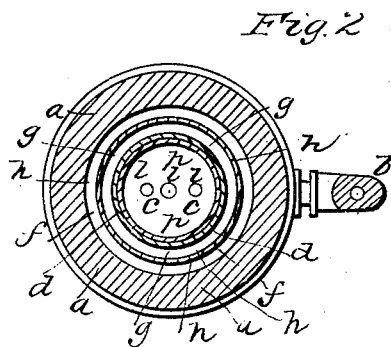
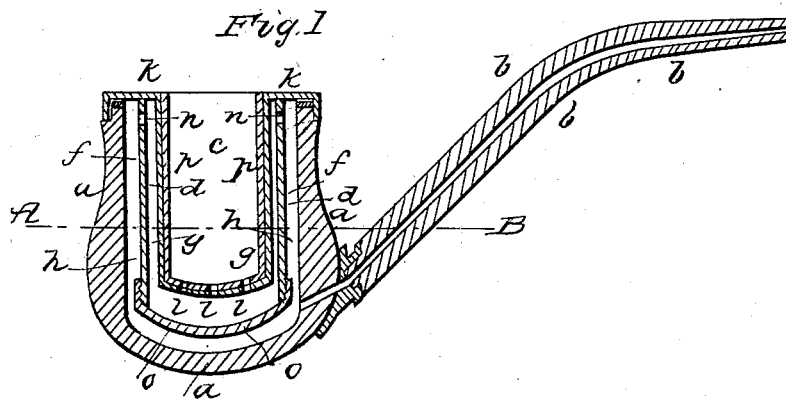


A. FESSENDEN.

Tobacco Pipe.

No. 45,233.

Patented Nov. 29, 1864.



Witnesses
Albert W. Brown
Frederic A. Layer

Inventor
Abijah Fessenden

UNITED STATES PATENT OFFICE.

ABIJAH FESSENDEN, OF EAST BOSTON, MASSACHUSETTS.

IMPROVED TOBACCO-PIPE.

Specification forming part of Letters Patent No. 45,232, dated November 29, 1864.

To all whom it may concern:

Be it known that I, ABIJAH FESSENDEN, of East Boston, in the county of Suffolk and State of Massachusetts, have invented certain new and useful Improvements in Pipes for Smoking Tobacco; and I do hereby declare that the following description, taken in connection with the accompanying plate of drawings hereinafter referred to, forms a full and exact specification, wherein I have set forth the nature and principles of my said improvements, whereby my invention may be distinguished from all others of a similar class, together with such parts as I claim and desire to have secured to me by Letters Patent.

In the use of pipes for the smoking of tobacco it has long been a great desideratum not only to entirely prevent the deposit and accumulation of poisonous nicotine in the tube of the pipe, and thereby obviate the disagreeable taste and nauseating effect ordinarily experienced in smoking tobacco in pipes, but also to provide a receptacle for the said nicotine which would be susceptible of easy removal for cleansing at pleasure. Another desirable result to be obtained in addition to the above is also to so construct the pipe as to relieve the smoke of most of its heat, so that when it reaches the mouth it shall be cool and pleasant to the same, the advantages of which are evident. To accomplish these results has been the object of many improvements in the construction of pipes, or in the stems of pipes, for which Letters Patent of the United States have been secured, but most of which from various causes—such as being too complicated and expensive—have practically failed in their purpose. To secure these desiderata is therefore the object of the present invention, which consists in partitioning or dividing the chamber of the bowl of the pipe, by means of partition-plates, into a series of three or more concentric chambers communicating with each other and with the tube or stem of the pipe, in the inner and open one of which the tobacco to be smoked is placed, while the middle chamber of the three, or the one next to said open chamber, acts as a receptacle for all the poisonous nicotine extracted from the tobacco by smoking. For the purpose of cleansing this chamber and entirely removing therefrom the nicotine deposited therein, as described, I so arrange

the bottom plate as to be easily susceptible of being taken off or put on at pleasure, the said partition-plates used for dividing the bowl into chambers being secured at their upper ends to a common top plate which can be fastened in or removed from the bowl when desired, to permit of the cleansing of the pipe, as described.

From the above it will be readily observed that the smoke, in passing from the pipe to the mouth, must necessarily pass through the chambers interposed between the stem and tobacco-chamber, thereby causing it to be thoroughly cooled.

Having thus generally described my improvements in pipes, I will now proceed to specify in detail their construction and operation, reference being had to the accompanying plate of drawings, of which—

Figure 1 is a central longitudinal vertical section; Fig. 2, a horizontal section taken in plane of line A B, Fig. 1.

a a in the drawings represent the bowl of the pipe, made of any desired shape or material; *b b*, the stem attached to the bowl in any proper manner. The bowl *a* is divided into three concentric chambers, *c*, *d*, and *f*, by two partition-plates, *g* and *h*, attached at their upper ends to a common top plate, *k*, fastened in such a manner to the outer casing or bowl, *a*, as to be readily susceptible of easy removal therefrom when desired. Within the inner chamber, *c*, open at its top, the tobacco to be smoked is placed, communication with which and the mouth is made through a series of small apertures, *l l l*, in the bottom plate, *m*, of said chamber *c*, and the apertures *n n* in the upper portion of the partition-plate *h* of chamber *d*. The bottom plate, *o*, of chamber *d* is attached to the partition-plate *h* by a screw-thread or in any other manner, forming an air-tight joint, so as to be susceptible of being taken off and put on at pleasure when the top and partition plates *k*, *g*, and *h* have been removed from the bowl, as described, and also forms a receptacle into which all the poisonous nicotine extracted from the tobacco passing through said apertures *l l l* falls and deposits itself.

From the above description it will be evident that by constructing and dividing the bowl of the pipe into three or more concen-

tric chambers the partition-plates of which are arranged and communication allowed between them as described not only will the smoke be thoroughly cooled before reaching the mouth, but the collection and deposit of nicotine in the stem of the pipe, which would necessarily obstruct the draft of the same, is entirely prevented, it being, on the contrary, deposited in a receptacle susceptible of easy removal at pleasure for cleansing.

In lieu of the three chambers described and represented, more may be used without departing from the principles of the present invention; but I have found by experience that with three all the desired results can be secured; and, besides, it is more economical.

To prevent the radiation of heat from the tobacco-chamber *c*, communicating with the interior chambers, *d* and *f*, I line the said chamber *c* with any proper cement, *p*, which is a non-conductor of heat.

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

Dividing the bowl of the pipe into three or more concentric chambers connected and arranged together substantially as herein described, and for the purposes specified.

ABIJAH FESSENDEN.

Witnesses:

FREDERIC A. SAYER,

ALBERT W. BROWN.