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CLERK, U.S. DISTRICT COURT
FEB - 8 2013
CENTRAL DISTRICT OF CALIFORNIA
BY DEPUTY

Counsel for Plaintiff
STERLING INTERNATIONAL, INC.

UNITED STATES DISTRICT COURT

CENTRAL DISTRICT OF CALIFORNIA

Sterling International, Inc., Plaintiff, v. Sorensen Research and Development Trust, Defendant.	Case No. CV13-00938-ABC (RZx) COMPLAINT FOR DECLARATORY JUDGMENT OF NON-INFRINGEMENT AND INVALIDITY

Plaintiff Sterling International, Inc. ("Sterling"), through its undersigned counsel, files this Complaint for Declaratory Judgment against Defendant

Sorensen Research and Development Trust ("Sorensen") seeking declaratory relief with respect to U.S. Patent No. 6,599,460 ("the '460 Patent" or "the patent in suit," attached as Exhibit A hereto) and hereby alleges as follows:

I. THE PARTIES

1. Sterling is a corporation organized and existing under the laws of the State of Washington, with its principal place of business at 3808 N. Sullivan Rd., Bldg 16, Spokane Valley, WA 99216.

2. Upon information and belief, Sorensen is a trust with its principal place of business at 7040 Avenida Encinas, Suite 104-277, Carlsbad, CA 92011.

II. JURISDICTION AND VENUE

3. This is an action for declaratory relief regarding the '460 Patent.

4. This Court has jurisdiction over the subject matter jurisdiction of this action pursuant to 28 U.S.C. §§ 1331 and 1338(a), in that it involves claims arising under the United States Patent Act, 35 U.S.C. §1 *et seq.*

5. This Court may declare the rights and other legal relations of the parties pursuant to 28 U.S.C. §§ 2201 and 2202 because there is a case of actual controversy within the Court's jurisdiction.

6. This Court has personal jurisdiction over Sorensen because it conducts business in the State of California and within this District, it has voluntarily availed itself of the laws and regulations of California and this District and, under the circumstances, the assertion of personal jurisdiction over comports with traditional notions of fair play and substantial justice.

7. Venue properly lies in this judicial district pursuant to 28 U.S.C. § 1391.

III. THE PRESENCE OF AN ACTUAL CONTROVERSY

8. Upon information and belief, Sorensen is the purported assignee and sole owner of the '460 Patent.

9. On December 13, 2012, Sorensen, through its counsel, issued a cease and desist letter to Sterling. A true and correct of the December 13, 2012, letter is attached as Exhibit B and is incorporated herein by reference in its entirety. In its cease and desist letter, Sorensen asserted its belief that Sterling is "using technology claimed" in the '460 Patent. (Exhibit B, p. 1.)

10. Sorensen further alleged that Sterling is making insect traps under the name "Rescue W-H-Y Insect Traps" that allegedly infringe Claim 1 of the '460 patent.

11. Specifically, in its December 13, 2012, letter, Defendant asserted the following:

- "From our experts' examination and testing, we have determined that the structure of the above referenced products meets the claim limitations of [the '460 Patent]." (*Id., p.* 1.).
- "Further, our records indicate that Sterling International is not currently licensed under the '460 Patent." (*Id.*).
- "The following table lists at least one line of Sterling International products that our inspection shows to be manufactured by a process that is substantially likely to infringe the '460 Patent (hereinafter, 'Accused Products')." (*Id.*, p. 3).
- "Sterling International must obtain a license and release under the '460 patent for the Accused Products it imported

into, manufactured, offered for sale and/or sold within the United States." (*Id.*).

- "We are providing this drawing as an example of the Accused Products that illustrate our infringement analysis." (*Id.*, p. 4).
- "Sterling International's unauthorized use of the '460 patented technology is further substantiated by the enclosed claim chart associated with the attached drawing." (*Id.*).
- "**PLEASE TAKE FURTHER NOTICE:** This letter constitutes a notice of patent infringement in violation of 35 U.S.C. § 271." (*Id.*, emphasis in original).
- "Sterling International is ultimately responsible for the infringement of the '460 Patent in making, importing, offering for sale or selling its products and components." (*Id.*, p. 5).
- "Sterling International is liable as a direct infringer for those products made by a process that infringe United States patents, including the '460 Patent." (*Id.*).
- "As stated above, this notice of infringement is an affirmative communication of a specific charge of infringement against the Accused Products satisfying the actual notice requirement for tolling damages." (*Id.*, p. 7).
- "By contrast, failure to license its usage of the '460 patented technology can only lead to the risk and expense of litigation, an award of damages, and attorneys' fees." (*Id.*).

