and components of the gelatin shell.

In one example, there is disclosed a method of forming a soft gel dosage form, comprising: providing two sheets of a gelatin composition; aligning the two sheets; and sealing edges of the two sheets together forming a seam having cross-linked gelatin across the seam.

In an example, a method of forming a soft gel dosage form is disclosed. The method may include providing two sheets of a gelatin composition, aligning the two sheets, and sealing edges of the two sheets at a selected temperature range forming a seam having cross-linked gelatin across the seam.

The soft gel may also be cured by drying the soft gel. A fill composition may be disposed between the two sheets prior to completely sealing the edges of the two sheets. The sealing of the edges of the two sheets may include sealing the edges of the two sheets at a selected temperature adapted to allow the formation of the cross-linked gelatin across the seam.

The providing of the two sheets of the gelatin composition may include providing two sheets of the gelatin composition containing one or more of gelatin in an amount of about 65% w/v; glycerol in an amount of about 15% w/v; sorbitol or sorbitan in an amount of about 14% w/v; purified water in an amount of about 5% w/v; and caramel in an amount of about 1% w/v.

In another example, there is disclosed a method of forming a soft gel dosage form, comprising micronizing an anhydrous magnesium powder into a powder having a heterogeneous particle size, suspending the micronized anhydrous magnesium powder in an emulsion forming a fill composition, disposing the fill composition between two sheets of a gelatin composition, and sealing edges of the two sheets together forming a seam having cross-linked gelatin across the seam to form the soft gel.

According to the disclosure, the sealing of the edges of the two sheets may include sealing the edges of the two sheets at a selected temperature adapted to allow the formation of the cross-linked gelatin across the seam. The suspending of the heterogeneous micronized anhydrous magnesium powder in the emulsion may include suspending about 680.8 mg of the micronized anhydrous magnesium powder in the emulsion. The suspending of the micronized anhydrous magnesium powder in the emulsion may include suspending the micronized anhydrous

magnesium powder in about 294.4 mg of medium-chain triglycerides and about 225 mg of a phosphatidyl choline solution.

The gelatin composition may include providing the two sheets of the gelatin composition containing: gelatin in an amount of about 264.6 mg, glycerin in an amount of about 69.3 mg, sorbitol or sorbitan in an amount of about 69.3 mg, purified water in an amount of about 60.1 mg, and caramel in an amount of about 10.7 mg.

In another example, there is disclosed a soft gel dosage form, comprising a soft gel shell including two sheets of a gelatin composition sealed together forming a seam having cross-linked gelatin across the seam, and a fill composition disposed between the two sheets of the gelatin composition including a micronized anhydrous magnesium powder having a heterogeneous particle size.

The two sheets may be sealed together at a selected temperature adapted to allow the formation of the cross-linked gelatin across the seam. The two sheets of gelatin may include: a gelatin, a glycerin, a sorbitol or sorbitan, a purified water, and a caramel color. The fill composition may further include a medium-chain triglyceride, and a phosphatidyl choline.

In one aspect, the present invention refers to a method of forming a soft gel dosage form, comprising providing two sheets of a gelatin composition, said gelatin composition containing gelatin in an amount of about 55% w/w; aligning the two sheets; and sealing edges of the two sheets together forming a seam having cross-linked gelatin across the seam, and disposing an emulsified fill composition between the two sheets prior to completely sealing the edges of the two sheets.

In another aspect, the present invention refers to a method of forming a soft gel dosage form, comprising micronizing an anhydrous magnesium salt into a powder having a heterogeneous particle size; suspending the micronized anhydrous magnesium salt in an emulsion forming a fill composition, wherein said fill composition includes the micronized anhydrous magnesium salt in about 294.4 mg of medium-chain triglycerides and about 225 mg of a phosphatidyl choline

solution; disposing the fill composition between two sheets of a gelatin composition; and sealing edges of the two sheets together forming a seam having cross-linked gelatin across the seam to form the soft gel.

In yet another aspect, the present invention refers to a soft gel dosage form, comprising a soft gel shell including two sheets of a gelatin composition sealed together forming a seam having cross-linked gelatin across the seam; and a fill composition disposed between the two sheets of the gelatin composition: said fill composition including about 680.8 mg of a micronized anhydrous magnesium salt having a heterogeneous particle size suspended in an emulsion of about 294.4 mg of medium-chain triglycerides and about 225 mg of a phosphatidyl choline solution.

BRIEF DESCRIPTION OF THE DRAWINGS

Embodiments of devices, systems, and methods are illustrated in the figures of the accompanying drawings which are meant to be exemplary and not limiting, in which like references are intended to refer to like or corresponding parts, and in which:

FIG. 1 illustrates a block flow diagram of a method of making a soft gel according to aspects of the present disclosure; and

FIG. 2 illustrates a block flow diagram of a method of making a soft gel containing magnesium according to aspects of the present disclosure.

