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(54) **POWDER DISPENSING DEVICE**

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(60) Provisional application No. 62/323,104, filed on Apr. 15, 2016.

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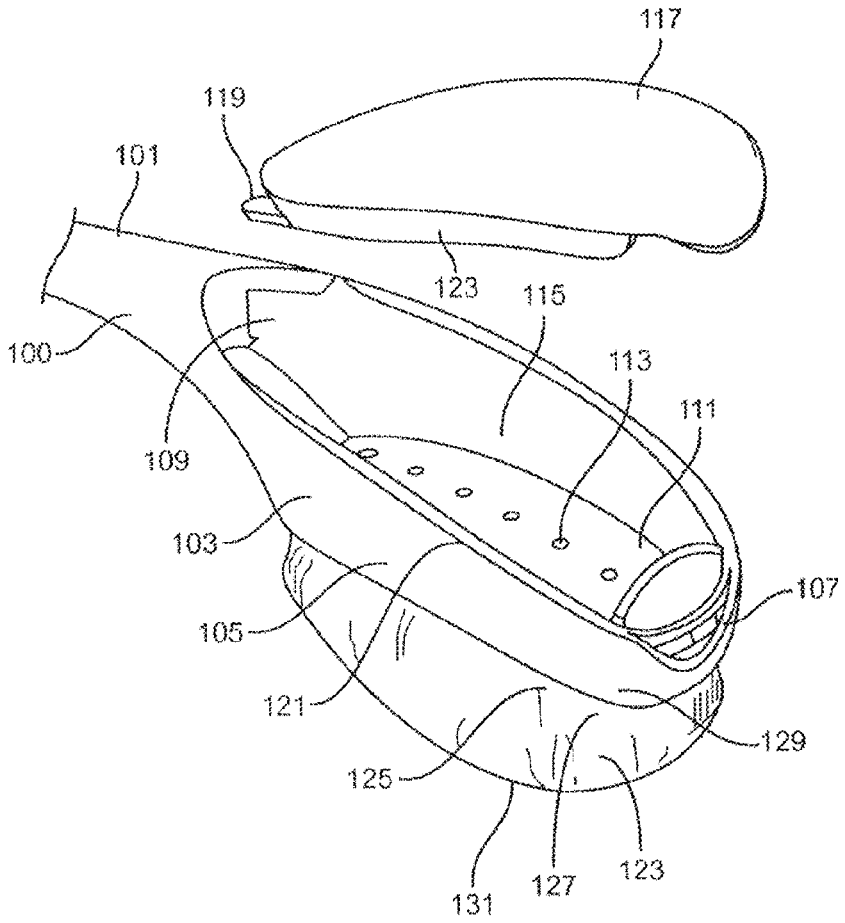
(52) **U.S. Cl.**

CPC ***A45D 33/36*** (2013.01); ***B65D 83/06*** (2013.01); ***A45D 33/005*** (2013.01); ***A45D 33/16*** (2013.01)

(57) **ABSTRACT**

A powder dispensing device for dispensing powder may include a powder application device for dispensing the powder and a handle connected to the powder application device to allow the user to manipulate the powder dispensing device to dispense powder evenly and without wasting large amounts of powder. The powder application device may include an enclosure having access by a displaceable lid to store the powder and includes a flexible powder dispensing housing being permeable to dispense the powder from the cavity. The powder application device includes a bottom wall having apertures to connect the enclosure with the powder dispensing housing and tubes to provide unobstructed pathways from the enclosure o the flexible powder dispensing housing. A handle may include a hook or aperture for hanging the device. The enclosure of the powder application device comprises curved sidewalls, a curved front wall and a curved back wall.