12. No product made and sold by Sterling, including its Rescue W-H-Y Insect Traps line of insect traps, infringe any valid, enforceable claim of the '460 Patent.

13. In light of the correspondence received from Sorensen as detailed above, Sterling in good faith believes that Sorensen will file suit imminently against Sterling alleging infringement of certain claims of the '460 patent. An actual controversy therefore exists between the parties with respect to the infringement, validity, and scope of the claims of the '460 Patent.

IV. FIRST CLAM FOR RELIEF

(Declaration of Non-Infringement of the '460 Patent)

14. Plaintiff Sterling hereby incorporates by reference the allegations contained in paragraphs 1 through 13 as though fully set forth herein.

15. Defendant Sorensen claims to be the owner of all legal rights, title and interest in the '460 Patent, including the right to enforce the '460 Patent.

16. Sorensen asserts that Sterling's Rescue W-H-Y Insect Traps infringe certain claims of the '460 Patent.

17. Sterling's Rescue W-H-Y Insect Traps do not infringe any valid and enforceable claim of the '460 Patent.

18. None of Sterling's products infringes any valid and enforceable claim of the '460 Patent.

19. Sterling has not, either literally or under the Doctrine of Equivalents, directly, indirectly, or contributorily infringed, or actively induced infringement of, any claim of the '460 Patent, nor has Sterling otherwise violated Sorensen's rights under such patent.

20. Based on Sorensen's assertions and conduct described above, Sterling believes in good faith that Sorensen imminently will file suit against Sterling alleging infringement of certain claims of the '460 Patent. Because

Sterling makes and sells the insect traps Sorensen claims to infringe the '460 Patent, there is an actual and justiciable controversy between Sterling and Sorensen relating to the purported infringement of the '460 Patent.

21. Accordingly, a judicial declaration of non-infringement of the claims of the '460 Patent is necessary and appropriate pursuant to 28 U.S.C. § 2201 in order to resolve this controversy.

V. SECOND CLAIM FOR RELIEF

(Declaration of Invalidity of Claims of the '460 Patent)

22. Plaintiff hereby incorporates by reference the allegations contained in paragraphs 1 through 21 as though fully set forth herein.

23. At least Claim 1 of the '460 Patent is invalid for failure to meet one or more of the requirements of Title 35 of the United States Code, including without limitation, 35 U.S.C. §§ 102, 103, and/or 112. For example, at least Claim 1 of the '460 Patent is invalid as anticipated and/or obvious in light of available and known prior art, including but not limited to at least U.S. Patents Nos. 4,117,950 and 5,839,603. At least Claim 1 of the '460 Patent is invalid for other reasons as well, including but not limited to the fact that the language of certain claims, assessed in light of the patent's specification and other intrinsic and extrinsic evidence, is insufficiently definite to determine the claims' scope.

24. As outlined above, an actual and justiciable controversy has arisen between Sterling and Defendant Sorensen.

25. Accordingly, a judicial declaration of invalidity of one or more claims, and at least that of Claim 1, of the '460 Patent is necessary and appropriate pursuant to 28 U.S.C. § 2201 in order to resolve this controversy.

VI. PRAYER FOR RELIEF

WHEREFORE, Plaintiff requests this Court to grant the following relief:

a. That Defendant, its agents, servants, officers, directors, employees, attorneys, privies, representatives, successors, assigns, and parent and subsidiary entities, and any and all persons in act of concert or participation with any of them, be temporarily, preliminarily, and permanently enjoined from:

1. Threatening to assert or asserting the '460 Patent against Sterling, its agents, employees, suppliers or customers;
2. Alleging that Sterling's products infringe any claim of the '460 Patent;
3. Alleging that certain claims of the '460 Patent are valid and/or enforceable;

b. A declaration that Sterling has not and does not infringe, under any theory, any claim of the '460 Patent;

c. A declaration that claims of the '460 Patent are invalid;

d. Judgment that the Sterling is the prevailing party in this action and an award for costs and attorney fees incurred in this action; and

e. Any and all other relief that the Court deems proper.

