(No Model.)

W. E. GINN.

SCISSORS OR KNIFE SHARPENER.

No. 525,414. Patented Sept. 4, 1894

Fig. 1.

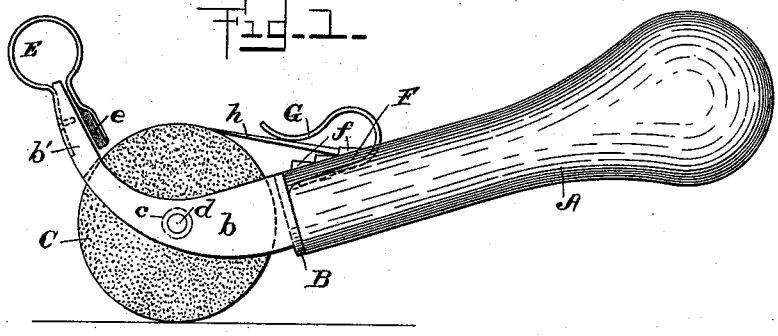


Fig. 2.

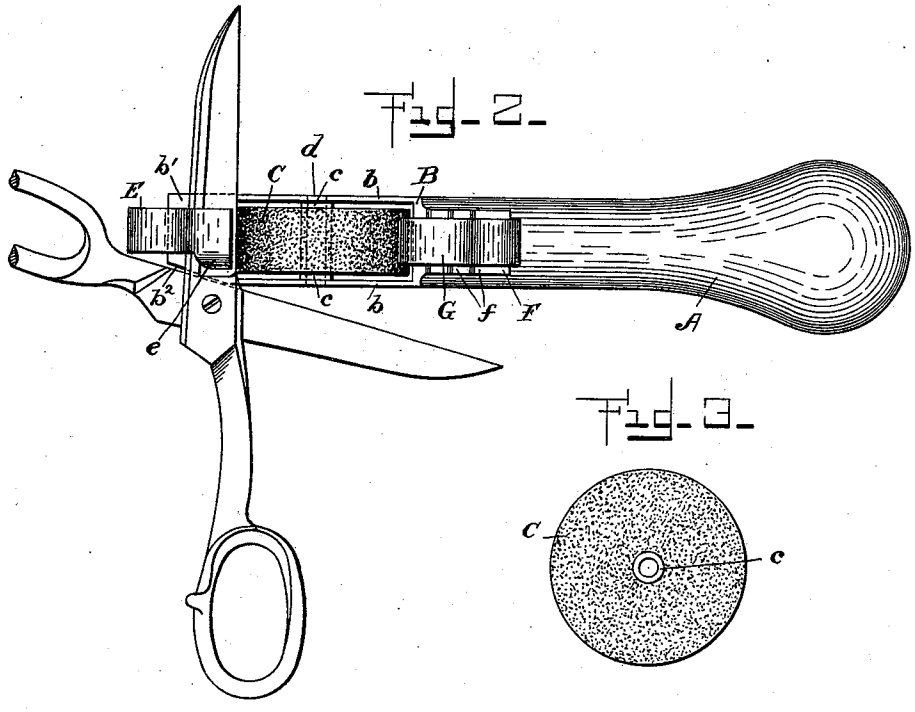


Fig. 3.

Witnesses:

Thos. A Lay

G. C. Woodis

Inventor.

William E. Ginn,

By A. M. Smith & Son,

Attorneys.

THE NORRIS PETERS CO., PHOTO-LITHO., WASHINGTON, D. C.

UNITED STATES PATENT OFFICE.

WILLIAM E. GINN, OF BALTIMORE, MARYLAND, ASSIGNOR OF FIFTY-ONE ONE-HUNDREDTHS TO LEWIS STEIGERWALD, OF SAME PLACE.

SCISSORS OR KNIFE SHARPENER.

SPECIFICATION forming part of Letters Patent No. 525,414, dated September 4, 1894.

Application filed January 15, 1894. Serial No. 496,910. (No model.)

To all whom it may concern:

Be it known that I, WILLIAM E. GINN, a citizen of the United States, and a resident of Baltimore, in the State of Maryland, have invented a new and useful Improvement in Scissors or Knife Sharpeners, of which the following is a full, clear, and exact description, reference being had to the accompanying drawings, making part of this specification.

My invention relates to a novel construction of a traveling device for sharpening the blades of scissors, knives, &c., and consists in providing the propelling handle of the device with a sharpening wheel, which forms also the carrying wheel of the device, a blade support and a spring for holding the blade on said support; also in providing said device with a second blade support on the propelling handle, the sharpening and carrying wheel being located intermediate the two blade supports, as hereinafter described and claimed, and in certain details of construction and arrangement of parts, hereinafter specified.

