

LESSONS OF THE ROAD

Six Months with a Steam Carriage.

BY E. MILLER.

I have read with much interest and amusement the articles on steam carriage experience which have appeared in your valuable journal from time to time during the last three months. From the accounts given it often appears to the inexperienced that any person buying a steam automobile necessarily buys a mess of trouble. To all those who may have been thus impressed I wish to say that this is not correct.

In the first place, ninety-nine out of every hundred buyers of automobiles are business men and not engineers, or even mechanics. The agent they buy from usually gives them a few hasty explanations, and they go home thinking that they will easily remember the instructions they have received and convinced that they will have no difficulty in operating their machine.

About a week later, or perhaps a month, the vehicle arrives all O. K. The owner in his anxiety to show his new possession to his friends and to give them a ride, lights the fire and proceeds to raise steam at once, without taking the time to first thoroughly acquaint himself with the construction and working parts of the carriage; he launches out after trouble—and usually gets it.

The next thing we see an account in *THE HORSELESS AGE* in which he tells what all happened and in which he demonstrates his inability to operate any similar kind of a carriage.

Before I start to relate my experience I wish to say that I am not more competent nor do I have any more judgment in this line than the average business man. I am a farmer, and enjoy the horseless vehicle for the reason that it requires some skill and exercise of the mental faculties to operate it to satisfaction.

May 1, 1901, found me in Chicago, looking for some sort of an automobile. After examining several makes I decided to buy a steam carriage of some approved make, and placed my order with an agent located in Wabash avenue, in that city.

The carriage arrived in due time. I took it home, and after carefully looking it all over I thought I remembered all the agent told me about its operation. But continuing my investigation I found, to my surprise, several things that puzzled me to know what they were for. My curiosity was aroused, however, and I filled the gasoline and water tanks and steamed up. After a couple of hours I finally succeeded in getting the required amount of steam, but not until I had scorched my eyebrows and hands somewhat, being not familiar with the process of raising steam. Well, I

got started and took a spin around town; then gave a ride to a few friends and came home all O. K.

The next time I attempted to steam up I again had trouble (my book of instructions having not yet arrived from the factory), and I decided to quit right there.

A few days later the book came, and I studied it carefully and examined all the parts of the carriage thoroughly, thus gaining a pretty thorough knowledge of how to operate it. So after a week of rainy weather I again steamed up, this time in ten minutes, and went for a run around town. After running for nearly two hours I returned home, much pleased with my experience so far. I now had much more confidence in the carriage and steamed it up every time I could spare a few hours for a spin, and had many a pleasant ride, although never more than 25 miles at a time.

In September last I decided to make a trip of about 130 miles. Previous to this I had found that the oil cups for lubricating the cylinders were too small, and one could not see how much or how little oil was being used; so I replaced them with a Lunkenheimer sight feed lubricator. I also placed a Kelly generator on the carriage, as I did not like the idea of heating a piece of pipe every time before I could start the burner. Both of these improvements worked to my entire satisfaction.

On the morning of September 1 my carriage was charged with supplies and all ready for a run. My wife and myself mounted at 7 a. m. and were soon on our way on a road on which there were about 3 inches of dust, which made it very heavy and sluggish. After going a few miles I thought I would be cute and take a farm road which I knew to have been in good condition about a year ago. But after we had gone for a few miles, the road, to my surprise, ended in a plowed field. I had taken this road to avoid the dust, which I did to some extent, but yet I was sorry for having taken it. After inquiring of a good farmer as to which was the best way out, I was informed that there was a gate at the upper corner of the field. So I mounted my carriage and proceeded to roll through the plowed ground and around the stumps until we reached the gate without any accident. Passing the gate we were again on dusty roads.

We continued steadily until we reached the second station. Here there was a well handy by the roadside, and I filled my water tank, which, by the way, was still half full. In order to be on the safe side I always put in a few buckets full whenever it was so handy. We continued our journey until we reached the fourth station, and as there was here another pump handy in the street I again filled the tank, after which we again resumed our journey.

We passed mile after mile, which seemed like blocks in the city, until noon, when we arrived at a small town, where we stopped for dinner. After shutting off the

fire and leaving the pilot light burning we retired for dinner. When we had finished our meal we again mounted the carriage, and after explaining the good qualities of the rig to the large crowd of spectators who had congregated around the carriage while we were at dinner, we again continued on our way. After we had run about 2 miles I stopped the rig and oiled all the parts that required oiling. I always aimed to oil it about every 15 miles. Thus we continued our journey until we reached our destination. I took on 9 gallons of gasoline during the trip, and had 4 gallons left in the tank, and when I left home I had 6 gallons in the tank, so I consumed 11 gallons in the trip. The odometer registered 137 miles. We were eleven hours on the way, but by deducting the one hour at noon and one-half hour taking on gasoline twice, leaves us just nine hours actual time, which included the taking on of water at different times.

After visiting for a few days, my brother and myself again made a run of a half day. Before we started I put in a teacupful of kerosene oil to boil out the scales which I had been told would accumulate in the boiler after running a day steadily. So on our return I blew the boiler out, but to my surprise there was no scale to speak of.

A few days later we returned home, and again made the 137 miles without an accident to mar our pleasure, save the breaking of a water glass on which I had tightened the caps too much. This I replaced in a few minutes. The lubricator which I mentioned in the beginning did its work perfectly. After adjusting it at the start I never touched it until we reached our destination. One pint of cylinder oil was the consumption for the entire distance.

I have now decided to put in a feed water heater, which will make my carriage as nearly perfect as one could ask for. I found that when my pump was running my steam would drop to 80 or 90 pounds, and soon after I closed the by-pass the steam would reach 140 to 160 pounds, which was plenty to drive our carriage 15 to 20 miles an hour.

We also encountered several long and pretty steep hills, and I always started up them with about 180 pounds of steam, and then hooked my reverse lever down one notch, and we climbed these hills like magic. Never were we called upon to get out and push, as is the case with two of my fellow citizens who are the unfortunate possessors of carriages with the other kind of motive power.

I attribute my good luck (as you may call it) to my thoroughly studying my carriage and becoming master of each and every part before I ventured out on a run of any great distance, and would advise all who purchase a carriage, no matter what make it may be, to do likewise and profit thereby. Be sure you are right, then drive on.