

A. G. F. KUROWSKI.  
TYPE WRITING MACHINE.  
APPLICATION FILED JUNE 29, 1910.

973,519.

Patented Oct. 25, 1910.

Fig. 1.

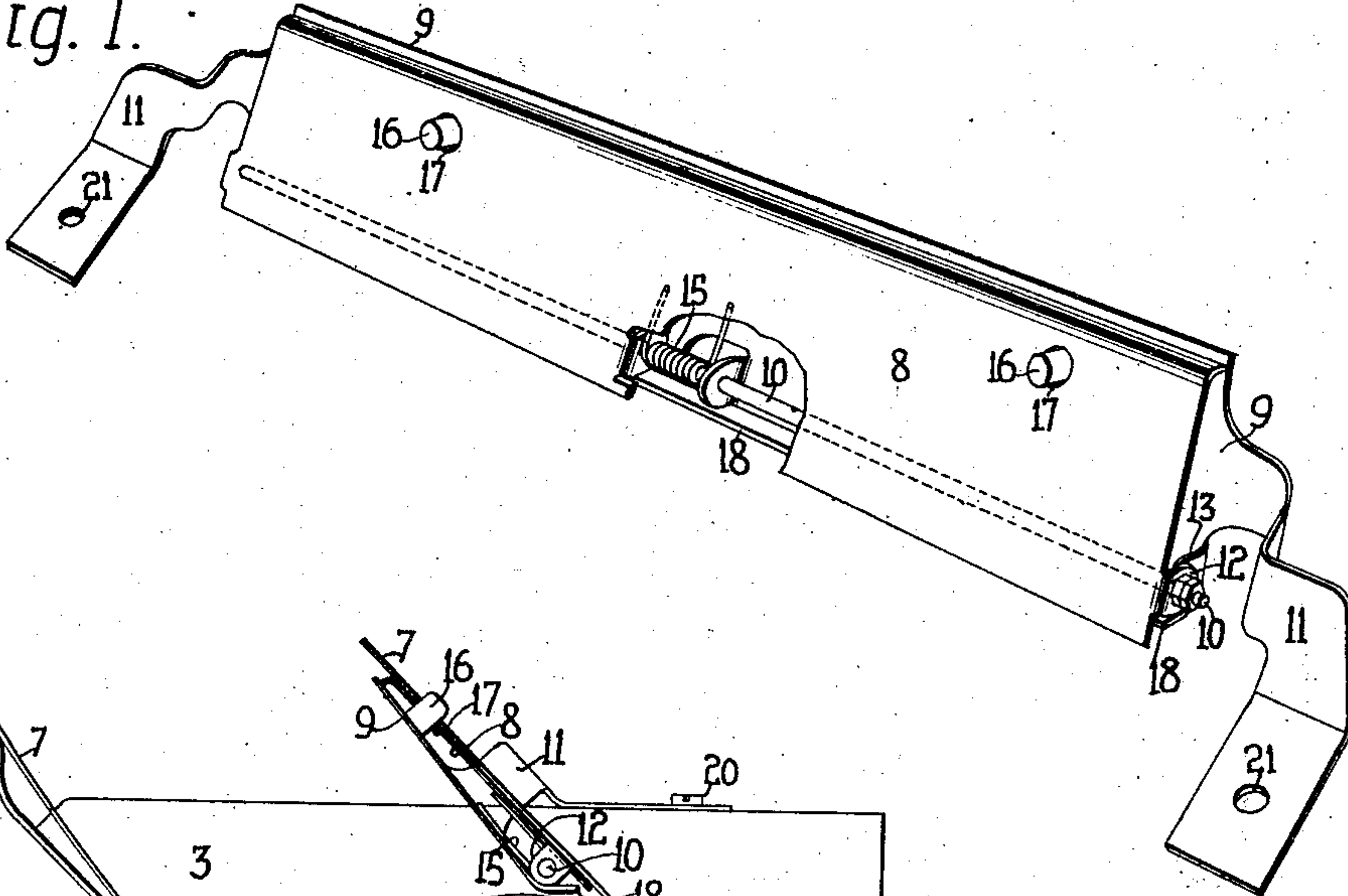


Fig. 2.