Dated: February 8, 2013

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Scott C. Moore

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EXHIBIT A

US006599460B1

(12) **United States Patent**
Brown et al.

(10) **Patent No.: US 6,599,460 B1**
(45) **Date of Patent: Jul. 29, 2003**

(54) **PREVENTION OF VOID-BASED-IRREGULARITY FORMATION IN THIN-WALL, INJECTION-MOLDED PLASTIC PRODUCT**

(75) Inventors: **Paul Philip Brown**, San Diego, CA (US); **Jens Ole Sorensen**, Grand Cayman (KY)

(73) Assignee: **Sorensen Research and Develpoment Trust**, San Diego, CA (US)

(*) Notice: Subject to any disclaimer, the term of this patent is extended or adjusted under 35 U.S.C. 154(b) by 282 days.

(21) Appl. No.: **09/608,923**

(22) Filed: **Jul. 3, 2000**

(51) **Int. Cl.**[7] **B29C 45/00**
(52) **U.S. Cl.** **264/328.12**; 249/144; 425/577; 220/671; 220/675
(58) **Field of Search** 264/328.1, 328.12; 220/675, 671; 425/577; 249/142, 144

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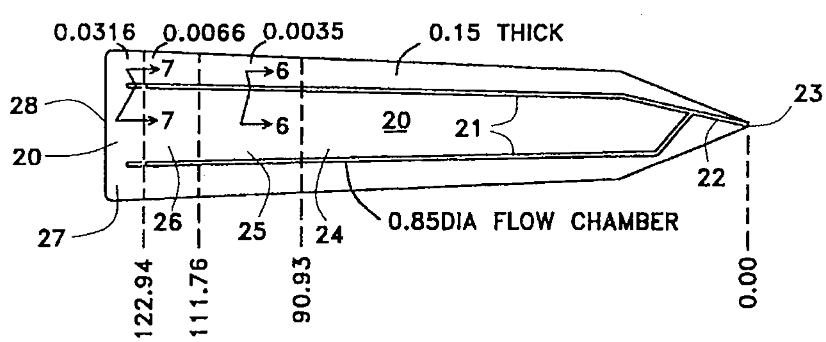
Primary Examiner—Jill L. Heitbrink
(74) *Attorney, Agent, or Firm*—Edward W. Callan

(57) **ABSTRACT**

During injection molding of a thin-wall plastic product, such as a drink cup, the formation of void-based irregularities is prevented in a thin-wall portion of the product formed within a zone of a thin-wall cavity section that is located between adjoining flow chambers, in which zone the thickness of the thin-wall cavity section increases in the general direction of flow within the flow chambers adjoining such zone. Such void-based irregularity formation is prevented by dimensioning the mold cavity so that the thickness increases in such direction at less than a threshold rate. The flow chambers do not extend to a rim portion of the thin-wall cavity section; and the respective inscribed-sphere dimensions of the adjoining flow chambers within a terminal zone of the thin-wall cavity section adjacent a rim portion of the mold cavity are less than the respective inscribed-sphere dimensions of upstream portions of the adjoining flow chambers.

