household effects, including a beautiful piano, arrived, after a five-day voyage on the canal boat from Dublin. They were not long settling in their new home and a period of great happiness followed.

The neighbourhood reminded them of Dublin, surrounded as it was by streets of Georgian houses with the same distinctive features of deep areas, iron railings, steps up to the front doors, ornate fanlights and iron balconies in front of the windows, and brickwork mellowed to a sickly yellow, just as if the houses had been transplanted en bloc from Dublin's Dorset Street or Merrion Square.

In 1894 Limerick city had every right to be called 'ancient'. There were few gaslights in the streets or houses, no telephones, no motor cars or public transport of any kind, and the luxuries of baths and lavatories were enjoyed only by a privileged few. A very low standard of living prevailed among the working classes, and Samuel Lover's "stage Irishman", was a living reality.

The Royal Irish Constabulary maintained law and order in the County, and the City Corporation employed watchmen to arrest footpads and thieves who infested the streets after dark. Watchmen patrolled the streets at night, swinging rattles, calling out the hours and generally making a racket to let everyone know that they were on duty, so that people could sleep in safety and comfort. They were tolerated by the ratepayers as a necessary evil.

The sidewalks in the main streets were paved with flat stones but in the

side streets they were muddy and criss-crossed with wheel tracks.

The city itself was a stronghold of class distinction, vested interests, bigotry and snobbery. There was an affluent society of Anglo-Irish landed gentry, army and naval officers, a sprinkling of snobbish, high-up civil servants and a quota of parasites who supported the regime and prospered under its protection.

British rule and all its works and pomps was detested by the vast majority of the townspeople, who regarded it, rightly or wrongly, as the direct cause of their poverty and heritage of political woe. Irish people who sided with the British, or fraternised with them in any way, were regarded as traitors to their country and were ostracised by their own kith and kin.

Kerr was not long resident in Limerick before he found himself a kind of social misfit. His education and professional status placed him on the same social plane as a senior army officer, and he would have had no difficulty in being proposed and accepted as a member of any of the city clubs. However, as an Irish-American, he had no wish to be seen hob-nobbing with those who upheld British rule, and the only alternative was to mix with nationalist fanatics who were forever making preparations for militant action of one kind or another. This was not to his liking either, so he finally decided to steer a course between both factions, to settle down to the job in hand and leave politics to the politicians and fighting men.

After his appointment, he turned the front parlour of their new home in Davis Street into an office, got out his drawing-board and tee-square and began working on the plans for reconstruction and electrification of the old factory in Mulgrave Street.

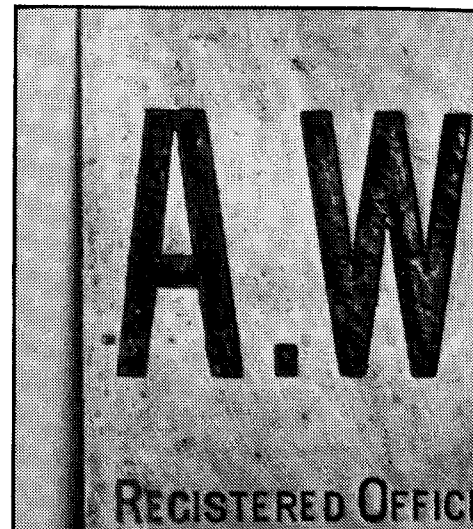
The original factory was a sprawling collection of tin-roofed sheds and out-houses where over a hundred men and women were employed in the killing-room curing bacon and hams and manufacturing other pork products, for which the firm already had a big market in Ireland, England and America. Practically all the work was done by antiquated hand methods.

Kerr could never get over the lack of transport facilities and bad roads in Limerick. Used to the clean sidewalks and acres of asphalt in New York, he abhorred dirt and mud. With the inbred naval habit of keeping a smart appearance and maintaining the dignity of his profession, he set out to walk the distance from Davis Street to Mulgrave Street each morning in top hat, frock coat and polished boots, but before he got very far his boots and trousers were as muddy as a ploughman's. The alternative was to accept a lift on an ass-and-cart, of which he had plenty of offers, and tempted as he often was to

take one, he felt that if he did his incongruous appearance would make him the laughing-stock of the town.

When the people got to know that he was the first electrical engineer ever to come to Limerick, they treated him with deference almost amounting to awe.

"Look, there's Mr. Quaney that's goin' to bring th' 'lectricity here", or "Aw, he's another Edison", they'd say, trundling along on their asses-and-carts. When he went around the old factory it was all "Yes, sir" and "No, sir", or "What can I do for you, sir?". Everyone saluted and salaamed and did their best to please him.



