W. P. GREGG.

Roller-Skates.

No. 208,234. Patented Sept. 24, 1878.

Fig 1.

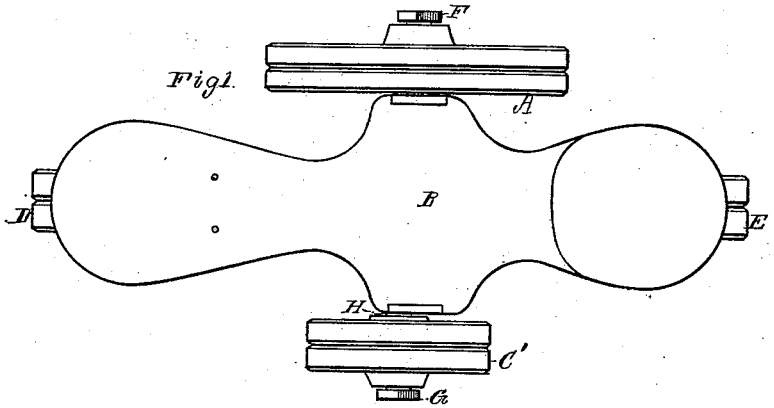


Fig 2.

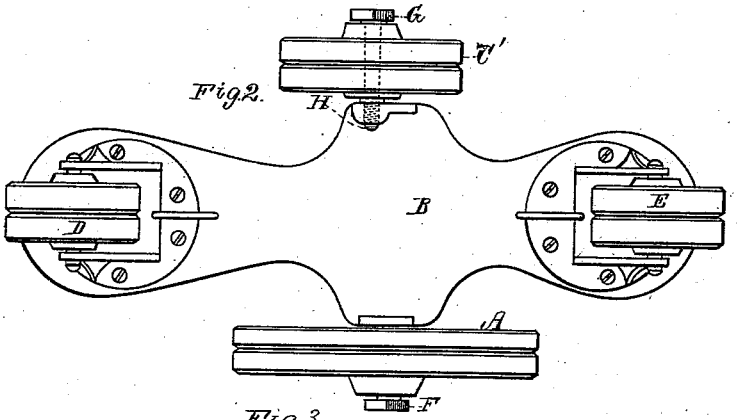


Fig 3.

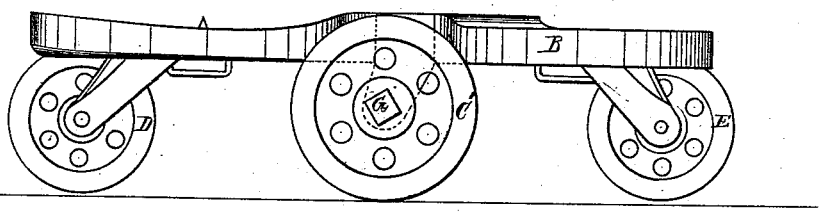
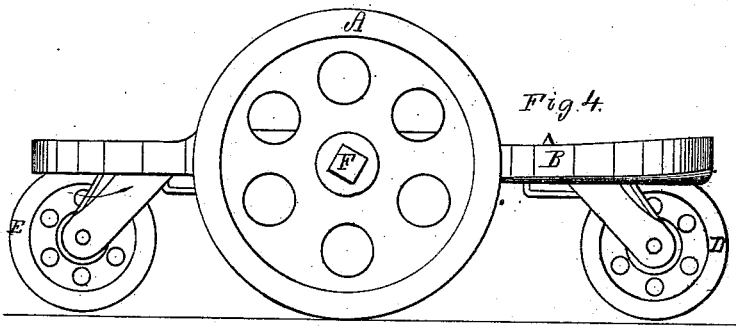


Fig 4.



Witnesses.

John R. Snow

John C. Sullivan

Inventor.

Washington Baker Gregg

UNITED STATES PATENT OFFICE.

WASHINGTON P. GREGG, OF BOSTON, MASSACHUSETTS.

IMPROVEMENT IN ROLLER-SKATES.

Specification forming part of Letters Patent No. **208,234**, dated September 24, 1878; application filed June 20, 1878.

To all whom it may concern:

Be it known that I, WASHINGTON PARKER GREGG, of Boston, in the county of Suffolk and State of Massachusetts, have invented certain new and useful Improvements in Roller-Skates; and I do hereby declare the nature of my said invention and the manner in which it is to be performed to be fully described in the following specification, reference being had to the accompanying drawings, which make a part thereof.