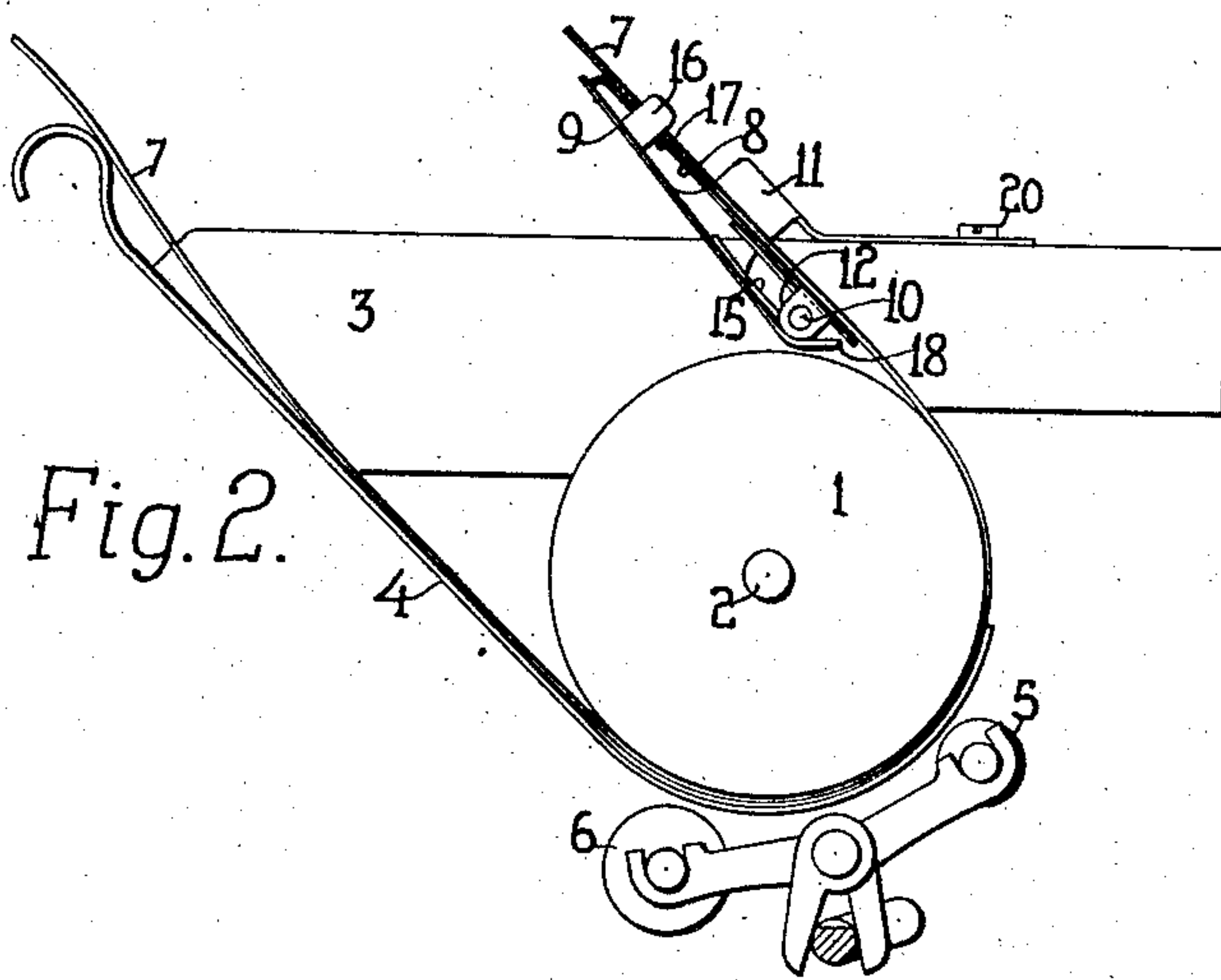


Fig. 3.

