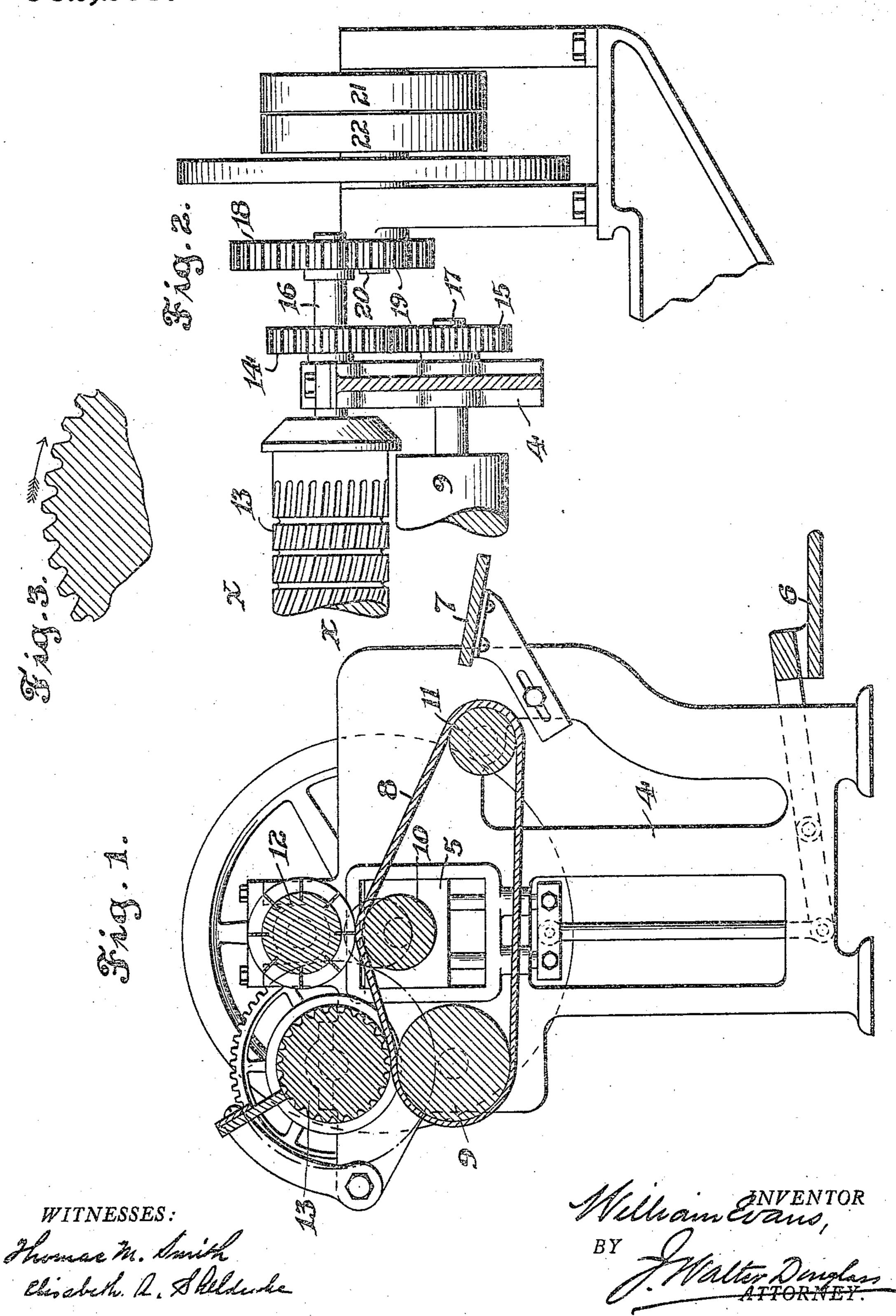
W. EVANS. MACHINE FOR TREATING HIDES OR SKINS. APPLICATION FILED FEB. 12, 1910.

962,205.

Patented June 21, 1910.



UNITED STATES PATENT OFFICE.

WILLIAM EVANS, OF PHILADELPHIA, PENNSYLVANIA.

MACHINE FOR TREATING HIDES OR SKINS.

962,205.

Specification of Letters Patent. Patented June 21, 1910.

Application filed February 12, 1910. Serial No. 543,560.