The first plan off his drawing-board was for the new boiler-house and hundred foot chimney stack. A contractor was employed to build the chimney and boiler-house and also to extend the roof in the curing house. Mr. Shaw worked with Kerr on the master plan. Kerr estimated the power requirements and ordered the machinery. Mr. Shaw kept the accounts and never questioned the cost of anything.

"If you say it's the best equipment for the job, we'll get it, Kerr", he would say, reaching for his chequebook and writing out the order. Mr. Shaw supervised the construction of the new buildings and extensions and Kerr got out the blueprints for the machinery, shafting and belt-drives, and ordered the electrical power units to be used for the manufacture of brawn and sausages.

There was a burst of activity seldom seen in those parts when the three six-foot diameter Lancashire boilers arrived by canal boat. The heavy sections were loaded on drays and hauled by teams of horses and men, over shockingly bad roads, to be assembled in the new boiler-house. Fitters arrived from England to assemble the boilers.

Then stories began to circulate about the pressure they would generate when the furnaces got going. It was an era before safety valves were perfected

and lurid tales had come through about boilers bursting in London, Glasgow, Newcastle and other great industrial cities and the number of people who had been killed or maimed by explosions. Most of the men were afraid to enter the boiler-house or to have anything to do with the boilers and gloomily predicted that local men would never take jobs as stokers.

Kerr worried a lot about the time he had to waste walking to and fro from work, although really it helped to keep him fit. His young wife was often lonely and depressed when he didn't come home for meals. Neither of them took

remained was to put the plans into practice. Mr. Shaw and Kerr were beginning to feel the strain of continuous overwork. At this stage one of their chief worries was the shortage of skilled technicians to do the fitting and pipe work.

Another thing was, that their overmastering desire to fulfil an ambition had not inspired the local workmen to greater efforts. Naturally indolent and sublimely ignorant, with a come-day-go-day outlook, the countrymen had little interest in any sort of progress and a profound distrust of machinery, regarding it as an enemy of their class

cians were available and would not be for some months.

The possibility of a long delay at this critical stage of the work worried Mr. Shaw and he discussed the matter with Kerr to find a way to avoid it. There wasn't an electrician of any kind in Limerick and it seemed unlikely that a satisfactory man would be found even if they searched the whole country. Kerr felt somehow that the onus was on him to see the job through and the only way to do it was to tackle it himself, a risky task to undertake with the type of help available, but this was a challenge to his pride and professional integrity.

Beatrice was shocked when Kerr returned home and told her of his decision. Brought up with strait-laced ideas about the ethics of 'class' and all its delineations, she couldn't understand how "he could make himself so cheap".

"But Kerr, you're a qualified engineer, surely they can't expect you to go back to being an ordinary workman?", she enquired fretfully.

"There's no other way, dear. I couldn't walk off and leave the job as it is, could I?", he replied quietly, and so the matter was settled.

When Kerr decided to pocket his pride and work to see the job through, he didn't fully appreciate the disparagement he was letting himself in for. It was like having to face the world after being degraded in rank. When he was going around with a sheaf of plans, marking out the places for machinery and teaching workmen how to read blueprints, everyone looked up to him. He was a 'somebody', able to make his living with clean hands, the envy of the artisans; but the fall of Lucifer was no greater than his the day he turned up in a boiler suit and heavy boots, carrying a tool bag.

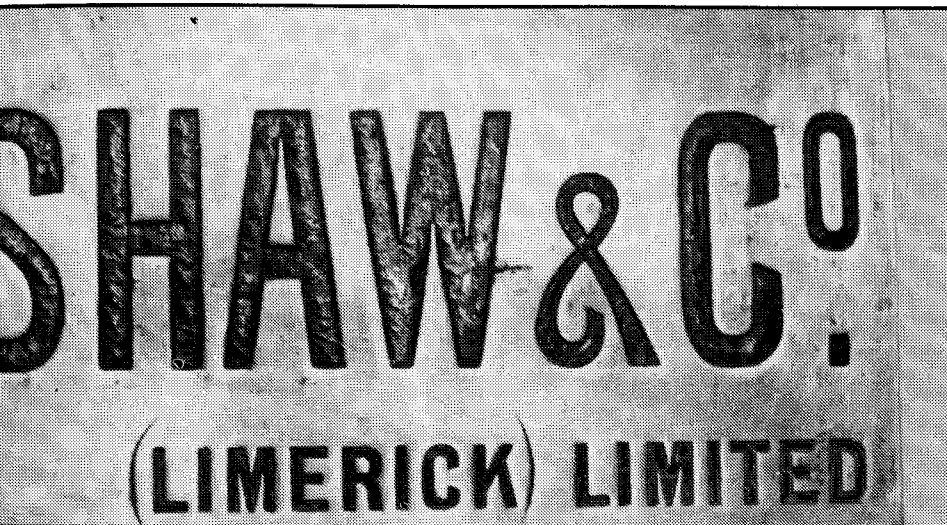
"Well, there's a come-down if ever there was ... an ordinary workman ... an' we thought he was a gentleman", they whispered. People kept out of his way, as if he was a leper, and he had some difficulty getting labourers to help him.