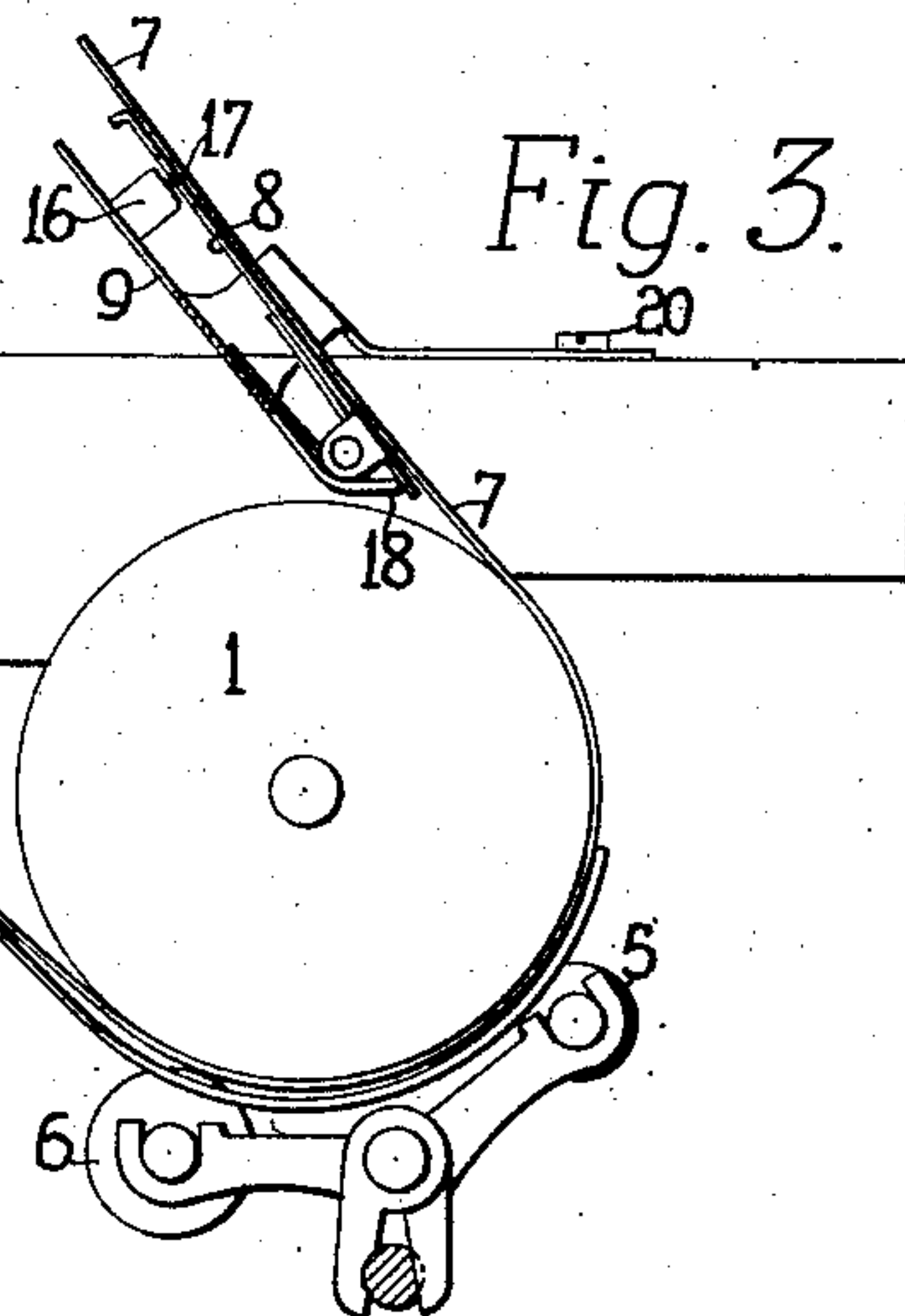
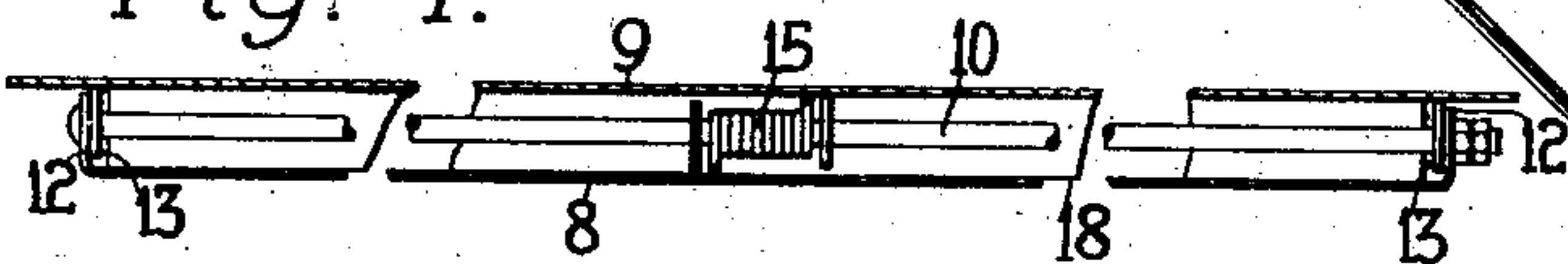