My present invention is an improvement on roller-skates, in which a large middle driving-wheel is used on each side of the skate-stock, as in my patent of July 25, 1865, and on skates in which a large middle wheel is placed on the outside of the stock, and a small wheel under the inside of the middle of the stock.

Skates of these kinds answer well for novices and for most proficients; but it is desirable for athletes and professionals that a middle wheel should be employed at the inner side of the stock, somewhat larger than the comparatively small one under it, without raising the stock higher than it would be with such smaller wheel under it; therefore I have made the improvements hereinafter described.

My present invention consists in a novel construction, arrangement, or combination of the wheels, rollers, and stock of the skate, as hereinafter set forth.

The accompanying drawings exhibit a skate embodying my present improvements.

Figure 1 is a top view of the skate with a large middle wheel on the outer side of the stock and a medium-sized wheel with its axle-head at the inner side of the stock. Fig. 2 is a bottom view of the skate with the large middle wheel on the outer side of the stock, and the medium-sized middle wheel with its axle at the inner side of the stock. Fig. 3 is a side view of the skate with its toe and heel rollers and medium-sized middle wheel. Fig. 4 is a side view of the skate with its toe and heel rollers and large middle wheel and axle-head.

In carrying out my invention, as shown in Figs. 1 and 2, I arrange one comparatively large middle wheel, A, for side support, driving, and turning, on the outer side of the stock B, near the ankle, and one smaller or medium-sized middle wheel, C′, for side support, driving, and turning, at, but not under, the inner side of the stock, opposite, or nearly opposite, to the larger middle wheel, A, the upper part of the rim of the medium-sized wheel C′ being even, or nearly even, with the upper surface of the stock, and the lower part of the rim of the medium-sized wheel C′ being as low down as the lower part of the rim of the middle wheel, A.

By thus making the inner middle wheel less in diameter than the outer one, and arranging it at the inner side of the stock, the skate becomes easier of application to and removal from the foot, and interference of the inner wheels with each other when the skates may be in use is not only lessened, but substantially obviated, so far as concerns athletes and professionals, who thereby have an inner middle wheel larger in diameter than they could have under the inner side of the stock without raising the stock higher from the ground.

With the middle wheels arranged and constructed as set forth, I combine one small roller, D, under the toe, and one small roller, E, under the heel of the stock, to support the heel and toe. Each middle wheel should extend down from the stock at least as low as the end rollers, and generally a little lower than the end rollers, to facilitate driving and turning. There may be two rollers instead of one under the heel or toe of the stock, when desired.

The skate is made to be used either with its stock, toe and heel rollers, and medium-sized middle wheel, as shown in Fig. 3, for the left foot, or with its stock, toe and heel rollers, and large middle wheel, as shown in Fig. 4, for the right foot, said middle wheels being made detachable, for the purpose of being dispensed with at pleasure, by turning back and removing the axle G H and axle F, suitably arranged for the purpose. Each middle wheel having its separate axle may have its lower bearing a little nearer than that of the other middle wheel toward the toe or heel of the stock. In general the hub of each middle wheel is a little shorter on one side of the wheel than the hub on the other side, the shortest hub to be used next to the stock for a narrow foot, and the longest next to the stock for a wider foot.

The stocks, wheels, rollers, fixtures, and fastenings may be of any suitable materials and size or desirable patterns.

The rims may be flat or rounded, and also covered with hardened leather, rubber, or other suitable substances.

As there are various ways of fastening axles to the stocks or foot-rests, I do not confine myself to any particular way. Some axles I fasten to the upper, some to the lower, surface of the stock, and some to the sides, or to brackets below or above the stock, according to the diameter or position of the wheels or rollers.

These skates are intended for all suitable surfaces, indoors and out.

Having described my invention, I claim as follows:

In roller-skates, a large middle wheel arranged on the outer side of the stock, in combination with a smaller middle wheel arranged at the inner side of the stock, substantially as and for the purposes described.

In witness whereof I, the said WASHINGTON PARKER GREGG, have hereunto set my name, at said Boston, on this 22d day of May, 1878.

WASHINGTON PARKER GREGG.

Witnesses:
JOHN R. SNOW,
JOHN O. SULLIVAN.