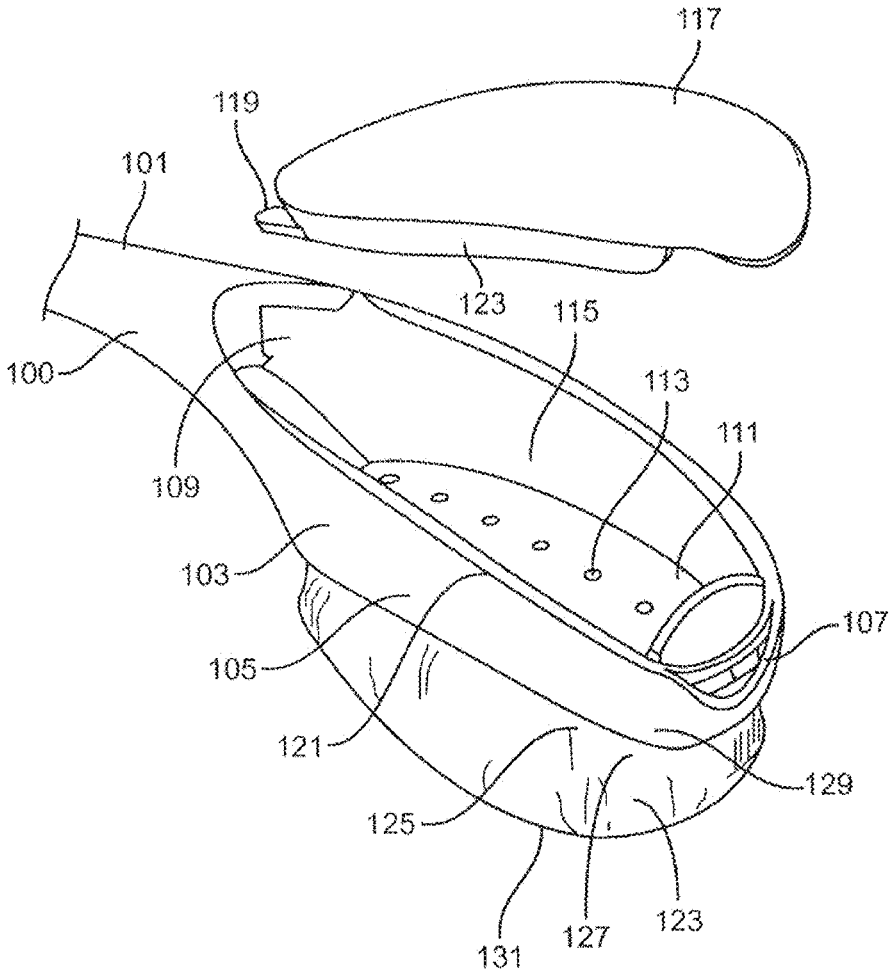

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FIG. 1

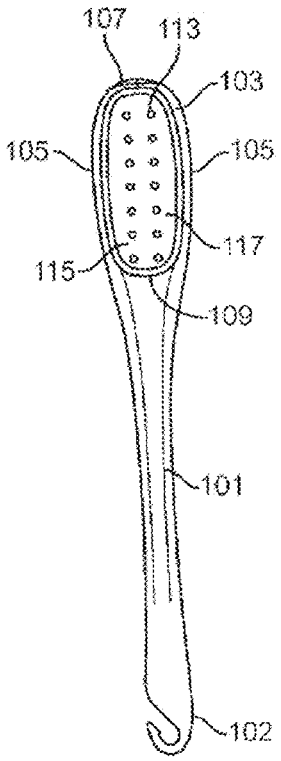

FIG. 2

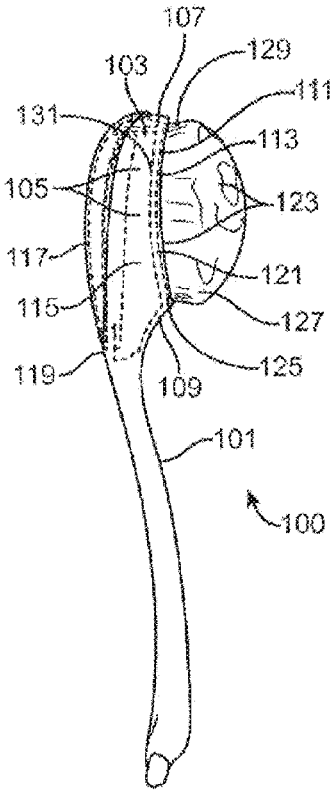

FIG. 3

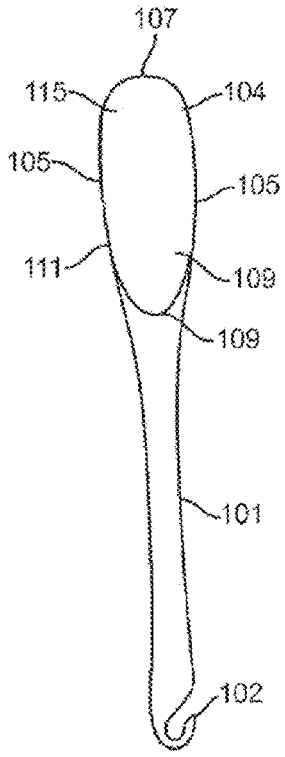

FIG. 4

FIG. 5

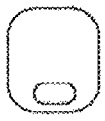

FIG. 6

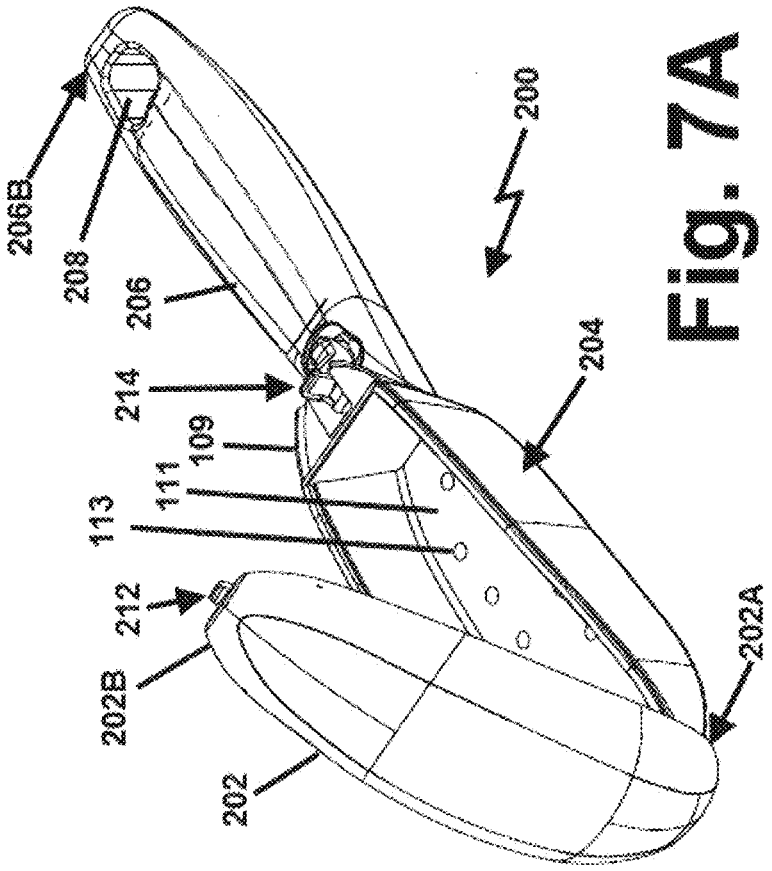

Fig. 7A

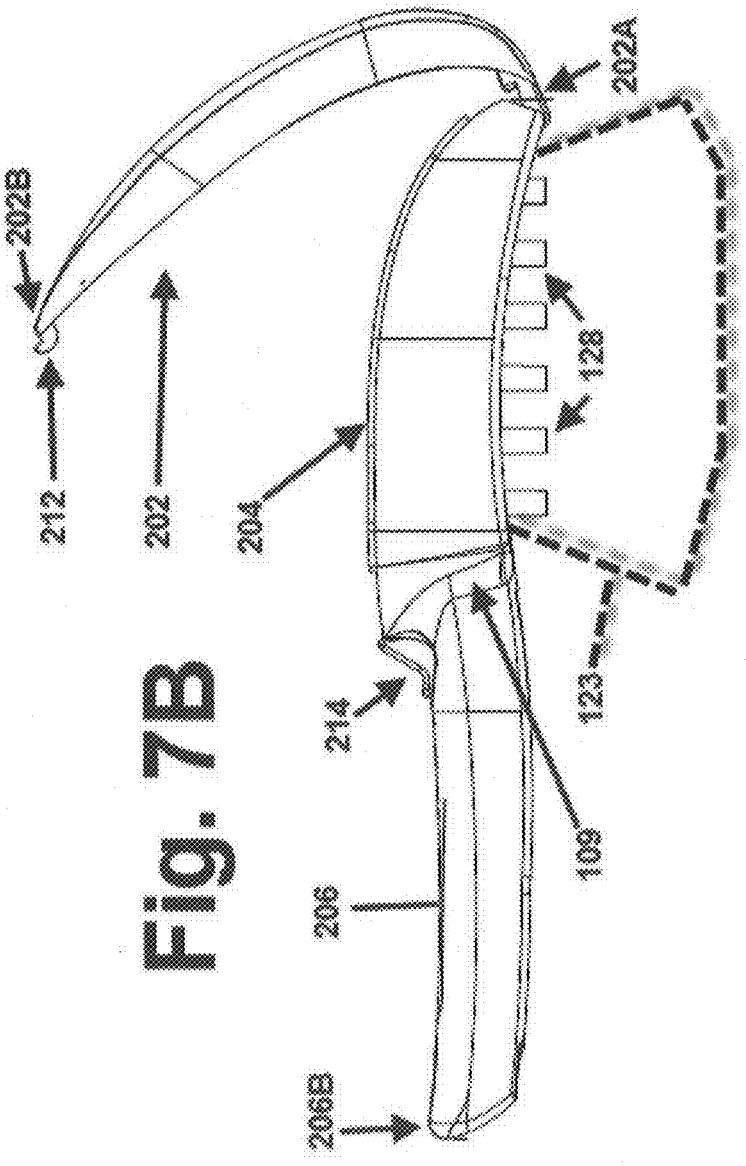

Fig. 7B

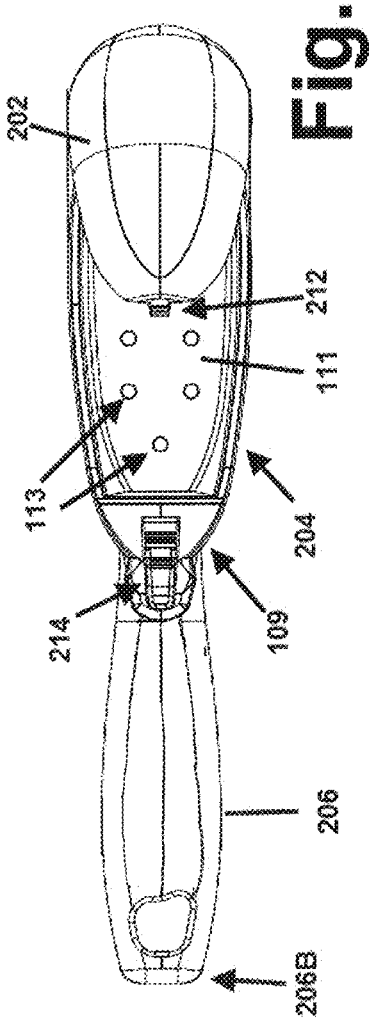

Fig. 7C

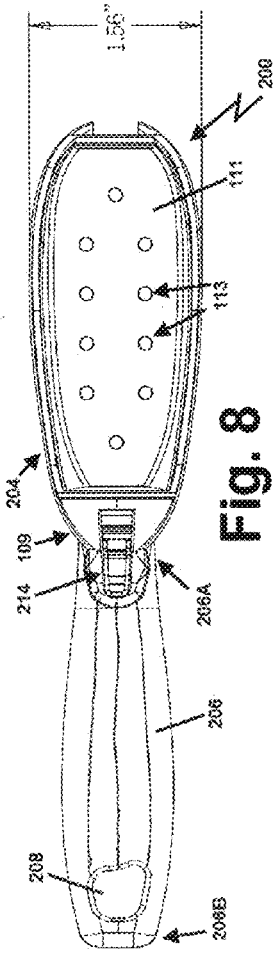

