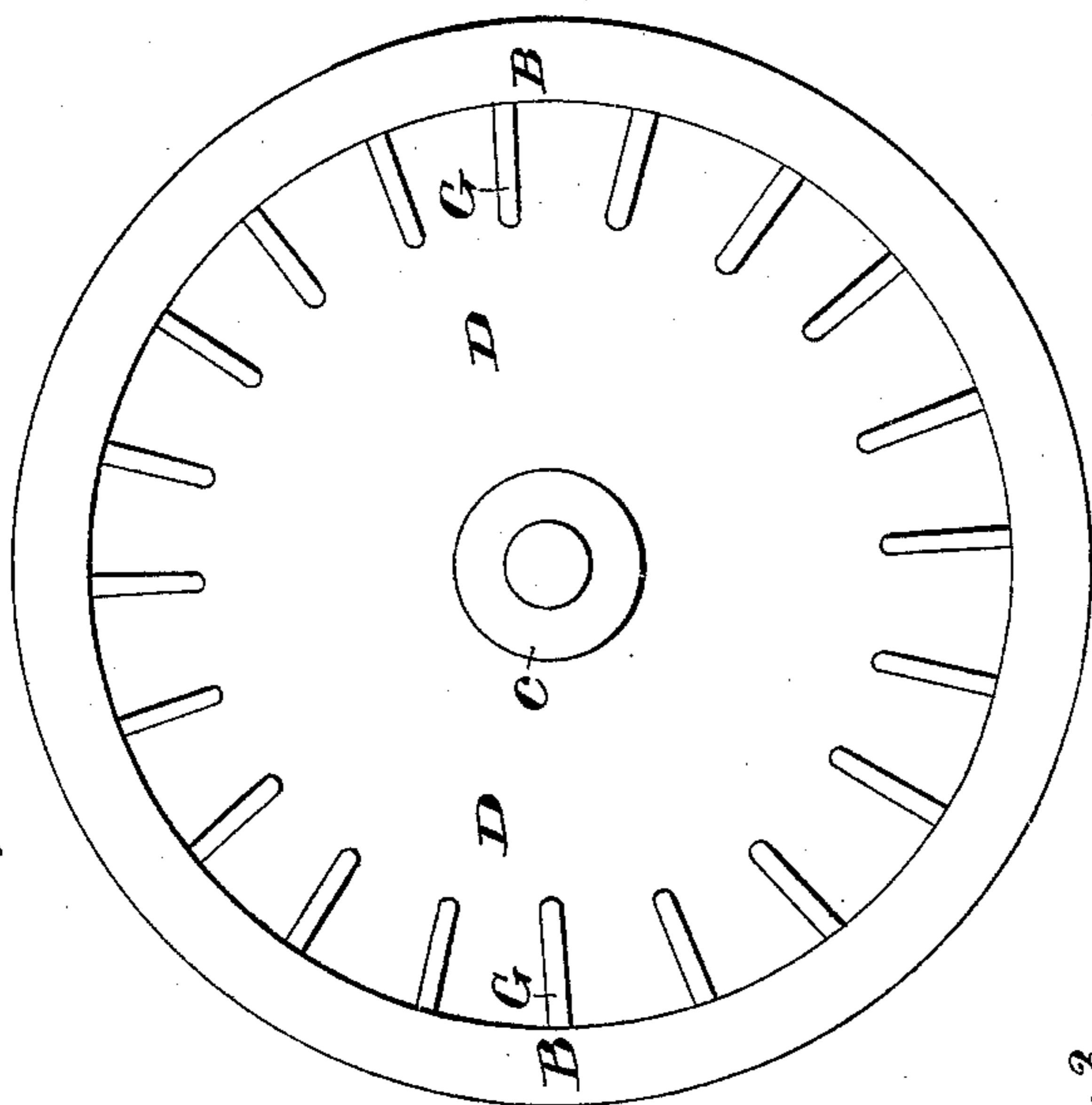


D. COCKLEY  
Car Wheel.

