

(No Model.)

H. G. PIFFARD.

FILE.

No. 331,324.

Patented Dec. 1, 1885.

Fig. 1.



Fig. 2.

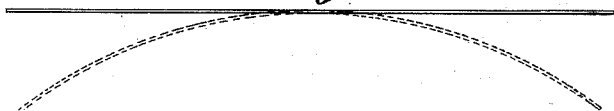


Fig. 3.



WITNESSES:

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HENRY G. PIFFARD, OF NEW YORK, N. Y.

FILE.

SPECIFICATION forming part of Letters Patent No. 331,324, dated December 1, 1885.

Application filed June 6, 1885. Serial No. 167,828. (No model.)

To all whom it may concern:

Be it known that I, HENRY G. PIFFARD, a citizen of the United States, and a resident of New York, in the county of New York and State of New York, have invented a certain new and useful Improved File, of which the following is a specification.

The object of my invention is to produce an improved file for filing curved surfaces.

My invention consists of an elastic metal file, or strip of spring metal having single-cut, double-cut, or other cutting-teeth.

I propose to make my improved file of any metal suitably tempered or treated so that the finished file shall be elastic, but prefer to make the same of steel.

The file may be made by taking a strip or piece of spring-steel and forming thereon the cutting-teeth in any desired manner; or the cutting-teeth may be formed on a blank of the desired shape, the material being in a soft state, and the temper or desired elasticity imparted afterward.

The file might be made from other materials—such, for instance, as brass; but steel is preferable on account of its superior hardness. In any case, however, the finished file of my invention consists of an elastic metal having file-teeth of any desired kind.

The finished elastic metal file is capable of application to curved surfaces with extensive contact in contradistinction to ordinary rigid metal files, which can be in contact with a curved surface to a limited extent only.

My improved elastic metal file is especially useful as a nail or manicure file, and in dental operations, but may obviously be made in various forms and be used for other purposes.

In Figure 1 of the accompanying drawings I have shown an ordinary elastic metal manicure-file, and in Fig. 2 the same is shown in edge view bent. In Fig. 3 is indicated an elastic metal dental file.

What I claim as my invention, and desire to secure by Letters Patent, is—

As a new article of manufacture, an elastic metal file or piece of spring metal having suitably-formed file-teeth upon its surface, substantially as set forth.

Signed at New York, in the county of New York and State of New York, this 5th day of June, A. D. 1885.

HENRY G. PIFFARD.

Witnesses:

H. C. TOWNSEND,
GEO. C. COFFIN.