To all whom it may concern:

Be it known that I, William Evans, a citizen of the United States, residing at the city of Philadelphia, in the county of Philadelphia and State of Pennsylvania, have invented certain new and useful Improvements in Machines for Treating Hides or Skins, of which the following is a specification

tion. My invention relates to certain improvements in a machine for fleshing or slating hides or skins by the use interchangeably of a knife or fleshing cylinder or of a slating cylinder in conjunction with an endless ad-15 justable conveyer-apron when provided with a grip-roller for holding or positioning the hide or skin while acted upon in its travel, corresponding in diameter to that of the drive-roller for said conveyer-apron, and 20 which rollers are positively geared together, to revolve at the same speed and thus to insure better control of the feed and correspondingly improved fleshing or slating action upon the skin or hide and also econ-25 omy in wear throughout of the grip-roller in practical use in such type of machines;

structive arrangement of the grip-roller for such a type of machine, which in diameter corresponds to that of the drive-roller, for an endless conveyer-apron, the said grip-roller having certain surface formations, as helical grooves broken by circular grooves in spaced relationship, arranged transversely to the helical grooves, whereby is provided a means due to such arrangement, for the uniform and even holding of the hide or skin in its travel through the machine.

and my invention further relates to the con-

My invention consists first, in a machine for treating hides or skins having a griproller in diameter corresponding to the drive-roller for an endless adjustable conveyor-apron arranged to be manually shifted into the path of a rotating fleshing or slating cylinder; and second, a grip-roller of the character defined.

The nature, characteristic features and scope of my present invention will be more fully understood from the following description taken in connection with the accompanying drawings forming part hereof, in which—

Figure 1, is a vertical central sectional view through a machine for treating hides or skins, embodying particularly main fea-

tures of my said invention. Fig. 2, is a front elevational view in broken section of so much of a machine as serves to illustrate my said invention, in operative relation- 60 ship, for the performance of the actions upon a hide or skin, as hereinbefore defined, and also showing the grip-roller provided with helical grooves, broken by circular grooves in spaced relationship and arranged 65 transversely to the helical grooves thereof; and Fig. 3, is a vertical sectional view of the said grip-roller on the line x, x, of Fig. 2.

Referring to the drawings, 4 is a side standard of the machine.

5 is a mechanism for operating a treadle 6. 7 is a feed table adjustably connected with standards 4.

8 is an endless conveyer-apron mounted on rollers 9, 10, 11, as shown, in an operative 75 position. The roller 9 is the drive-roller.

10 is the shiftable roller actuated by means of the treadle-mechanism within the standards 4, and 11 is the stationary guideroller of the conveyer-apron 8.

12 is either a rotary fleshing or slating cylinder, journaled in the standards 4, and operated in any well understood manner. A familiar example, of a type of fleshing or knife cylinder that may be used is shown and 85 described in United States Letters Patent granted to me, under date of September

25th, 1894, No. 526,387.

13, is the grip-roller journaled in the standards 4, and on a journal 16 thereof is 90 mounted a gear 14, arranged to mesh with a complemental gear 15, on a journal 17, of the apron drive-roller 9. Both of said gears being arranged beyond one of the standards 4. The journal 16, carries a large gear-wheel 18, 95 which meshes with a smaller gear 19, and both operative from the main driving shaft 20. This shaft carries loose and fast pulleys 21 and 22, as clearly illustrated in Fig. 2. The drive-roller 9, and grip-roller 13, are 100 each of the same diameter and geared to each other so that they do travel at the same rate of speed and thereby to uniformly or evenly hold the hide or skin in its travel through the machine, when the apron 8, is brought 105 into an operative position, as shown in Fig. 1; and also to economize in wear of the griproller 13, and thus to insure better fleshing or slating action of the hide or skin, owing to the unison action as to speed of the said 110 grip-roller 13, with respect to that of the drive-roller 9, of the apron 8, carrying the

hide or skin through the machine, aided particularly by the particular surface formations of the grip-roller 13, as clearly shown in Figs. 2 and 3. The surface formations 5 consist of helical grooves broken by circular grooves in spaced relationship and arranged transversely to the helical grooves throughout the said roller 13. By reason thereof more perfect, smooth or even surface condi-10 tions are given to the hide or skin in the fleshing or slating thereof. The defined arrangement of roller 13, enables particularly economical results being obtained, because of the uniform wear of the parts of the ma-15 chine, due to the unison of speed as arranged, of the said working parts of the machine.

Having thus described the nature and objects of my invention, what I claim as new and desire to secure by Letters Patent is:—

1. In a machine provided with a conveyerapron and drive-roller, a grip-roller in diameter corresponding to that of said driveroller, and said grip-roller provided with certain grooved formations broken by cer- 25 tain grooved formations in spaced relationship, oppositely arranged in respect to each other, to insure thereby, more smooth or even surface conditions being given to the hide or skin, substantially as described.

2. In a machine provided with a conveyerapron and drive-roller, a grip-roller in diameter corresponding to that of said driveroller, and said grip-roller provided with helical grooves broken by circular grooves in 35 spaced relationship, arranged transversely to said helical grooves, substantially as and for the purposes described.

In witness whereof, I have hereunto set my signature in the presence of two sub- 40 seribing witnesses

scribing witnesses.

WILLIAM EVANS.

Witnesses:

J. Walter Douglass, Thomas M. Smith.