34 Claims, 3 Drawing Sheets



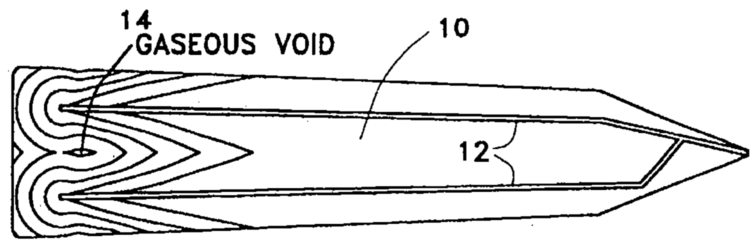


FIG.1

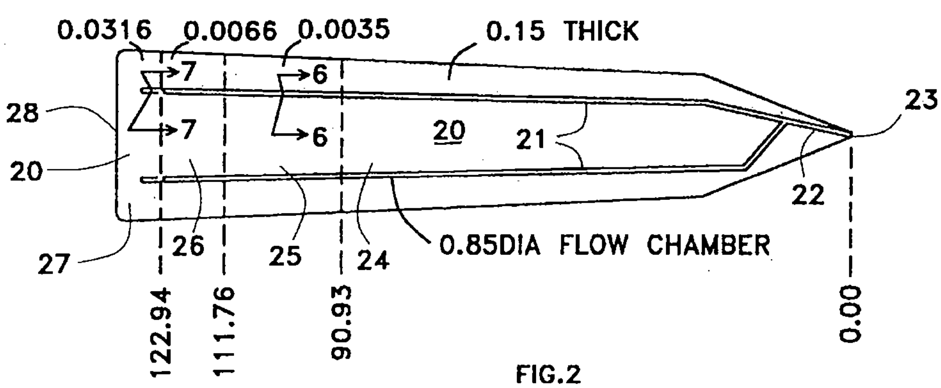


FIG.2

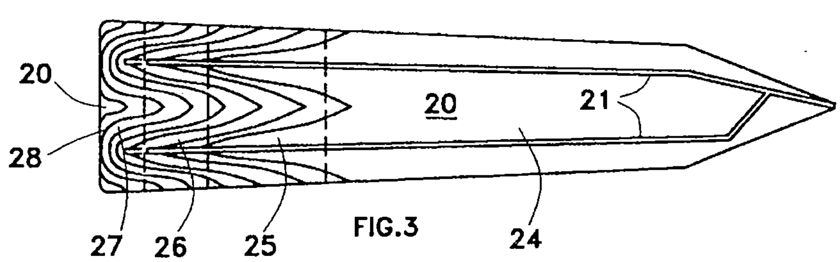


FIG.3

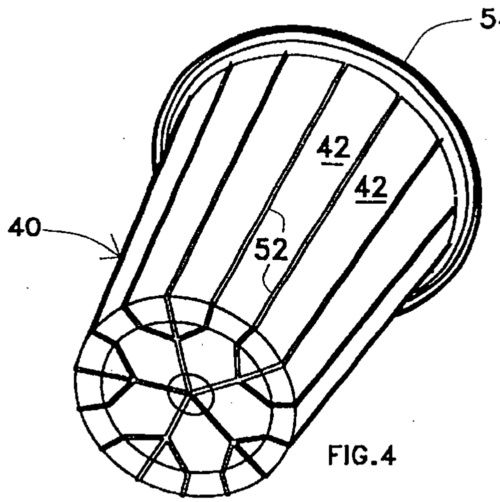


FIG.4

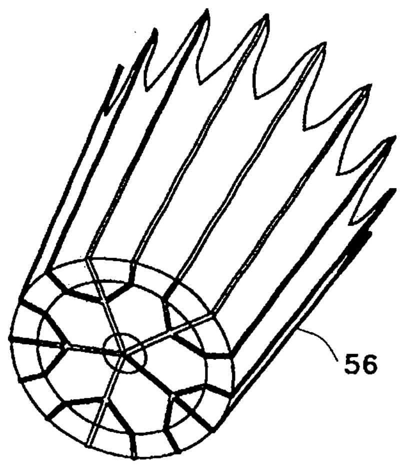


FIG.4A

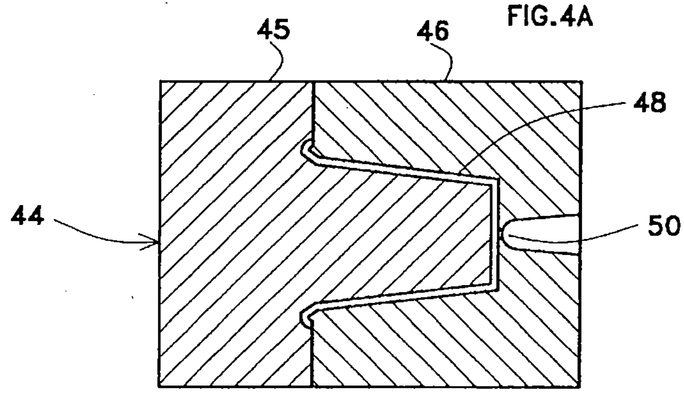


FIG.5

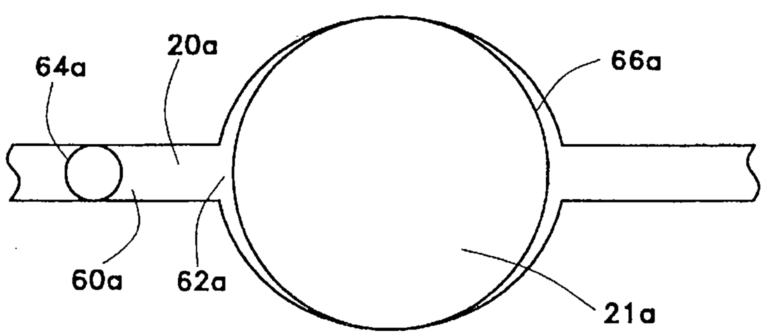


FIG.6A

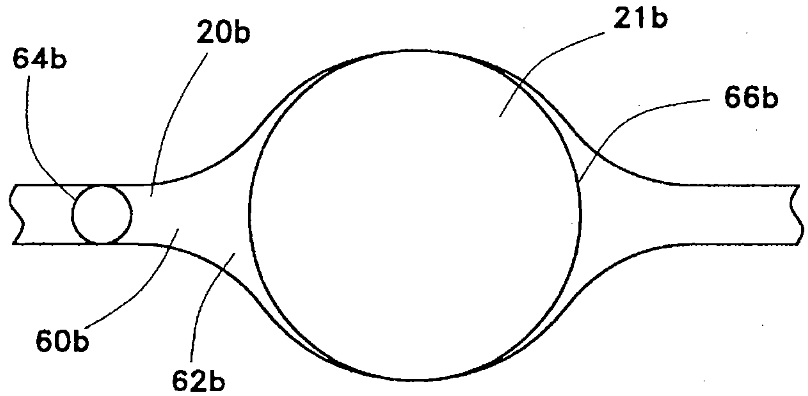


FIG.6B

