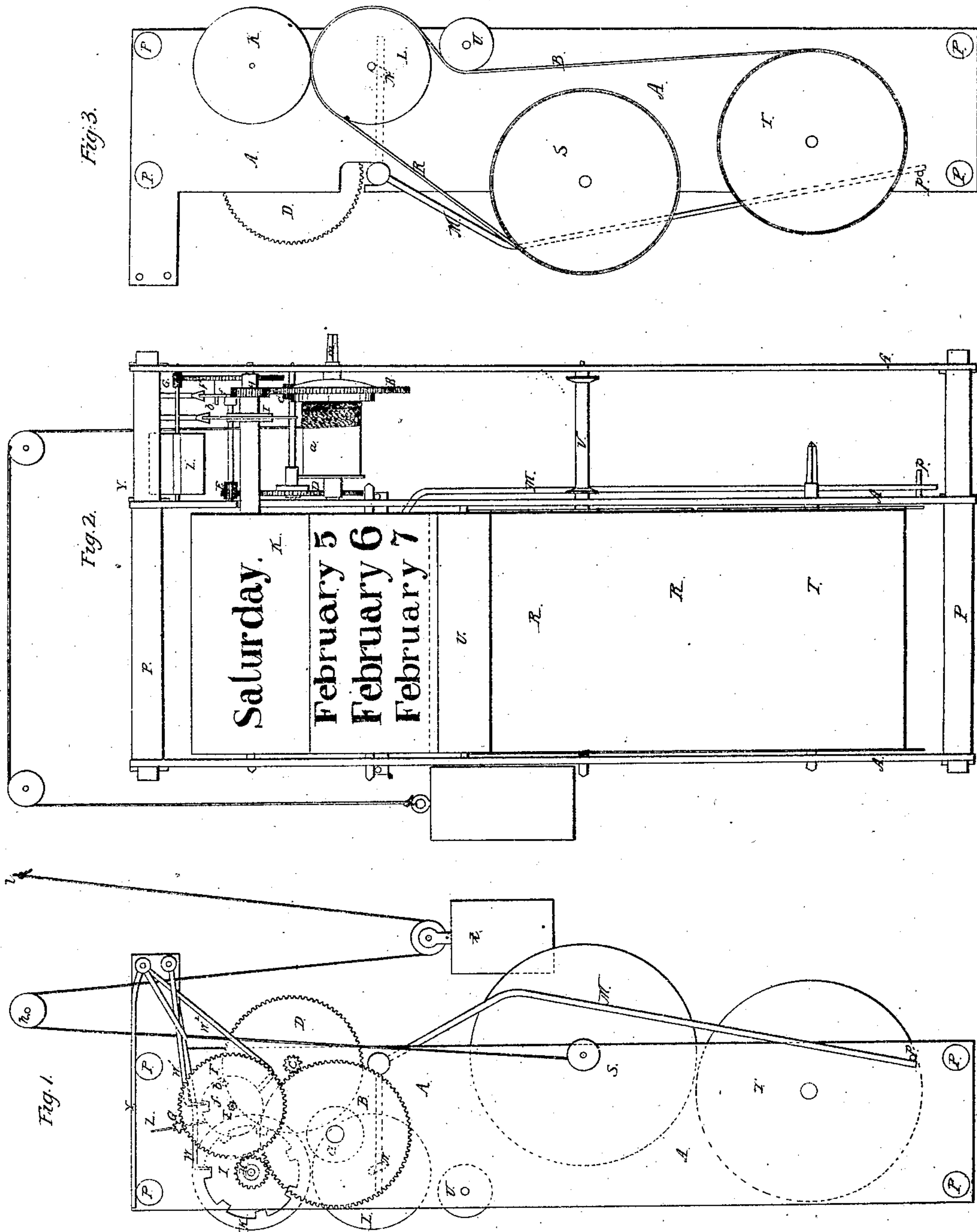


No. 10,355.

PATENTED DEC. 20, 1853.

