I. RAMBOUX.

ABRADING DISK FOR GLASS GRINDING MACHINES.

APPLICATION FILED MAY 28, 1906.

911,759.

Patented Feb. 9, 1909.

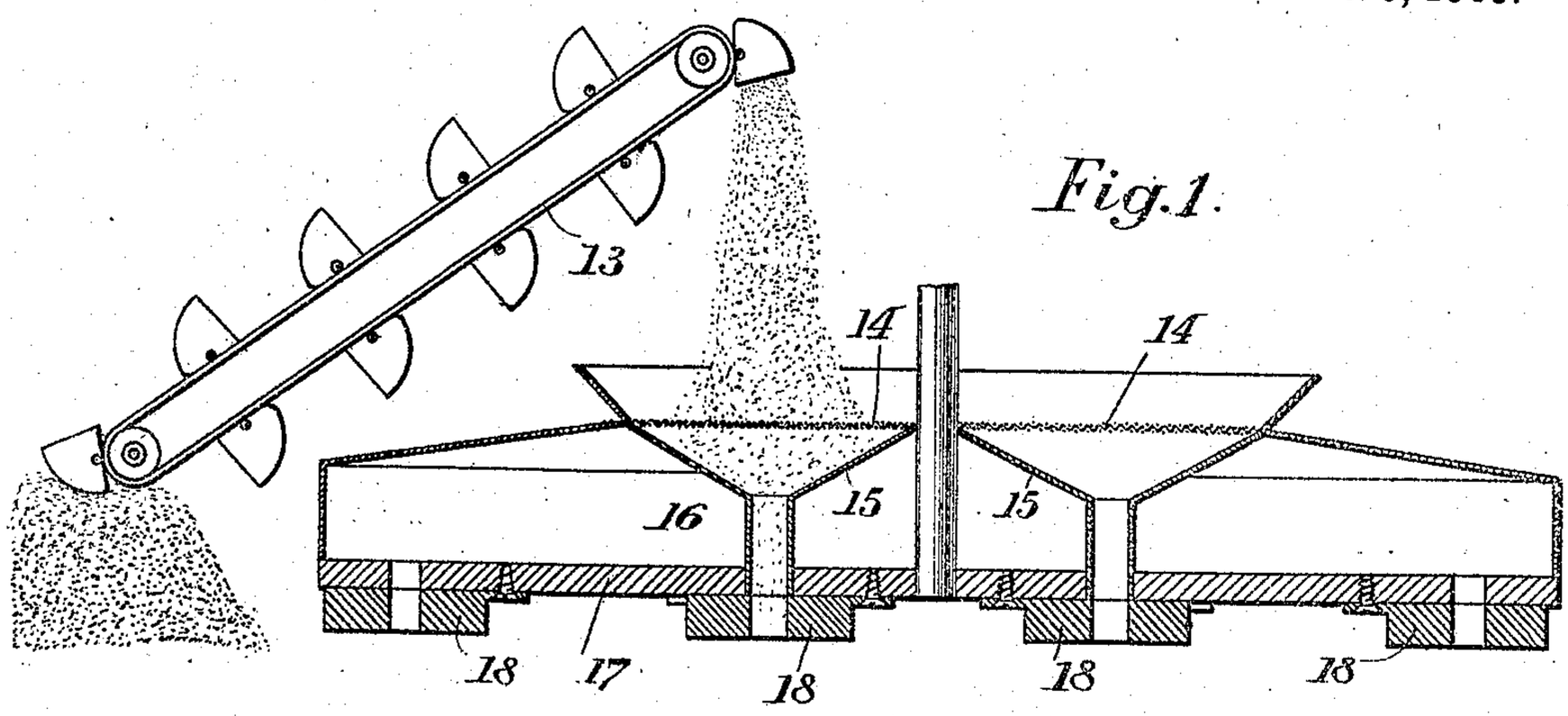


Fig. 1.

Fig. 3.