Fig. 8

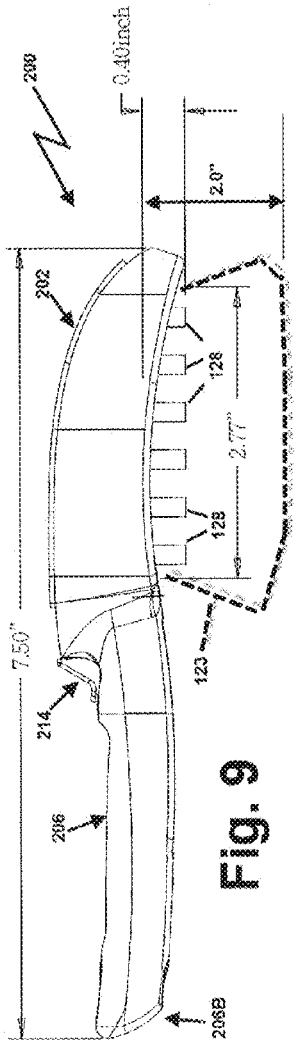

Fig. 9

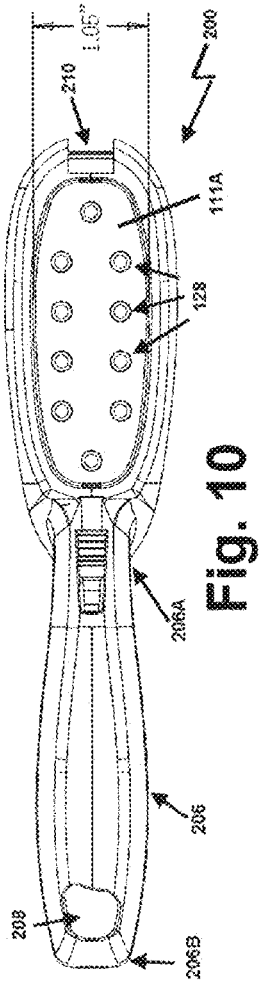

Fig. 10

POWDER DISPENSING DEVICE

CROSS-REFERENCE TO RELATED APPLICATIONS

[0001] This Continuation-in-part application claims the benefit under 35 U.S.C. §120 of application Ser. No. 14/197,240 filed on Mar. 5, 2014 entitled POWDER DISPENSING DEVICE, and also claims the benefit under 35 U.S.C. §119(e) of Application No. 62/323,104 filed on Apr. 15, 2016 also entitled POWDER DISPENSING DEVICE and all of whose entire disclosures are incorporated by reference herein.

BACKGROUND OF THE INVENTION

[0002] 1. Field of Invention

[0003] The present invention relates to a cosmetic container, more particularly to a hygienic cosmetic container for applying body powder.

[0004] 2. Description of Related Art

[0005] Hygiene is increasingly important on all occasions, to the point where they have become basic manners. One aspect of good hygiene is the application of powder to a person's skin, both young and old. However, most conventional powder application devices, or simply the powder storage container itself, exhibit a powder flow rate that is uncontrolled and the end result is that unnecessary powder flows out, thereby wasting powder, and not applying it evenly.

[0006] The following references are related to devices for applying materials to a person's body: U.S. Pat. No. 5,931,591 (McCracken); U.S. Pat. No. 6,523,550 (McCormick); U.S. Pat. No. 6,550,996 (Rayfield) and U.S. Pat. No. 6,805,510 (Lee).