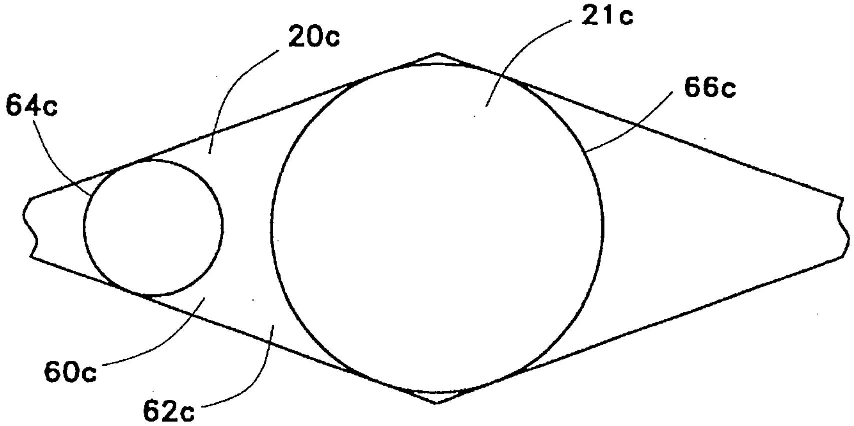


FIG.6C

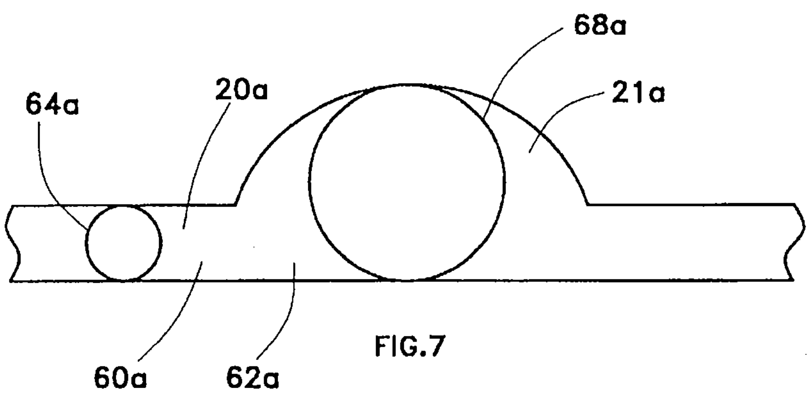


FIG.7

PREVENTION OF VOID-BASED-IRREGULARITY FORMATION IN THIN-WALL, INJECTION-MOLDED PLASTIC PRODUCT

BACKGROUND AND SUMMARY OF THE INVENTION

The present invention generally pertains to injection molding of thin-wall plastic products and is particularly directed to preventing the formation of void-based irregularities in thin-wall portions of such products.