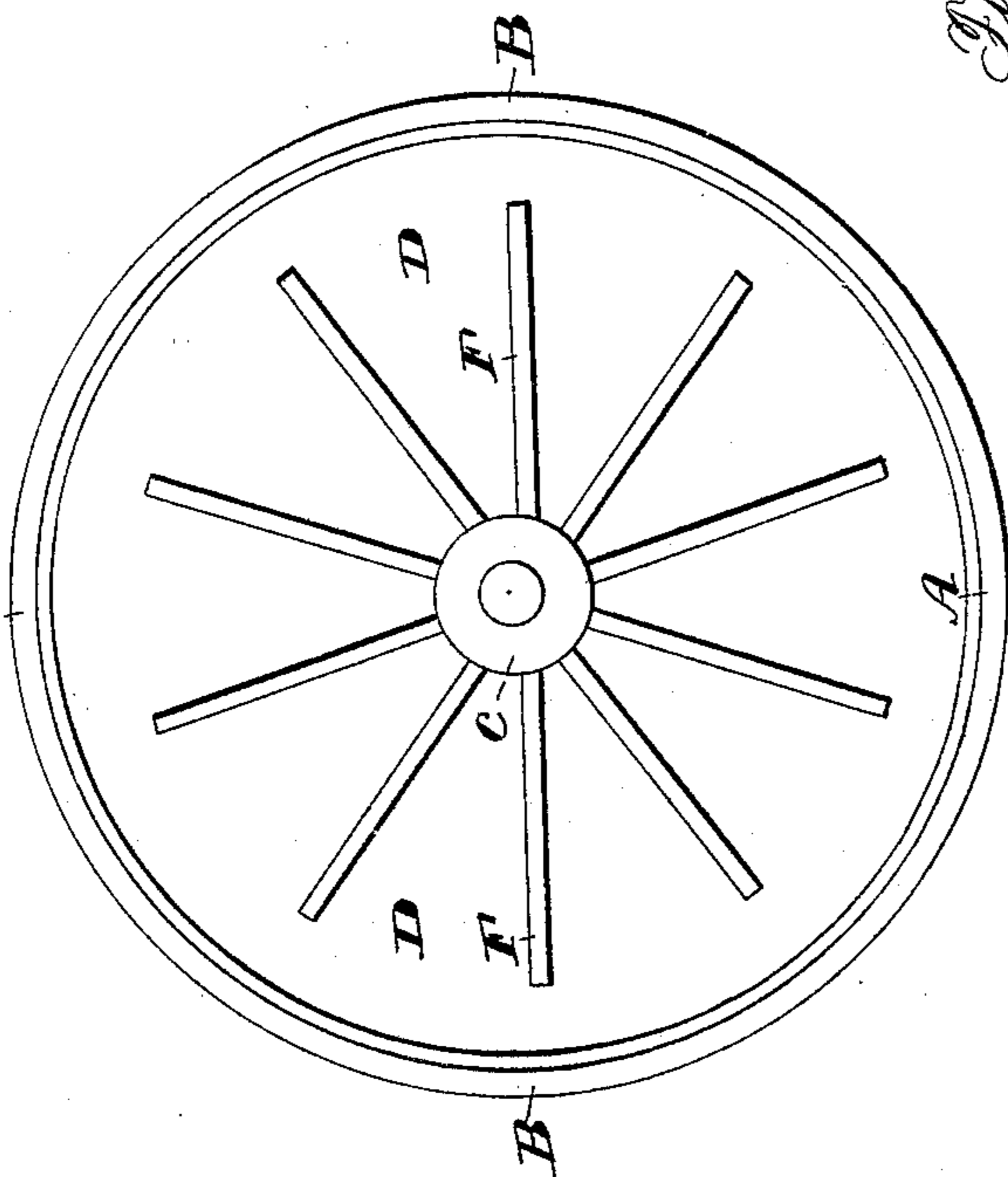
No. 1,377.

Patented Oct. 21, 1839.

