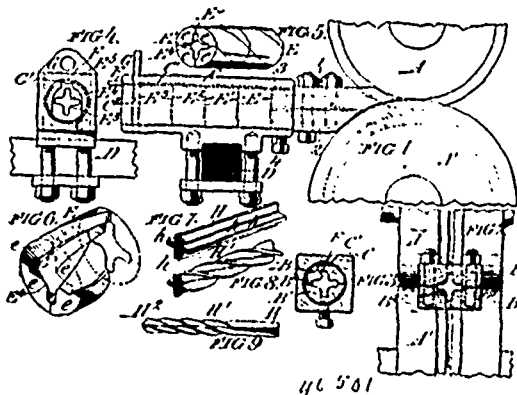


C, and adapted to be readily removed therefrom. 5th. As a device for twisting flanged rods, a pair of grooved rolls A, A', in combination with a die holder C situated in front thereof, a guide B, B',



leading from the rolls to the die holder, and twist die or dies E made up of sections e, e, e, e, equal to the number of flanges on the bar to be twisted, and each adapted to lie between adjoining flanges, said sectional die or dies being held in the holder C, but adapted to be readily removed therefrom.

#### No. 46,502. Process of Waterproofing Leather.

(*Procédé pour rendre le cuir à l'épreuve de l'eau.*)

Edward H. Lewis, St. Louis, Missouri, U. S. A., 5th July, 1894; 6 years.

**Claim.**—1st. The herein described process of rendering leather pliable and waterproof, which consists in applying to its surface a mixture of caoutchouc and a solvent volatile vehicle, which carries the caoutchouc into the pores of the leather, and, by evaporation, deposits and leaves it there, substantially as described. 2nd. The herein described process of rendering leather pliable and waterproof, which consists in spreading upon its surface caoutchouc which is dissolved in a volatile vehicle, permitting the mixture to remain until absorbed by the leather and volatilization takes place, which leaves a deposit of caoutchouc in the pores of the leather, and then powdering or applying to the surface so treated soapstone or other absorbent material to remove the gummy or sticky surface, substantially as described. 3rd. The herein described compound to be applied to the leather for waterproofing purposes, composed of rubber paste or caoutchouc, and a volatile solvent, substantially as described.

#### No. 46,503. Fertilizer. (*Engrais.*)

Silvester B. Schenck, Newark, New Jersey, U.S.A., 5th July, 1894; 6 years.

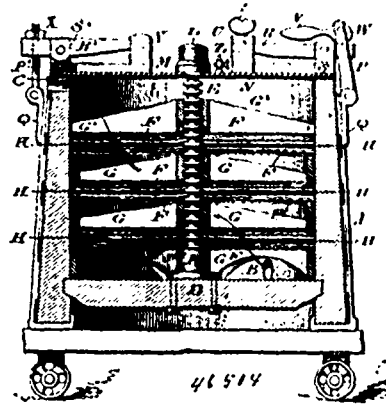
**Claim.**—1st. The fertilizer compound herein set forth, produced by the combination of skins or their products or other like nitrogenous materials, treated with sulphuric acid, excrement, (night-soil) and ground tobacco, substantially as set forth. 2nd. The fertilizer compound herein set forth, produced by the combination of skins or their products, or other like nitrogenous materials, treated with sulphuric acid, excrement, (night-soil) ground tobacco, and bone-black, substantially as set forth. 3rd. The herein described process of producing a fertilizer, which consists as follows, to wit:—first, boiling skins, or their products, or other like nitrogenous materials, in sulphuric acid, to produce a jelly-like mass, secondly, adding excrement, (night-soil) and ground tobacco, and mixing the same, substantially as set forth. 4th. The herein described process of producing a fertilizer, which consists as follows, to wit:—first, boiling skins or their products or other like nitrogenous materials, in sulphuric acid, to produce a jelly-like mass, secondly, adding excrement, (night-soil) bone-black, and ground tobacco, and mixing the same, substantially as set forth.

#### No. 46,504. Filter. (*Fitre.*)

Charles C. Froelich, Pottstown and William Lorey, and Henry Guenther, both of Philadelphia, all of Pennsylvania, U.S.A., 5th July, 1894; 6 years.

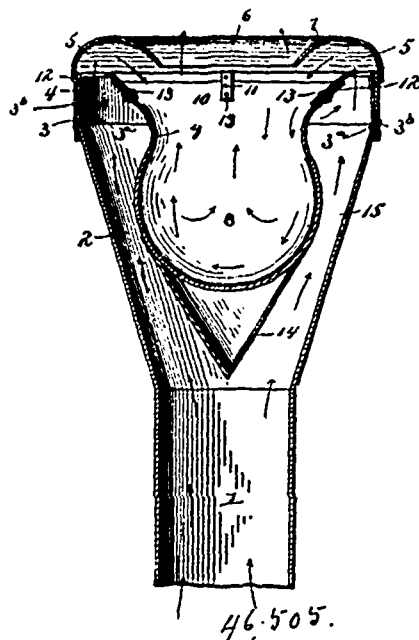
**Claim.**—1st. A filter consisting of a tank having a screw with a continuous thread rising from the bottom thereof, spiders with hubs adjustable on said screw, and arms with rims integral therewith, said arms having portions of reduced height, screens between said spiders, said tank having an inlet below the lowest spider, said parts being combined substantially as described. 2nd. A filter having a tank with screens and filtering material between the same, and

diaphragms adapted to retain said screens and compress said material, in combination with a screw rising from the bottom of the



tank, and a nut which is fitted on the upper end of the screw and tightens against said lid, said parts being combined substantially as described.

#### No. 46,505. Spark Arrester. (*Arrête-étincelle.*)



Arend Hasper, Westfield, North Dakota, U.S.A., 6th July, 1894; 6 years.

**Claim.**—1st. The combination of a stack having a conical head, of a superposed deflecting hood or cap, a rounded receptacle suspended centrally in the head and having a contracted neck terminating in an upwardly flared mouth or flange to direct the products to the outer side of the hood or cap, substantially as specified. 2nd. The combination with a stack having a conical head terminating in a vertical rim, of a sleeve surrounding and vertically adjustable upon said rim, a deflecting hood or cap connected to and carried by the sleeve, and a receptacle suspended centrally in the head, substantially as specified. 3rd. The combination with a stack, of a sleeve threaded exteriorly upon the upper end thereof, a deflecting hood or cap carried by said sleeve, and a receptacle suspended within the stack, substantially as specified. 4th. The combination with a stack having a conical head terminating in a vertical rim, of a sleeve surrounding and adjustably connected to said rim, a deflecting hood or cap hinged to the upper edge of said sleeve, and a receptacle suspended within the head, substantially as specified. 5th. The combination with a stack and a superposed deflecting hood or cap, of a receptacle arranged centrally within the stack, and having an upwardly flared-mouth and supporting braces fixed at their outer terminals to the side walls of the stack and adjustably connected at their inner ends to the flared mouth of the receptacle, substantially as specified.