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WRISTWATCH WITH MEANS FOR CHECKING RADIOACTIVITY OF THE ENVIRONMENT

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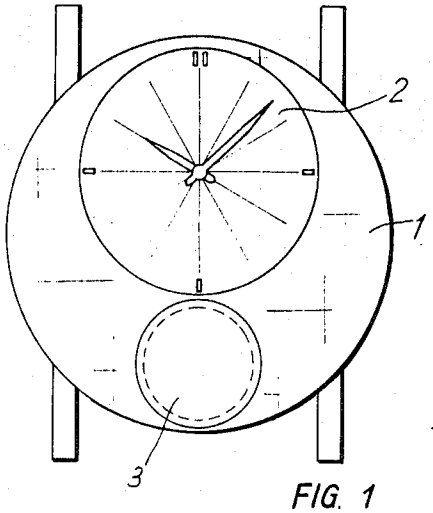


FIG. 1

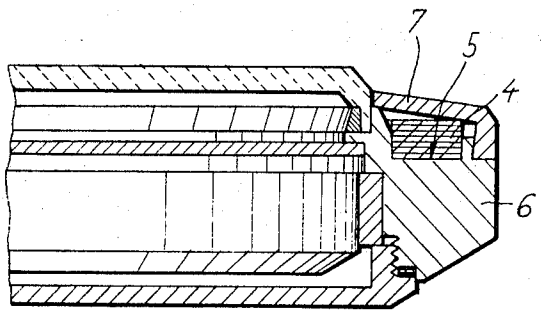


FIG. 2

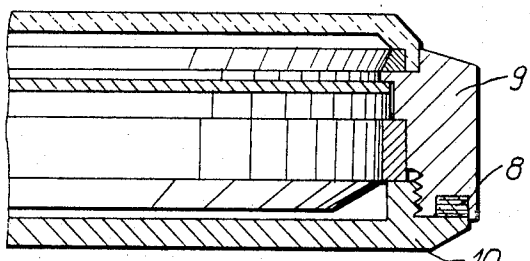


FIG. 3

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WRISTWATCH WITH MEANS FOR CHECKING RADIOACTIVITY OF THE ENVIRONMENT

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ABSTRACT OF THE DISCLOSURE

A wristwatch provided with means for checking the radioactivity of the environment in which the watch is located, the checking means comprising an element made of thermo-luminescent material, the thermo-luminescence of which varies with the radiations to which the element has been submitted.

The present invention has for an object the provision of a watch, especially a wristwatch, characterized by the fact that it is provided with means for checking the radioactivity of the environment in which the watch is located.

In the drawing:

FIG. 1 is a plan view of a first embodiment of a wristwatch, and

FIGS. 2 and 3 are partial sectional views of two other embodiments of wristwatches.

The wristwatch represented in FIG. 1 comprises a casing **1** and a dial **2**, this latter occupying only a portion of the upper surface of the casing.

The wristwatch shown includes a device for measuring radioactivity comprising a circular pellet **3** disposed in the portion of casing **1** not occupied by dial **2**, the pellet being made of a thermo-luminescent material such, for example, as lithium fluoride, capable of reacting to radioactivity; that is to say, it is formed of crystalline material the luminescence of which varies with the radiations to which this material has been submitted.

The crystalline material of the pellet produces luminescence when heated. The degree of luminescence produced is determined by the duration and intensity of the radiations to which the material has been previously submitted.

The pellet **3** is releasably contained in a circular recess provided on the upper face of the casing, so that the user of the watch can, periodically, replace this pellet by a new one and check the luminescence of the old one by heating the pellet and then measuring its luminescence.

This luminescence being a function of the radiations to which the material has been submitted, its measure permits the user of the watch to determine if he has or has

not been exposed to such radiations and, if so, to what extent.

In the embodiment of FIG. 2, the watch includes a ring **4** made of a thermo-luminescent material sensible to the radiations, engaged into an annular groove **5** provided in the upper face of the watch-case **6**. The bezel **7**, snap fitted on the watch-case **6**, covers and conceals the annular ring **4** made of thermo-luminescent material.

The user of the watch must, periodically, dismantle the bezel **7** to permit access to the ring of thermo-luminescent material **4** so as to change it and permit the used ring to be checked.

In the embodiment of FIG. 3, the thermo-luminescent material sensible to the radiations constitutes a ring **8** which functions as a tightening gasket interposed between the watch-case **9** and the bottom **10**.

In this embodiment, in order that the ring **8** may be checked, it is necessary to disassemble the bottom and replace the ring **8** with a new one.

As another modification, the material sensible to the radiations may be located in a recess provided in the outer face of the bottom, closed by a removable cover.

As still another variation, the material sensible to the radiations could also be carried by the wristwatch strap.

What I claim is:

1. A watch, especially a wristwatch, provided with checking means for checking the radioactivity of the environment in which the watch is located comprising a ring of thermo-luminescent material placed on the watch case and concealed by the bezel removably secured to the watch case.

2. A watch as claimed in claim **1**, wherein the thermo-luminescence varies with the radiations to which the watch is submitted.

3. A watch as claimed in claim **2**, wherein the dial occupies only a portion of the upper surface of the watch case and at least a portion of the rest of this surface is occupied by the ring of thermo-luminescent material.

4. A watch as claimed in claim **2**, wherein the ring of thermo-luminescent material comprises a tightening gasket interposed between two elements of the watch-case.

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