

THE UTILITY OF THE AUTOMOBILE FOR THE COUNTRY PRACTITIONER.

Among the many marvelous inventions and improvements to which the last quarter century has given birth, there has been but few that have contributed to the comfort or have served to lighten the labors of the country doctor. The unappreciative public may still hear the doctor's chaise as it rattles past in the night through the storm and darkness bearing the occupant on his errand of mercy. The in-

ventive ingenuity of mankind has thus far failed to devise a successful substitute for the ever-faithful nag—the silent companion of many a long and tiresome journey and the secretive confidant of many a tale of his hopes and fears for his patients.

The horseless carriage gives promise of a better condition of things for the physician and especially the rural practitioner, when its present drawbacks, of which there are many, shall have been overcome. Their attractive appearance, the ease with which they are handled, and their apparent utility will doubtless prove irresistibly attractive to physicians. In an excellent article on the automobile in country practice, Dr. A. D. Hand, of South Dakota (*Medical News*, August 11, 1900), points out the usefulness and the defects of the various ones of such vehicles

Three different ways of securing power to propel horseless carriages have been commercialized. The electric current, hydrocarbon expansion by rapid combustion of gasoline, and steam. Of the three vehicles representing these systems the electric carriage comes nearest meeting the country physician's requirements, but it has defects which so far have proven unsurmountable and place it wholly out of range of practical use. The best electric carriage suitable for a physician's use that can be purchased to-day will not travel twenty miles over average country roads without being recharged at considerable trouble and expense even at convenient places. Another fatal objection is its great weight. The storage battery of the regular run-about weighs six hundred pounds and requires a cumbersome gear which increases the vehicle's weight to twelve hundred pounds. Rubber pneumatic tires on a vehicle of this weight are necessarily short-lived and full of trouble. This great weight also diminishes the effectiveness of the vehicle in climbing hills, going through mud, and in facility of handling both in and out of use. It is an impractical weight compared to the work required of the vehicle.

On paved city streets or very favorable roads, for short and infrequent trips, and where facilities favor recharging of the storage battery or admit of frequent relays, the electric carriage works charmingly. But little care is required to operate it successfully, no element of danger exists as a constant threat to the safety of the rider or the in-

tegrity of the machine. It is free from objectionable noises, odors or appearances. It is safe to leave for any length of time and is ready for instant use upon the user's return. It has no delicate mechanisms to get out of order easily, and extremes of weather will not incapacitate it for use. When an electric top buggy weighing about five hundred pounds can be furnished that will run seventy-five miles without being recharged, will climb twenty five per cent grades, and can be economically charged at home from a small plant to be kept for that special purpose, then it will be a practical vehicle for the country physician to use in his practice.

The difficulty of starting them, their complicated mechanism, and the interference with their action caused by the inclemencies of the weather render the gasoline and the steam motor less desirable.

No one appreciates the good qualities of the horse more than the country physician and it will be given up with reluctance when man's ingenuity shall have provided a machine to better do its work.