[0007] However, the powder flow rate of conventional cosmetic containers is not controlled. As a result, unnecessary powder flows out, which wastes too much powder and fails to evenly apply it to the skin. Therefore, there are some issues of inconvenience, which need to be improved.

[0008] Thus, there remains a need for an improved powder application device that is easy to use and which applies powder evenly on a person's skin during use while minimizing wasting powder.

[0009] All references cited herein are incorporated herein by reference in their entireties.

BRIEF SUMMARY OF THE INVENTION

[0010] A powder dispensing device for dispensing powder is disclosed. The powder dispensing device comprises: an enclosure adapted to receive a powder therein, wherein the enclosure has an opening, covered by a displaceable lid (e.g., removable or hinged), on a first side of the enclosure and having a second side, opposite said first side, having a plurality of apertures on said second side; a flexible powder dispensing housing included on a second side of said enclosure, said flexible powder dispensing housing being permeable to dispense the powder that passes from said enclosure through said plurality of apertures; and a handle having a distal end and a proximal end wherein said distal end connected to said enclosure and said proximal end is spaced from said enclosure, said handle further comprising a grasping portion that allows a user to manipulate the powder dispensing device.

BRIEF DESCRIPTION OF SEVERAL VIEWS OF THE DRAWINGS

[0011] The invention may be understood by reference to the following description taken in conjunction with the accompanying drawings, in which, like reference numerals identify like elements, and in which:

[0012] FIG. **1** illustrates an exploded view of the powder dispensing device of the present invention;

[0013] FIG. **2** illustrates a front view of the powder dispensing device of the present invention;

[0014] FIG. **3** illustrates a side perspective view of the powder dispensing device of the present invention;

[0015] FIG. **4** illustrates a back view of the powder dispensing device of the present invention;

[0016] FIG. **5** illustrates a partial view of an application tool of the powder dispensing device;

[0017] FIG. **6** illustrates an end view of the powder dispensing device of the present invention;

[0018] FIG. **7**A is an isometric view of a second embodiment of the powder dispensing device using a hinged lid and showing it an open condition and with the flexible powder dispensing housing omitted for clarity;

[0019] FIG. **7**B is a side view of the second embodiment with the lid shown in an open condition and with the flexible powder dispensing housing shown in phantom;

[0020] FIG. **7**C is a top view of the second embodiment with the lid shown in an open condition;

[0021] FIG. **8** is a top view of the second embodiment with the lid omitted for clarity;

[0022] FIG. **9** is a side view of the second embodiment with the lid shown in a latched closed condition and with the flexible powder dispensing housing shown in phantom; and

[0023] FIG. **10** is a bottom view of the second embodiment with the lid and the flexible powder dispensing housing omitted for clarity.

DETAILED DESCRIPTION OF THE INVENTION

[0024] FIG. **1** illustrates a partial exploded perspective view of the powder dispensing device **100**, and FIG. **1** may illustrate that the distal end of the handle **101** may be connected to a powder application device **103**. The powder application device **103** may be substantially oval in shape and may be formed from metal, plastic, wood or other rigid material and may include a pair of opposing near mirror sidewalls **105**, a front wall **107** which may connect to the side walls **105** and may be curved, a back wall **109** which may connect to the side walls, which may connect to the handle **101** and may be curved, a bottom wall **111** which may connect to the side walls **105**, the front wall **107** and the back wall **109** and which may be substantially planar and may include apertures **113** to allow powder which may be stored in the cavity **115** (also referred to as "enclosure **115**") which may be defined by the side walls **105**, the front wall **107**, the back wall **109**, the bottom wall **111** and the top wall **117** which may be a detachably connected lid. As shown in FIG. **1**, the top wall **117** may include a retaining finger **119** which may extend from the top wall **117** to retain the top wall **117** over the cavity **115**. The front wall **107**, back wall **109** and sidewall **105** may include an inclined edge **121** to cooperate with an inclined edge **123** of the top wall **117** to form a seal to retain the powder within the cavity **115**.