"Always thought there was somethin' queer about that fella," they went on. "If he'd joined a club an' mixed around with the gentry as he should, he'd a bin a Knight or somethin' by now," was their verdict.

But Kerr, knowing the world as he did, wasn't too perturbed about the psychological effects of having 'lost face', although he did feel a bit deflated one morning when one of his helpers answered respectfully "Yes, sir", and the other blurted out:

"Arrah, what are ya sirrinn' him for, for Jasus' sake, hasn't he to work the same as ourselves?"

More than once he heard himself described as a 'Muggadhaun', but notwithstanding the slurs and innuendoes, he got on with the job, and his



The nameplate from the front offices of Shaw's Bacon Factory.

much interest in local affairs and few friends called to pass the time of day. Beatrice whiled away the hours practising at the piano and developing the wonderful talent she had for music.

On Sundays Kerr would listen to her playing, enraptured, then suddenly wake up and start planning furiously for some way to amass enough money to buy a house and build up some security for the future.

After months of work, the new boiler-house was completed and the three boilers were installed as planned. The great hundred-foot brick chimney reared up, forming an appropriate monument to industrial progress. Two 'Lightfoot' steam engines with six-foot diameter flywheels, arrived in sections, were assembled on the engine beds and connected to the boilers. Then four 'Z' type dynamos arrived from London, via Dublin, by rail.

The dynamos were of the same pattern as those used by Edison to provide electric light on the S.S. 'Colombo', around Cape Horn to San Francisco - the first liner ever to be equipped with electric lights. The dynamos generated for 115 carbonised paper filament lamps and not a single bulb failed during the voyage, which lasted for two months.

The task of estimating and planning had now reached its peak, and all that

that would cause more and more unemployment.

Although patriots sang 'The West's Awake' with great gusto, it was still in a trance industrially. Labourers started work in their own leisurely way and made a show of effort until someone produced a pipe and plug of tobacco, then everyone within talking distance followed suit and took it easy for a spell. If a stranger came near where men were working, they stopped automatically to find out who he might be, and what was his business and until these important questions were settled no-one would think of starting work again. Among the working class time didn't matter and the word 'hurry' was taboo.

Kerr was trained to work in an environment of American drive and efficiency, and the complete lack of interest shown in what was going on, annoyed and disheartened him. If there were two ways of doing a job, it was invariably done the wrong way and the supervision of handling and assembling intricate machinery was, at times, a penance.

When the dynamos and cables arrived, an unforeseen problem cropped up. An arrangement had been made for the manufacturers to send electricians to instal them, but a letter arrived with the news that no electri-

interest in it neutralised the hostile attitude of the rank-an-file.

When Beatrice opened the hall-door at dinner-time and saw him in dirty overalls, begrimed with toil, she almost burst into tears. She hadn't seen much of the ups-and-downs in life and felt humiliated.

However, young in heart and outlook, they soon adjusted themselves to the new conditions. Such trifling problems were swept away when a son was born. The tiny infant brought more love and interest into their lives and time passed quickly as they planned for the future.

Then one morning Kerr came across an article in the local newspaper that revived old memories and rekindled his ambition to become a great inventor. While the breakfast was being cooked he read it out to Beatrice: 'Electrical engineers have as yet been unable to perfect a system of working tramways electrically along crowded thoroughfares. The overhead trolley system is being continually found fault with in America. Inventors have long been engaged endeavouring to overcome the difficulties and as an incentive to them to throw themselves into their task with renewed vigour, the Metropolitan Traction Company of New York has offered the handsome reward of £10,000 to the enterprising inventor bringing out a system of street car propulsion which will be superior or equal to the overhead system, but without possessing the objectionable features of the trolley for crowded thoroughfares. The idea is stated to be to encourage some sort of underground trolley system for street cars'.

"Now there's something in your line worth going in for", commented Beatrice enthusiastically. Once again Kerr felt the call of America but this time he reflected a little sadly that he could not answer it, after taking on the responsibility of a wife and family and the moral obligation to build a home and provide for their future.