Fig. 4.



Witnesses.

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## UNITED STATES PATENT OFFICE.

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## TYPE-WRITING MACHINE.

973,519.

Specification of Letters Patent.

Patented Oct. 25, 1910.

Application filed June 29, 1910. Serial No. 569,511.

*To all whom it may concern:*

Be it known that I, ALFRED G. F. KUROWSKI, a citizen of the United States, residing in borough of Brooklyn, city of New York, in the county of Kings and State of New York, have invented certain new and useful Improvements in Type-Writing Machines, of which the following is a specification.

This invention relates to sheet alining mechanism for typewriting machines and is an improvement on the construction shown in my application filed January 28, 1910, Serial No. 540,519, wherein the leading end of a perforated work sheet is laid upon a paper table, from which project a pair of pins or studs, upon which the perforated sheet is impaled. When the sheet is caught by the usual pressure rolls, the pins are caused to disappear, so as to present no obstruction to the advance of the work sheet.

One object of this invention is to simplify and improve the construction and operation of mechanism of this character, particularly with a view to enabling the sheet to be impaled upon and stripped off from the pins without shifting the pins, and without the necessity of manipulating a special key or the like.

According to the present invention, the apertured table, which overlies or sheathes the pins, is mounted so as to yield under the pressure of the operator's fingers upon the work sheet and table, whereby the sheet is impaled upon the stationary pins as the table swings downwardly. The sheet and table may be held down until the sheet is caught by the usual pressure rolls, after which the relief of pressure upon the table permits the latter to rise to normal position, and in so doing, it strips the work sheet from the alining pins.

Another object is to enable the device to be readily attached to existing machines without exercising more than ordinary skill, to which end, the entire mechanism is carried by a frame or base releasably secured to the platen frame ends by which it is supported.

In the accompanying drawings, Figure 1 is a perspective view of the device, partly broken away. Fig. 2 is a sectional view through a platen frame and platen, showing the yielding paper table depressed to expose the alining pins. Fig. 3 is a similar view

showing the parts in normal position. Fig. 4 is a sectional view taken longitudinally of the device.

In an Underwood writing machine, a platen 1 has an axle 2 journaled in the platen ends 3 which are connected by a paper shelf 4. Front and rear pressure rolls 5 and 6 are mounted to be cast off from and restored to the platen, as in Figs. 2 and 3.

A work sheet 7 is guided by the paper shelf 4 to the platen, around which it passes freely when the feed rolls are cast off, the leading edge of the sheet rising in front of the platen and above a paper table 8 located over the platen and usually inclined upwardly and rearwardly from the platen to afford a support for the work sheet while being adjusted.