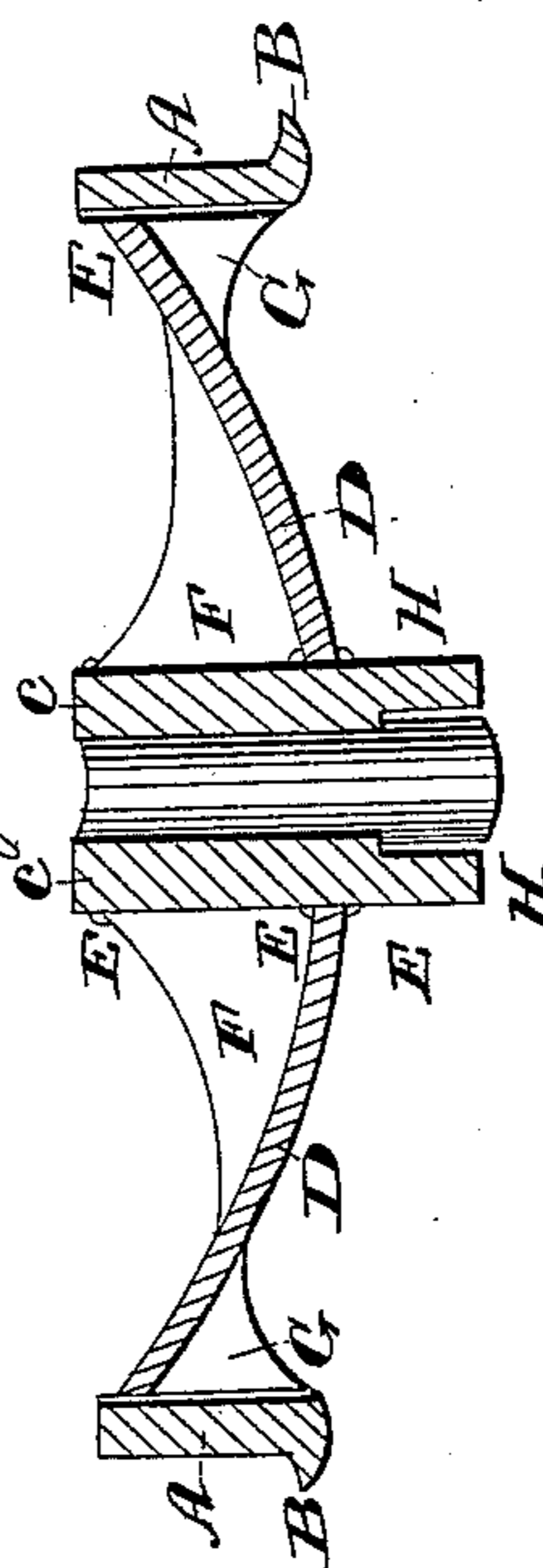
*Fig. 2.*



*Fig. 1.*



*Fig. 3.*



*Inventor.*

*David Cockley*

# UNITED STATES PATENT OFFICE.

DAVID COCKLEY, OF LANCASTER, PENNSYLVANIA.

## RAILROAD-CAR WHEEL.

Specification of Letters Patent No. 1,377, dated October 21, 1839.

*To all whom it may concern:*

Be it known that I, DAVID COCKLEY, of the city of Lancaster and State of Pennsylvania, have invented a new and useful Improvement in Wheels for Railroad-Cars, called the "Single Plate and Bracket Wheel"; and I do hereby declare that the following is a full and exact description.

The rim A and flange B are of the usual size and form, and the space between the rim and the hub C is filled by a concavo-convex plate D, extending from the front side of the rim to near the back end of the hub, the convex of which plate projects about one inch an eighth of an inch beyond a straight line with the back part of the rim. A small fillet or astragal E fills up the acute corners both of the hub and rim. The front or concave side of this plate is supported by about ten brackets F, extending from the hub along the plate about four fifths of the space between the hub and the rim. A double number of brackets G extend from the rim at the flange about one third the distance toward the hub on the back or convex side of the plate. The back part of the hub H projects about two inches beyond the usual length of the hub, which two inches is bored out sufficiently to receive the axle or shaft at its full size freely, so

that in case the axle should break at the shoulder, it could not immediately fall out of its place.

The advantage of this wheel over others is that its increased concavo-convex form is sufficient to overcome all danger of its cracking by the shrinkage of the metal, and by means of the brackets strength is given to the wheel. In this casting no coring is necessary, save that of the hub. Therefore it has every chance of becoming a perfect and solid wheel, and is thought to possess a combination of strength, superior to any heretofore used.

No. 1 of the drawings shows a front view of the wheel; No. 2, a view of the back, and No. 3 exhibits a cross section.

What I claim as my invention, and desire to secure by Letters Patent, is—

The employment of brackets on the back or convex side to support the rim, and also the additional length of the hub, with a bore sufficient to receive the axle at its full size, as a safety in case of the axle breaking at the shoulder, all as herein described.

DAVID COCKLEY.

Witnesses:

SAML. DALE,  
JAMES I. DALE.