W. H. AKINS.
MACHINE FOR REGISTERING TIME.

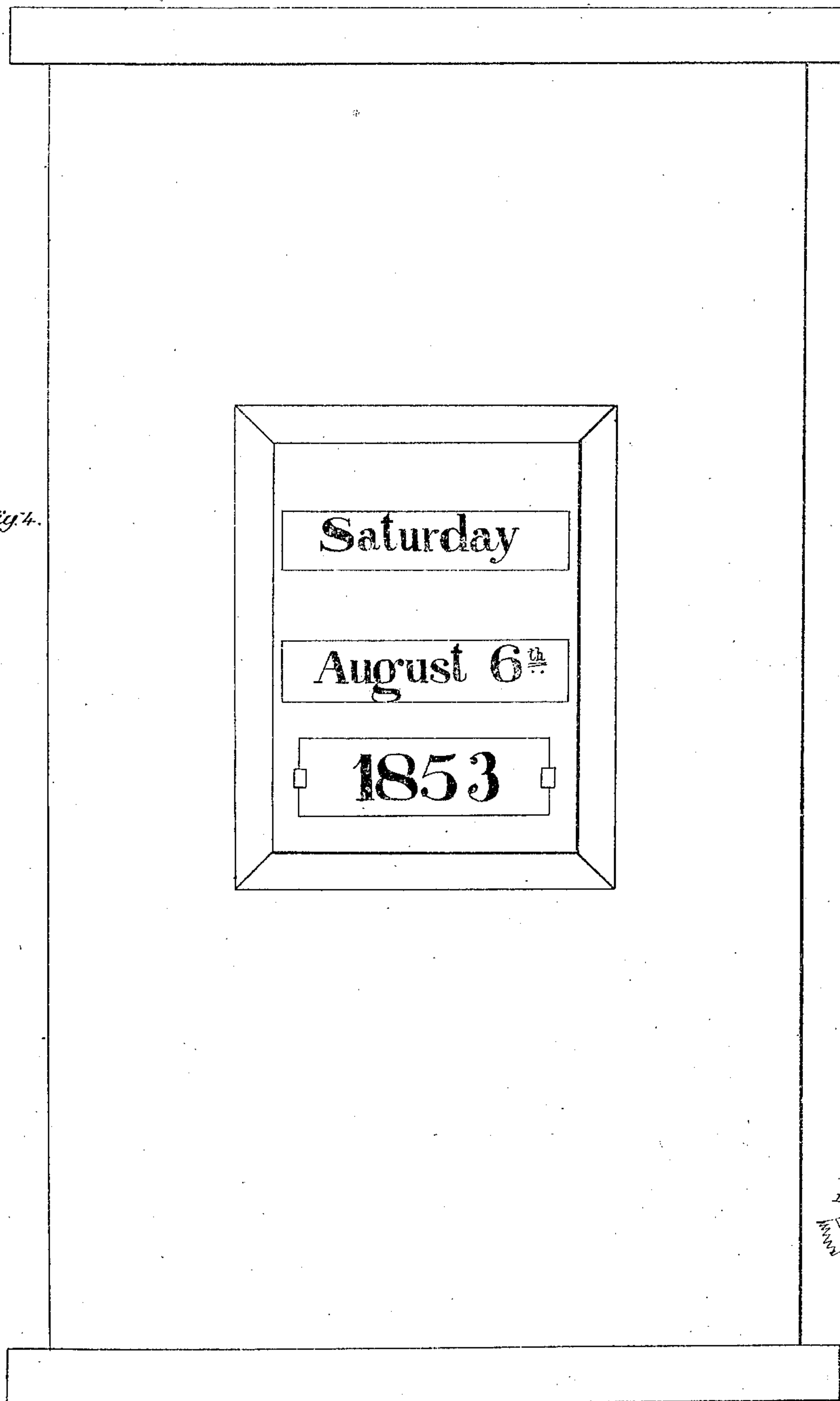
2 SHEETS—SHEET 1.



W. H. AKINS.
MACHINE FOR REGISTERING TIME.

2 SHEETS—SHEET 2.

Fig. 4.



R Fig. 5.

February 1
February 2
February 3
February 4
February 5
February 6
February 7
February 8
February 9
February 10
February 11
February 12
February 13
February 14
February 15
February 16
February 17
February 18
February 19
February 20
February 21
February 22
February 23
February 24
February 25
February 26
February 27
February 28
March 31
April 30
May 31
June 30
July 31
August 31
September 30
October 31
November 30
December 31
January 31
February 1
February 2
February 3
February 4
February 5
February 6
February 7
February 8
February 9
February 10
February 11
February 12
February 13
February 14
February 15
February 16
February 17
February 18
February 19
February 20
February 21
February 22
February 23
February 24
February 25
February 26
February 27
February 28
February 29
March 1
March 2
March 3
March 4
March 5
March 6
March 7
March 8
March 9
March 10

These Months continue in the same Order as February

Leap Year

UNITED STATES PATENT OFFICE.

WM. H. AKINS, OF ITHACA, NEW YORK, ASSIGNOR TO W. T. HUNTINGTON.

TIME-REGISTER FOR SHOWING THE DAY OF THE WEEK AND MONTH.

Specification of Letters Patent No. 10,355, dated December 20, 1853.

To all whom it may concern:

Be it known that I, WILLIAM H. AKINS, of Ithaca, in the county of Tompkins and State of New York, have invented a new and useful Calendar or Machine for Registering Time; and I do hereby declare that the following is a full and exact description of the construction and operation of the same, reference being had to the annexed drawings, making a part of this specification, in which—

Figure 1, is a view of the working part of the register. Fig. 2, is a view of the working part and rollers of the register. Fig. 3 is a view of the paper and the plan of disposing of it. Fig. 4 is a view of the register in working order. Fig. 5 is a view of the paper R, showing the plan of marking it with the months, days, &c.