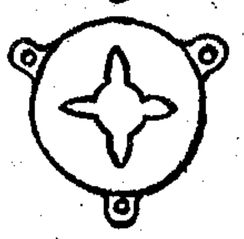
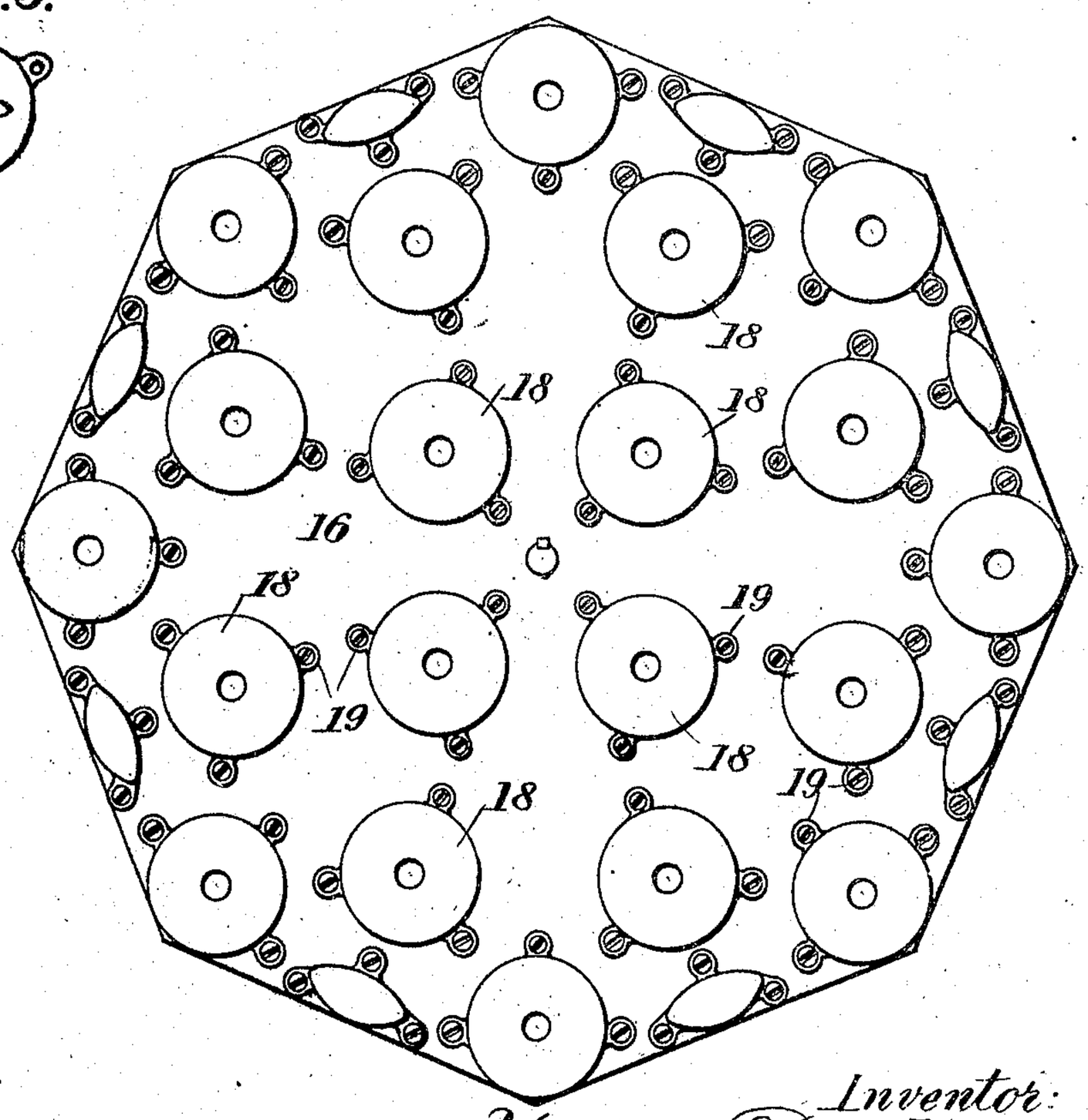


Fig. 2.



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UNITED STATES PATENT OFFICE.

ISIDORE RAMBOUX, OF ERQUELINNES, BELGIUM.

ABRADING-DISK FOR GLASS-GRINDING MACHINES.

No. 911,759. Specification of Letters Patent. Patented Feb. 9, 1909.

Application filed May 28, 1906. Serial No. 319,178.