The reading of that report unsettled Kerr and stimulated him to finish his contract, so that he would be free to start on another assignment at a higher salary. The rebuilding of the main factory was almost completed. A new ammonia plant and installation of pickling vats were ready for service.

Under normal conditions three or four electricians would have been required to do the work that Kerr tackled single-handed. It was a vast undertaking. He hadn't one reliable helper and the installation of wiring and testing of power and lighting circuits, was slow and arduous work. When the day came to connect up the steam engines and dynamos that were to generate electricity he was nearly 'all in'.

Early one morning in March, 1896, everything was ready, and after a final check up of the electric wiring, Kerr

gave the mechanics the 'all clear' to stoke up the furnaces and carry out a test.

Clouds of smoke arose from the main chimney, the roar of the furnace increased in volume and, a couple of hours later, the steam gauges registered sufficient pressure for a test.

After a series of valve adjustments, spurts of water and escaping steam, the great flywheels began to turn slowly and gain momentum. The hum of the dynamo rose to a high-pitched whine and clusters of sparks, flickered around the armature contacts as the generation of electricity began.

It was dark that evening when Kerr went the rounds, putting on the light switches and running the belt-driven machines until the whole factory blazed with the new electric light and throbbled with steam and electrical energy.

Thus, under the direction of one man, the miracle was accomplished and the first factory in the west of Ireland to be run by electricity was ready for service. There was no fanfare of trumpets or gathering of civic dignitaries to usher in this historic event, and the crowd of factory hands and rustics that gathered to watch the switch-over could not grasp the full importance of the occasion and dispersed when the lights went out, no more impressed than if they had seen an annual Guy Fawkes Day display.

But it was a thrill-packed day for Kerr and Mr. Shaw, the two partners in the drama. An unusual silence fell between them when the strain of waiting and watching eased. They were too overcome with relief and pride of achievement to do anything more than shake hands and express a fervent thought, "Well, that's over at last, thank God". Mr. Shaw knew that the success of the whole undertaking was due to Kerr's efforts and respected him all the more, because he was the most efficient and unassuming young man he'd ever met.

Owing to popular prejudice against the introduction of steam, some time elapsed before anyone would come forward to learn to stoke the boilers, but eventually a few men who had acquired experience in a saw-mill, attracted by the high wages, offered their services.

As soon as the improver mechanics became familiar with the running of the plant, the fly-wheels started to hum again and, with the help of Kerr's advice and training, the men applied themselves more efficiently to their duties, until the pulley-belts whirred with greater velocity and the factory, like a fully synchronised power unit, increased output steadily day by day.

Although the steam-driven section of the plant was now running smoothly, the same could not be said about the electrical department. Few of the workmen could be induced to have anything

to do with electricity. They had an instinctive fear of it. Electricity had the power to shock and kill, like lightning.

The youngsters who attended the machines would feed them with meat all day long but refused to touch a switch, even to turn the power on or off, so an advertisement was put in the newspapers for a maintenance electrician.

Now that all the manual work of assembling boilers, dynamos and shafting was done, Kerr resumed his original status as an engineer, debonair, efficient, advising, directing and helping those, whose interest in the new machinery was at last awakened. Acknowledged by all as a master technician, he was the authority on everything connected with the machinery.

Within a few months of the switch-over, the factory output statistics showed a remarkable rise, and soon the firm's products became known for excellence and quality in many parts of the world.

After the long period of strain and overwork, Kerr enjoyed a spell of rest and relaxation. The prosperity of the factory was soon reflected by increased earnings of the workers and Kerr became a leading figure in the town and the hero of every schoolboy.

Now that his contract to modernise the factory was to all intents and purposes finished, the unspoken question arose whether Kerr would stay on at his post of engineer, or leave it for some other field of service. With that delicacy of feeling between true friends, neither man liked the idea of parting or even broaching the subject. Although Mr. Shaw gave many a hint that Kerr's post was permanent if he wished to stay at it, no further agreement was entered into, and Kerr left the matter at that. Prompted by ambition, he already felt fit to take on and grapple with another engineering problem.

In August 1896, a letter arrived from Dublin that opened up new vistas and thrilled the young couple with the spirit of adventure. It was from Kerr's sister, with the news, that at last, after years of talking, an Electric Tramways Company was being formed and had gained permission to provide a public transport system for the whole city of Dublin. There would be wonderful opportunities for engineers who were "in on the start". Kerr and his wife talked things over and decided that it would be in their best interests to move back to Dublin.

The following week Kerr interviewed an electrician who had applied for a maintenance job in the factory. After satisfying himself that the man was competent enough to look after the electrical equipment, he told Mr. Shaw of his wish for a change. With a mutual feeling of regret the friends parted, never to meet again.