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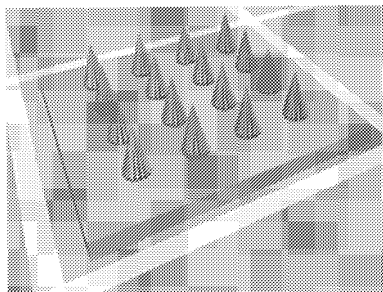


FIG. 5A

(57) Abstract: The invention relates to a skin microbe sampler comprising: a plurality of solid microneedles extending from a support surface, wherein the microneedles are dimensioned to penetrate the epidermis and/or dermis layer of the skin to obtain microbes residing in the skin. In particular, the microneedles comprise a cone shape that is substantially devoid of patterning on the surface of said cone shape. In another embodiment, the surfaces of the microneedles comprise an adhesion coating on their surfaces for enhancing adhesion of the microbes on the microneedles. Also provided are a method of sampling microbes residing in a skin, a method of making the microbe sampler, and a mold for making the microbe sampler. In particular, the method of making the microbe sampler comprises 3D printing the solid microneedles and/or molding the solid microneedles from a negative imprint of the solid microneedles.

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