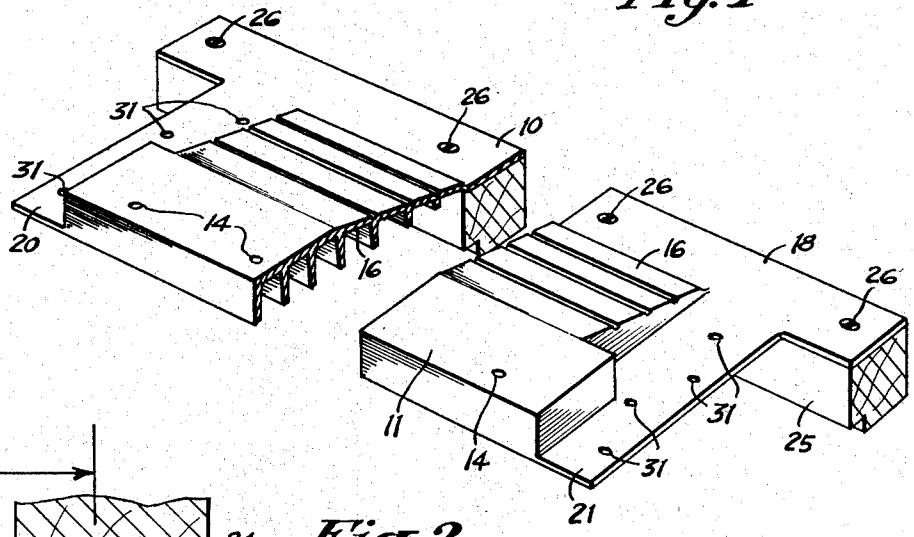
March 3, 1959 J. G. ERKKILA 2,875,481

DOOR SILL

Filed Oct. 5, 1956

Fig. 1



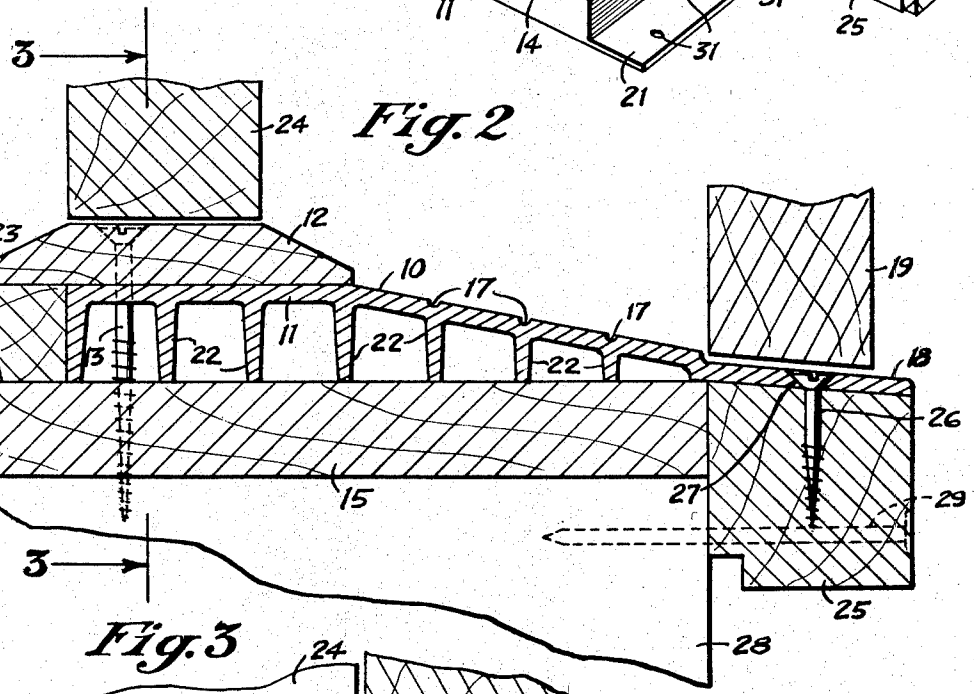
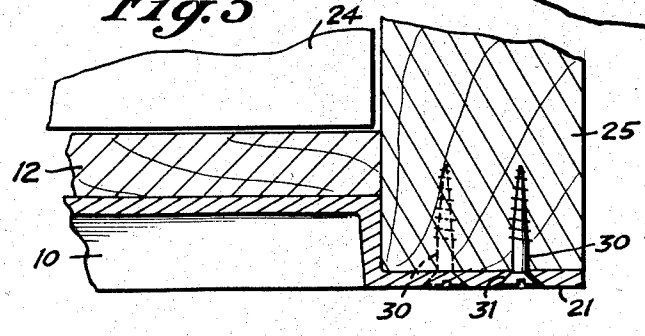


Fig. 2

Fig. 3



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DOOR SILL

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Application October 5, 1956, Serial No. 614,230

1 Claim. (Cl. 20—64)

This invention relates to improvements in door sills and more particularly to a door sill that will rest on the sub floor and be abutted by the finished floor to save extra labor in the installation thereof.