Description of register.—A, A, are frame plates; P, P, posts of frame; B, first mover containing 93 teeth; C, pinion with 12 teeth; D, wheel 84 teeth; E, pinion with 7 teeth; F, wheel 60 teeth; G, pinion 6 teeth; Z, fly to steady motion; H, pinion of 21 teeth; I, notched wheel having 7 notches; K, roller $3\frac{1}{4}$ inches long having the days of the week marked on its periphery lengthwise of the roller; L, roller $3\frac{1}{4}$ inches long, running in the slot N, and pressed up to the roller K, by the spring lever M; R, R, R, paper, tape, ribbon, or other suitable material, showing a face $3\frac{1}{4}$ inches wide on which are marked the names and days of the months, commencing on the 1st of February and continuing Feb. 2 Feb. 3 and so on until Feb. 28 is registered, and then commencing March 1st, March 2 and continuing the whole 31 days and then April 30 days, May 31 days, June 30 days, July 31 days, August 31 days, September 30 days, October 31 days, November 30 days, December 31 days, January 31 days, and then again February containing 29 days and running into March some 8 or 10 days at the last end of the paper. The size of the letters composing the names of the months and the figures denoting the day of the month, must be inclosed in a space of $\frac{1}{7}$ the circumference of the roller, which space in the present instance is $\frac{5}{8}$ of an inch. S, roller to which the first end of the paper R is attached; T, roller to which the other end of the paper R is attached; U, roller to keep paper or other material tight on the roller L; a, barrel to which the cord is attached

having a weight or spring for a motive power. This barrel is attached to the shaft of the prime mover B; *f*, wheel with a notch in to receive wire *W'* and a small pin *b* fastened securely on its face; *W*, wire that falls into the notched wheel *I*; *W'*, wire that falls into the notched wheel *f*; *W²*, wire that catches the pin *b* in wheel *f* by means of hook; *Y*, wire that is attached and let fall by a connection to a wheel in the time piece above, which makes one revolution in 24 hours. Said wheel has a pin in its side so as to lift wire *Y* by having a connection extending under wire *Y*. *W*, *W'*, *W²*, being all subject to the movement of the wire *Y* are all lifted at the same time and as soon as the wires *W* and *W'* are liberated the work is released and moves forward until the pin *b* in wheel *f* comes in contact with *W²*. The work then stops a short time until the wire *Y* is liberated from the connection of the 24 hour wheel attached to the time piece, when it again moves forward until the wires *W* and *W'* drop into their proper notches, and the work stops for 24 hours or until the wire *Y* is again lifted.

The paper or other material *R* is attached to and wound upon roller *T*, with the exception of enough of the upper or first end to pass up behind roller *U* and over roller *L*, between *L* and *K* and to reach the roller *S* to which it is attached.

V is a barrel firmly attached to shaft of roller *S* to which a cord is fastened running up over a pulley *h* and fastened at *l*. Between *h* and *l* there is a weight *t* placed on the cord, having a movable pulley on the top of it. By this arrangement a long cord is dispensed with.

Description of the operation.—To wind up when run down; put the key upon *m* the square end of the shaft of wheel *B*. Turn right handed or over toward dial until the weight or spring is wound up. Release the spring lever *M* from the pin *p* in the frame plate and the roller *L* will drop slightly in the slot *N* and relieve the paper between *K* and *L*. Then place the key upon the square end of the shaft of roller *T*. Wind steadily right handed or over toward the dial until the proper or right month and day of the month appears on the paper inclosing roller *L*. Raise roller *L* by means of the spring lever *M* and retain it on pin *p*.

At the hour of low 12 or midnight the pin in the side of the 24 hour wheel in the

time piece, raises the wire Y lifting the wires W, W', W², out of the notches in I and f; and the work moves forward slightly until the pin b catches the hook on W².
 5 The work then stops until the wire Y is liberated and falls when W² falls also and releases wheel f and the work moves forward 1 day in the operation. Here it remains until 12 midnight again, when the
 10 wire Y, is again liberated and it moves forward as before. The paper R being firmly held between rollers K and L is consequently drawn between them every 24 hours, one day on the paper R. As the paper is
 15 drawn back by the rollers K and L the weight winds what is drawn through upon roller S.

The machine must be wound up each year during the month of February, excepting
 20 leap year, when it must be allowed to run into March, but must be wound before the 8th or 10th of March.

Having described the register, what I claim as my invention, is,

25 1. The particular arrangement of the months, with their appropriate number of days as described on the paper R; and for the purposes described, commencing Febru-

ary 1st, Feb. 2nd, Feb. 3rd, and so on for 28 days only; and then all of the other 30 months in their regular order, with their appropriate number of days for the whole year, (with the February first mentioned, and having the 28 days.) Then again Feb-
 35 ruary, having 29 days and also eight or ten days of another March, at the last end of the paper R, and within which eight or ten days the machine must be wound up, in every bissextile, or leap year and requiring
 40 to be wound up in the first, second, and third years, after leap year during February having the 29 days, and before the 29th day thereof.

2. The arrangement and combined action of the rollers K and L, showing the day of 45 the week, and drawing up the paper R, exhibiting the month and days of the months in their regular order substantially as set forth, the paper, after it is drawn between
 50 the rollers K and L being disposed of by winding it upon the roller S, by means of a weight, or spring, as described.

WILLIAM H. AKINS.

Witnesses:

CALEB B. DERKIN,
 J. H. WINFIELD.