In the accompanying drawings:—Figure 1 represents my improved sharpener in side elevation. Fig. 2 is a plan view of the same, showing a scissors blade in position to be operated upon, and Fig. 3 is a side elevation of the emery wheel, detached.

A indicates the handle of the sharpener, made, preferably, of wood and in the form of an ordinary tool handle. To the bit end of this handle is secured a bifurcated or slotted bracket extension or holder B, between the parallel arms or sides *b*, *b*, of which, is located the emery or grinding wheel C, mounted on a tubular bearing sleeve *c*, journaled on a through pin or rivet *d*, secured in the side bars *b*, *b*, and on which the wheel C can freely revolve.

The bracket arms *b*, *b*, extend forward of or beyond the wheel C and are there united by a cross bar *b'*, and form a seat or support for the blade to be operated upon. To the lower face of this cross bar *b'*, is secured the lower arm of a curved spring E, bent into loop form, with its upper arm overlying the cross-bar *b'*, for holding the blade snugly down thereon. The end of this upper end of the spring is deflected upward, or bent at an angle to the body of the spring and from the cross-bar *b'*, as shown at *e*, to permit the ready insertion of the point of the blade to be operated upon, between the spring and the blade support *b'*, said angular end of the spring serving also to crowd the blade snugly against the sharpening wheel as said blade is moved laterally across the periphery of the wheel.

The forward end of the blade support *b'*, on the side on which the blade to be sharpened is applied, is beveled at b^2, to accommodate the opposing blade or the handle and permit the blade which is being operated upon to be sharpened close up to the opposing blade or shank.

Upon the handle A, adjacent to the sharpening wheel C, is secured a plate F, provided with a series of offsets or shoulders *f*, giving to the upper face of the plate a serrated form, as shown in Fig. 1, and forming a second blade support, the different shoulders *f* accommodating different widths of knife blades.

A spring G of curved or loop form, similar to spring E, has its lower arm secured to the lower face of the plate, or in the socket in the handle for the reception of said plate, its upper arm extending forward over the plate and operating to press the blade, indicated at *h*, snugly down upon the periphery of the sharpening wheel C, as shown in Fig. 1.

The blade support *b'*, on the extended point of the holder, is shown slightly inclined from a right angle to the adjacent part of the periphery of the grinding wheel, for adapting it especially to the bevel on the cutting edges of a pair of scissors, while the support F, as will be seen, allows the broad side of the blade to approach the wheel and the side of its edge to rest in contact therewith, as indicated in the drawings and so is especially adapted to knife blades.

The emery or grinding wheel may be of any usual or suitable material for the purpose and is provided with a central tube or thimble for giving it increased durability, said tube projecting at its ends slightly beyond the sides of the wheel and abutting against the arms *b*, *b*, for removing the wear from the wheel.

The bracket or holder B may either be cast

in the form shown or it may be stamped from sheet metal with the side bars b, b, blade support b', and blade support F formed in a single piece, and then bent into the form shown, as preferred.

In operation, the point of the blade is inserted between the blade support and its overhanging spring arm; the operator then, with one hand, propels the device over the surface of a table or other suitable support therefor, thereby rotating the grinding wheel through frictional contact with said surface, while with the other hand, the blade to be sharpened is moved laterally back and forth across the face of said rotating wheel, thereby effecting the sharpening of the blade in a very easy and expeditious manner.

The form of the device and of the parts thereof, may of course be varied, but that shown, as showing a compact arrangement of the two blade supports with the sharpening wheel located between them, is well adapted to the uses described and constitutes a simple, effective and durable device for the purposes described.

Having now described my invention, what I claim as new, and desire to secure by Letters Patent, is—

1. The combination in a blade sharpener, of the propelling handle, the carrying emery wheel connected to said handle and a blade support adjacent to the carrying emery wheel, substantially as described.

2. In a blade sharpening device, the propelling handle provided with the wheel holder and the blade support, in combination with the grinding disk forming also the carrying wheel and the spring for holding the blade snugly on said support, substantially as described.

3. The combination in a blade sharpening device, of the propelling handle, the holder provided with bearings for the sharpening wheel, a shouldered blade support on the handle, a second blade support on the holder, the sharpening wheel forming also the carrying wheel, located intermediate said blade supports, and springs for holding the blades in contact with said supports, substantially as described.

4. In a blade sharpener, the propelling handle A, in combination with the frame or holder B, having bearings for the carrying and sharpening wheel and provided with the blade supports b' and F, formed in one piece with the holder, substantially as described.

In testimony whereof I have hereunto set my hand this 12th day of January, A. D. 1894.

WILLIAM E. GINN.

Witnesses:
WM. A. EASTERDAY,
LEWIS STEIGERWALD.