To all whom it may concern:

Be it known that I, ISIDORE RAMBOUX, a subject of the King of Belgium, and resident of Erquelinnes, Belgium, have invented new and useful Improvements in Abrading-Disks for Glass-Grinding Machines, of which the following is a specification.

This invention relates to machines for grinding glass plates, marble slabs and the like, and more particularly to the abrading mechanism therefor.

In the annexed drawing: Figure 1, is a sectional view of a grinding and polishing disk carrier constructed according to the present invention. Fig. 2, is an underneath plan view thereof. Fig. 3, illustrates a grinding disk with an opening therein of irregular outline.

The grinding operation as carried out according to this invention consists in throwing or causing to fall the sand and emery on the abrading disks instead of on the tables or platforms as it has been the practice until now. This process has the advantage to cause the grinding material to work at the very place where useful work is to be done, thus affording the saving of an important amount of said materials as well as a serious increase of the amount of work done as no time is lost for collecting the sand. The grinding disks which project beyond the edge of the platform when rotating, do not need to be provided with holes, if this is desired.

The carriers for the grinding disks must be provided with holes in order to allow of the above stated material placing itself under the knobs or grinding disks made of cast iron.

The cast iron plates of the marble slab grinding machines must equally be provided with holes having the desired dimensions with a view of ascertaining the feed of the above stated materials. The buttons or grinding disks of these plates may also be provided with holes.

With a view of obtaining during the feeding operation of the above stated materials a great saving of the said materials and of work all the cast iron abrading members, which may have a square, rectangular, oval, octagonal, circular or other shape, must be provided with holes. It will be preferable to use circular abrading members, which may be of large, medium or small size.

On the grinding disk carrier a wire lattice or sieve is provided in order to cause the sand and the emery to fall in a convenient manner on the platforms or tables and to prevent the flints contained in the sand from passing through. Owing to this arrangement any breakage which might occur during the grinding operation owing to the presence of these flints is avoided. The water used for the grinding operation could be caused to fall on the platforms or on the abrading member carrier when the sand is not very dry.

The sand may be replaced by other materials such as metallic globules and the like which are put on the platforms or tables or on the abrading member carriers in the above described manner. These materials could be recovered by means of a tank or gutter secured by means of hinges to the circumference of the platform. The said globules could be recovered and used again as many times as judged convenient.

The dimensions of the holes may vary according to the dimensions of the abrading carriers and the work to be performed.

With my abrading members no strong applying pressure is needed and consequently combustible may be saved as the required motive power is less important.

On the upper side of the abrading member carrier and in front of each of the perforated abrading members funnels preferably made of sheet metal are arranged. These funnels will all be arranged in such a manner that the abrading materials will exactly fall directly into the holes of the abrading members. The wire lattice or sieve will be arranged above these funnels.

The whole will be made of cast iron, or of steel and the like and be arranged in such a manner that the abrading members and the rim may be well secured in place.

The Figs. 1 and 2 of the annexed drawings show an abrading disk carrier constructed according to this invention.

13 designates a bucket chain arranged at a suitable distance of the platform.

14 is the wire lattice arranged above the funnels 15.

Carried by the bottom member 17 is a cover 16 forming a space between the top of the funnels 15 and the base 17. 17 is the bottom of this carrier and 18 are the abrading disks. The latter are provided each with three lugs 19 provided with two holes. The

dimensions and thickness of these lugs will be such as the manufacturer judges most convenient.

The abrading disks may be provided with holes as shown in Fig. 3.

According to the feed which the manufacturer desires to obtain a more or less large number of cast iron abrading members may be arranged on the abrading member carrier, or holes may be provided between the funnels.

Having now fully described my said invention, what I claim and desire to secure by Letters Patent is:

1. In a grinding and polishing machine the combination of a rotating perforated carrier, a cover carried thereby forming a compartment, funnels extending through the cover and communicating with certain of the perforations of the carrier and perforated disks carried by the under surface of the carrier, the perforations of the disk registering with the perforations of the carrier.

2. In a grinding and polishing machine, the combination of a rotating perforated carrier with compartments thereover, funnels discharging into perforations of the carrier, and disks applied to the under surface of the carrier and having apertures alining with the perforations in the carrier.

In testimony whereof I have hereunto set my hand in presence of two witnesses.

ISIDORE RAMBOUX.

Witnesses:

GREGORY PHELAN,

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