CLAIMS

What is claimed is:

1. A method of forming a soft gel dosage form, comprising:

providing two sheets of a gelatin composition, said gelatin composition containing gelatin in an amount of about 55% w/w;

aligning the two sheets; and

sealing edges of the two sheets together forming a seam having cross-linked gelatin across the seam, and disposing an emulsified fill composition between the two sheets prior to completely sealing the edges of the two sheets.

2. The method of claim 1, further comprising curing the soft gel by drying the soft gel.

3. The method of claim 1, wherein said fill composition comprises a micronized magnesium salt disposed in an emulsion of medium-chain triglycerides and a phosphatidyl choline solution.

4. The method of claim 1, wherein the sealing of the edges of the two sheets includes sealing the edges of the two sheets at a selected temperature adapted to allow the formation of the cross-linked gelatin across the seam.

5. The method of claim 3, wherein said micronized magnesium salt is selected from the group consisting of one or more of magnesium glycinate, magnesium ascorbate, magnesium chloride, magnesium sulfate, magnesium orotate, magnesium citrate, magnesium fumarate, magnesium malate, magnesium succinate, magnesium tartrate and magnesium carbonate.

6. The method of claim 1, wherein the providing of the two sheets of the gelatin composition includes providing the two sheets of the gelatin composition containing glycerin in an amount of about 15% w/w .

7. The method of claim 6, wherein the providing of the two sheets of the gelatin composition includes providing the two sheets of the gelatin composition containing sorbitol or sorbitan in an amount of about 14% w/w.

8. The method of claim 7, wherein the providing of the two sheets of the gelatin composition includes providing the two sheets of the gelatin composition containing purified water in an amount of about 5% w/w .

9. The method of claim 8, wherein the providing of the two sheets of the gelatin composition includes providing the two sheets of the gelatin composition containing caramel in an amount of about 1% w/w.

10. A method of forming a soft gel dosage form, comprising:

micronizing an anhydrous magnesium salt into a powder having a heterogeneous particle size;

suspending the micronized anhydrous magnesium salt in an emulsion forming a fill composition, wherein said fill composition includes the micronized anhydrous magnesium salt in about 294.4 mg of medium-chain triglycerides and about 225 mg of a phosphatidyl choline solution;

disposing the fill composition between two sheets of a gelatin composition; and

sealing edges of the two sheets together forming a seam having cross-linked gelatin across the seam to form the soft gel.

11. The method of claim 10, further comprising curing the soft gel by drying the soft gel.

12. The method of claim 10, wherein the sealing of the edges of the two sheets includes sealing the edges of the two sheets at a selected temperature adapted to allow the formation of the cross-linked gelatin across the seam.

13. The method of claim 10, wherein the suspending of the micronized anhydrous magnesium salt in the emulsion includes suspending about 680.8 mg of the micronized anhydrous magnesium salt in the emulsion.

14. The method of claim 10, wherein said magnesium salt is selected from the group consisting of one or more of magnesium glycinate, magnesium ascorbate, magnesium chloride, magnesium sulfate, magnesium orotate, magnesium citrate, magnesium fumarate, magnesium malate, magnesium succinate, magnesium tartrate and magnesium carbonate.

15. The method of claim 10, further comprising providing the two sheets of the gelatin composition.

16. The method of claim 15, wherein the providing of the two sheets of the gelatin composition includes providing the two sheets of the gelatin composition containing:

gelatin in an amount of about 264.6 mg;

glycerin in an amount of about 69.3 mg;

sorbitol or sorbitan in an amount of about 69.3 mg;

purified water in an amount of about 60.1 mg; and

caramel in an amount of about 10.7 mg.

17. A soft gel dosage form, comprising:

a soft gel shell including:

two sheets of a gelatin composition sealed together forming a seam having cross-linked gelatin across the seam; and

a fill composition disposed between the two sheets of the gelatin composition:

said fill composition including about 680.8 mg of a micronized anhydrous magnesium salt having a heterogeneous particle size suspended in an emulsion of about 294.4 mg of medium-chain triglycerides and about 225 mg of a phosphatidyl choline solution.

18. The soft gel dosage form of claim 17, wherein the two sheets are sealed together at a selected temperature adapted to allow the formation of the cross-linked gelatin across the seam.

19. The soft gel dosage form of claim 17, wherein the two sheets of

gelatin include:

a gelatin;

a glycerin;

a sorbitol or sorbitan;

a purified water; and

a caramel color.

20. The soft gel dosage form of claim 17, wherein said micronized anhydrous magnesium salt is selected from the group consisting of one or more of magnesium glycinate, magnesium ascorbate, magnesium chloride, magnesium sulfate, magnesium orotate, magnesium citrate, magnesium fumarate, magnesium malate, magnesium succinate, magnesium tartrate and magnesium carbonate.

21. The soft gel dosage form of claim 17, wherein said micronized anhydrous magnesium salt is magnesium citrate.

22. The method of claim 3, wherein the micronized magnesium salt is magnesium citrate.

23. The method of claim 10, wherein the micronized anhydrous magnesium salt is magnesium citrate.