An object of the invention is to provide a door sill that may be made of metal or suitable plastics that is easy to install and is provided with nailing flanges whereby the door sill may be fitted into position without any unnecessary cutting and fitting.

Another object of the invention is to provide a door sill that is weatherproof.

A further object of the invention is to provide a door sill that is provided with a non-slip surface.

A still further object of the invention is to provide a door sill that is durable, inexpensive and practicable to manufacture.

With the above and other objects and advantages in view, the invention consists of the novel details of construction, arrangement and combination of parts more fully hereinafter described, claimed and illustrated in the accompanying drawing, in which:

Fig. 1 is a perspective view, broken away, of a door sill embodying the invention;

Fig. 2 is a transverse sectional view of the door sill showing its relation to the other elements used in its installation; and

Fig. 3 is a vertical sectional view on the line 3—3 of Fig. 2.

Referring more in detail to the drawing, wherein like parts are designated by like reference numerals, the reference numeral **10** is used to generally designate a door sill embodying the invention.

The door sill **10** comprises a rectangular shaped base portion **11** upon which will rest a threshold **12**, Fig. 2.

Screws **13**, passing through the threshold **12** and openings **14** in the base portion **11**, will secure the threshold **12** and door sill **10** to sub flooring **15** and floor joist **28**.

Formed integral with the base portion **11** is a downwardly inclined tread portion **16**, which is provided with longitudinally extending grooves **17**. The grooves **17** provide a slip-proof surface for the tread portion **16**.

Extending longitudinally of the tread portion **16** is a step portion **18** which forms a sill portion for an outside screen or combination storm door **19**.

The step portion **18** is of a greater length than the tread portion **16** and nailing flanges **20** and **21** extend at right angles to the step portion **18**. The step portion **18** and nailing flanges **20** and **21** are all integral with each other and with the tread portion **16** and base portion **11**.

The door sill **10** is hollow and transversely extending ribs **22** are formed integral with the door sill **10** for the reinforcing thereof. Thus, the door sill can be made from a very light material.

In installing the door sill **10**, it is laid directly onto the sub floor **12**. The top or finished flooring **23** will then abut the longitudinal edge of the base portion **11** and form a continuous even, unbroken surface for the threshold **12**. The main door **24** will, in the conventional manner, have coaction with the threshold **12**. The step portion **18** is secured to the door frame **25** by screws **26** passing through openings **27** in the step portion **18**. The door frame **25** is nailed to the floor joist **28** by nails **29**.

The nailing flanges **20** and **21** are secured to the door frame **25** by screws **30** passing through openings **31** in the nailing flanges **20** and **21**.

The screws are all countersunk to provide smooth unbroken surfaces and when the door sill is installed, no unnecessary cutting or fitting will be required.

It is believed that from the foregoing description the structure and manner of installation of the door sill will be apparent to those skilled in the art and it is to be understood that changes in the minor details of construction, arrangement and combination of parts may be resorted to provided they fall within the spirit of the invention and the scope of the appended claim.

Having thus described the invention what is claimed as new and desired to be secured by Letters Patent is:

The combination with a door structure including a sub flooring, a finished flooring atop said sub flooring, and a threshold, of a door sill of unitary construction comprising a rectangular shaped base portion, an inclined tread portion integral with said base portion and extending from one longitudinal edge thereof, said tread portion and said base portion being hollow and having longitudinally extending grooves in the underside thereof, a step portion integral with one longitudinal edge of said tread portion, and nailing flanges integral with the lower side edges of said base portion and said tread portion and forming integral lateral extensions of said step portion, said base portion having a longitudinally extending vertical inner wall abutting said finished flooring, and said threshold overlying portions of said base portion and said finished flooring and affixed to said subflooring through said base portion.

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