[0025] FIG. **1** illustrates that the powder application device **103** may include a flexible powder dispensing housing **123** which may include a lip **125** which may extend around the housing side wall **127** to cooperate with a sidewall channel **129** which may be formed around the sidewall **105**, the front wall **107** and the back wall **109** in order to retain the flexible powder dispensing housing **123**. The aperture **113** in the bottom wall **111** may allow the powder to move from the cavity **119** to the flexible powder dispensing housing **123**. The flexible powder dispensing housing **123** may include a housing bottom wall **131** which may be connected to the housing side wall **127**. The flexible powder dispensing housing **123** comprises a fine-dense soft brush and may be formed from flexible material such as cloth, sponge, fur or other flexible material which may be permeable for the powder to move from the flexible powder dispensing housing **123** to the user. Where the fine-dense soft brush of the flexible powder dispensing housing **123** comprises filaments such as brush hairs, bristles or fibers, these are secured (e.g., adhesively-secured, etc.) to a second side **111**A (FIG. **10**) of the bottom wall **111** around a plurality of tubes **128** (FIG. **9**). Each tube **128** forms a respective powder passageway from a respective aperture **113** in the enclosure **115** to the flexible powder dispensing housing **123**. The tubes **128** provide unobstructed powder passageways within the fine-dense soft brush, thereby avoiding any blocked apertures **113** had the filaments been secured to the exterior side of the bottom wall **111** in the absence of the tubes **128**.

[0026] FIG. **3** illustrates a side perspective view of the powder dispensing device **100**, and FIG. **3** may illustrate that the distal end of the handle **101** may be connected to a powder application device **103**. FIG. **3** illustrates a curved handle **101** which may be ergonomically designed. The powder application device **103** may be substantially oval in shape and may be formed from metal, plastic, wood or other rigid material and may include a pair of opposing near mirror sidewalls **105**, a front wall **107** which may connect to the side walls **105** and may be curved, a back wall **109** which may connect to the side walls, which may connect to the handle **101** and may be curved, a bottom wall **111** which may connect to the side walls **105**, the front wall **107** and the back wall **109** and which may be substantially planar and may include apertures **113** to allow powder which may be stored in the enclosure **115** which may be defined by the side walls **105**, the front wall **107**, the back wall **109**, the bottom wall **111** and the top wall **117** which may be a detachably connected lid. The top wall **117** may include a retaining finger **119** which may extend from the top wall **117** to retain the top wall **117** over the cavity **115**. The front wall **107**, back wall **109** and sidewall **105** may include an inclined edge **121** to cooperate with an inclined edge **123** of the top wall **117** to form a seal to retain the powder within the cavity **115**.

[0027] FIG. **3** illustrates that the powder application device **103** may include a flexible powder dispensing housing **123** which may include a lip **125** which may extend around the housing side wall **127** to cooperate with a sidewall channel **129** which may be formed around the sidewall **105**, the front wall **107** and the back wall **109** in order to retain the flexible powder dispensing **123**. The aperture **113** in the bottom wall **117** may allow the powder to move from the cavity **119** to the flexible powder dispensing housing **123** which may be hollow. The flexible powder dispensing housing **123** may include a housing bottom wall **131** which may be connected to the housing side wall **127**. The flexible powder dispensing housing **123** may be formed from flexible material such as cloth, sponge, fur or other flexible material which may be permeable for the powder to move from the flexible powder dispensing housing **103** to the user.

[0028] FIG. **4** additionally illustrates that the handle **101** may include an application tool **104** at the proximate end of the handle **101**.

[0029] FIG. **5** illustrates a sectional view of the application tool **104**.

[0030] FIG. **2** illustrates the handle **101**, the powder application device **103**, the sidewall **105**, the top wall **107**, the back wall **109**, the enclosure **115**, the bottom wall **111** and the aperture **113**. FIG. **2** additionally illustrates that the handle **101** may include a hook **102** at the proximate end of the handle **101**.