The leading end of the work sheet which may be perforated, as is common in bills, leaves of loose-leaf ledgers, and the like, is pressed down upon the paper table 8, which, by reason of a pivotal connection 10, 12 and 13 with a base or frame 9 supported by arms 11, detachably secured to the platen frame ends 3, yields downwardly (Fig. 3) so as to expose or unsheath several gage pins 16 normally in register with openings 17 in the paper table, so that they protrude in front of or above the outer face of the table to enable the perforated work sheets to be impaled thereon. The openings 17 are larger in diameter than the stationary pins 16, to enable the table to swing about its pivot 10 and clear the pins.

Preferably while the sheet and table are held depressed, the feed rolls 5, 6, are restored to the platen to catch and retain the alined sheet, after which the pressure on the table is relieved, whereupon a spring 15 (which may be mounted on the pivot rod 10 connecting the ears 12 of the table with the ears 13 of the base or frame) restores the table to normal position. In so doing, it strips the work sheet from the alining pins. The table normally is held up from the base by the spring, Fig. 2, and sheaths or covers the gage pins so that the sheet may be advanced without obstruction. A forwardly projecting ledge 18 on the base or frame 9 serves as a stop to determine the normal position of the table. The bent arms 11 are detachably secured upon the frame ends 3 by means of screws 20 passing through holes 21 in the arms.



Having thus described my invention, I claim:

1. In a typewriting machine, the combination with a platen, of sheet-alining mechanism comprising gage pins, and a shiftable paper table to cover or overhang said pins and having openings to register with the pins.

2. In a typewriting machine, the combination with a platen, of sheet-alining mechanism comprising gage pins, and a yielding paper table having openings therein to register with the pins to uncover the latter only when the perforated work sheet is to be strung upon the pins.

3. In a typewriting machine, the combination with a platen, of a sheet-alining mechanism including gage pins, a paper-table hinged to swing relative thereto and having openings to register with the pins, and means to hold the paper table in position to sheath the pins.

4. In a typewriting machine, the combination with a platen, of sheet-alining mechanism, including a yielding paper table, and gage pins upon which the work-sheet is impaled, said pins rendered normally ineffective by the position of the paper table relative thereto.

5. In a typewriting machine, the combination with a platen, of sheet-alining mechanism comprising stationary gage-pins, upon which the work-sheet is impaled, a shiftable paper table in proximity to the pins, and means to hold the paper table in position to sheath the pins to enable the leading edge of the sheet to clear the pins.

6. In a typewriting machine, the combination with a platen, of a sheet-alining mechanism including gage pins on which the leading edge of the work sheet is strung, a yielding paper table having openings with which the pins register, to expose said pins when the sheet is to be alined, and means to return the paper table to normal position to strip the sheet from the pins as the latter are sheathed.

7. In a typewriting machine, the combination with a platen, of a sheet-alining mechanism including gage pins supported above the platen, a yielding paper table lying be-

tween the platen and the gage pins, and having openings with which the pins register, and means to cause the table normally to sheath the pins and guide the sheets clear thereof.

8. In a typewriting machine, the combination with a platen and platen frame, of a sheet-alining mechanism including gage pins, a yielding paper table having openings with which the pins register to expose the pins only when the table is operated, and means to removably attach the mechanism to the platen frame.

9. In a typewriting machine, the combination with a platen and platen frame, of a sheet-alining mechanism comprising a base detachably secured to the platen frame, gage pins mounted on the base, a paper table hinged to the base and having openings with which the pins register, and means yielding under pressure to hold the table in position to sheath the pins and guide the sheets clear thereof.

10. In a typewriting machine, the combination with a platen and platen frame, of a sheet-alining mechanism comprising a base detachably secured to the platen frame, gage pins mounted on the base, a paper table hinged to the base and in proximity to the pins, means yielding under pressure to hold the table in position to sheath the pins and guide the sheets clear thereof, and a stop to arrest the table in such position.

11. In a typewriting machine, a sheet-alining mechanism for alining perforated sheets wherein the leading edges of the perforated sheets are pressed down upon a paper table having openings which register with gage pins carried by a base, the pressure against the paper table causing the latter to yield against the tension of a spring, to unsheath or expose the gage pins over which the sheets are set, the spring operating upon the removal of the pressure, to shift the table to strip the sheets from the pins and sheath the latter so that the sheets as they are advanced clear the pins.

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