[0031] FIG. **4** illustrates the handle **101**, the sidewall **105**, the top wall **107**, the back wall **109**, the enclosure **115**, the bottom wall **111**. FIG. **4** illustrates that the handle includes a hook **102** at the proximate end of the handle **101**.

[0032] FIG. **6** illustrates an end view of the powder dispensing device of the present invention.

[0033] FIGS. **7A-10** depict a second embodiment of the powder dispensing device **200** which utilizes a hinged top wall **202** that closes off a powder storage enclosure **204**. The enclosure **204** may comprise the same construction as the cavity/enclosure **115** (e.g., side walls **105**, front wall **107**, back wall **109**, apertures **113**, tubes **128**) and is thus not discussed in any further detail; although the number of apertures and their arrangement (see FIG. **8**) are different than in the first embodiment **100** (see FIG. **2**), their operation is the same. A handle **206** (see FIGS. **7A-7C**, for example) has a distal end **206**A (FIGS. **8** and **10**) attached to the back wall **109** of the enclosure **204** and has a proximal end **206**B having a handle aperture **208** for permitting the powder dispensing device **200** to be hung on a hook, for example.

[0034] As shown most clearly in FIGS. **8-10**, the second embodiment **200** comprises an axle **210** for pivotally-mounting one end **202**A of the hinged top wall **202** (hereinafter "lid **202**"). The other end **202**B of the lid **202** comprises a tab **212** that is received in a displaceable latch **214** that the user depresses to release the latch **214** and open the lid **202** (see FIGS. **7A-7C**) to fill the cavity/enclosure **204** with powder. As a result, there is no concern for misplacing the lid **202** from the powder dispensing device **200**. Once the enclosure **204** is filled with powder, the user simply presses the open end **202**B downward against the latch **214** to releasably secure the lid **202** into a closed position (see FIG. **9**).

[0035] It should be further noted that the dimensions shown in FIGS. **8-10** are by way of example only and are not meant, in any way, to be by way of limitation.

[0036] The first embodiment **100** and the second embodiment **200** may come in different sizes, for example, for use by adults and some smaller sizes for use on infants and toddlers.

[0037] While the invention is susceptible to various modifications and alternative forms, specific embodiments thereof have been shown by way of example in the drawings and are herein described in detail. It should be understood, however, that the description herein of specific embodiments is not intended to limit the invention to the particular forms disclosed.

What is claimed is:

1. A powder dispensing device for dispensing powder, comprising:

an enclosure adapted to receive a powder therein, said enclosure having an opening, covered by a displaceable lid, on a first side of said enclosure and having a second side, opposite said first side, having a plurality of apertures on said second side;

a flexible powder dispensing housing included on a second side of said enclosure, said flexible powder dispensing housing being permeable to dispense the powder that passes from said enclosure through said plurality of apertures; and

a handle having a distal end and a proximal end wherein said distal end connected to said enclosure and said proximal end is spaced from said enclosure, said handle further comprising a grasping portion that allows a user to manipulate the powder dispensing device.

2. The powder dispensing device of claim **1** wherein said plurality of apertures are arranged from a proximal end to a distal end of said enclosure along a longitudinal axis of said enclosure; and

3. The powder dispensing device of claim **1** wherein the handle includes a hook.

4. The powder dispensing device of claim **1** wherein said enclosure comprises a proximal end that is connected to said handle and wherein said proximal end comprises curved back wall.

5. The powder dispensing device of claim **4** wherein said enclosure comprises curved sidewalls.

6. The powder dispensing device of claim **5** wherein said enclosure comprises a distal end, opposite said proximal end, and wherein said distal end comprises a curved wall.

7. The powder dispensing device of claim **1** wherein said enclosure is substantially oval-shaped.

8. The powder dispensing device of claim **1** wherein said displaceable lid is a removable lid.

9. The powder dispensing device of claim **1** wherein said displaceable lid is a hinged lid.

10. The powder dispensing device of claim **9** further comprising a latch for releasably securing said lid to said enclosure.

* * * * *