Some thin-wall portions of some plastic products are injection molded by using a mold cavity that includes flow chambers for directing injected fluid plastic material into thin-wall cavity sections located between the flow chambers to thereby form the thin-wall portions of the product.

For some products, it is desired to increase the thickness of the thin-cavity section in the general direction of flow within the flow chambers adjoining said zone. However, when such thickness is so increased, void-based irregularities sometimes occur in a thin-wall portion of the product that is formed by fluid plastic material directed into a zone of the thin-wall cavity section that is located between opposed flow chambers adjoining such zone because the injected fluid plastic material that is directed into such zone may surround one or more gaseous voids within such zone during the formation of the product, as shown in FIG. 1.

FIG. 1 illustrates a sequential flow-front pattern of directed plastic material within a region of a thin-wall cavity section **10** adjacent the downstream extremities of a pair of opposed flow chambers **12**. The sequential flow-front pattern was determined by injecting different quantities of fluid plastic material into the flow chambers **12** and recording the extent of the resultant flow of such material directed into the thin-wall cavity section for each injection. It is seen that within a zone of the thin-wall cavity section **10** that is located between the flow chambers **12** the injected fluid plastic material that is directed into the thin-wall cavity section **10** surrounds a gaseous void **14** during the formation of the product. Consequently the thin-wall of the product includes an irregularity in the portion thereof that is formed in the zone of the thin-wall cavity section **12** in which the void **14** was surrounded by the directed fluid plastic material during the formation of the product. Such an irregularity may be manifested as a hole and/or a fragile and/or miscolored wall in such portion of the product. When the product is a container, such as a drink cup, a hole in the wall will enable fluid to leak from the container.

We have discovered that the formation of such void-based irregularities in the thin-wall portion of the product can be prevented within the zone of the thin-wall cavity section that is located between the flow chambers in which the thickness of the thin-wall cavity section increases in the general direction of flow within the flow chambers adjoining said zone by dimensioning the mold cavity so that said thickness increases in said direction at less than a threshold rate. When said thickness increases in said direction at a rate that equals or exceeds the threshold rate, such void-based irregularities usually occur. The threshold rate for a zone is determined empirically for each product, as described below in relation to the detailed description of the preferred embodiments.

The present invention provides a mold for injection-molding a product that includes at least one thin wall, comprising: a plurality of mold parts, which when combined define a mold cavity for forming the product and at least one gate from which fluid plastic material may be injected into the mold cavity; wherein the mold cavity includes at least one thin-wall cavity section and at least two opposed flow chambers that adjoin opposite edges of the thin-wall cavity section for directing injected fluid plastic material from exit positions of the said at least two opposed flow chambers into corresponding entrance positions of the thin-wall cavity section to thereby form at least one thin-wall portion of the product; wherein the at least one thin-wall cavity section includes at least one zone that is located between said at least two opposed flow a chambers; wherein within the at least one zone inscribed-sphere dimensions at each entrance position are smaller than inscribed-sphere dimensions at the corresponding exit position of the adjoining flow chamber; and wherein within the at least one zone the thickness of the at least one thin-wall cavity section increases in the general direction of flow within the flow chambers adjoining said zone, with said increase being at less than a threshold rate to thereby prevent injected fluid plastic material so directed into the at least one zone from at any time surrounding any gaseous void within the at least one zone. "Inscribed-sphere dimensions" are those dimensions in which a sphere can be fitted.

The present invention also provides a method of injection-molding a product that includes at least one thin wall, comprising the steps of:

(a) combining a plurality of mold parts to define a mold cavity for forming the product and at least one gate from which fluid plastic material may be injected into the mold cavity, wherein the mold cavity includes at least one thin-wall cavity section and at least two opposed flow chambers that adjoin opposite edges of the thin-wall cavity section for directing injected fluid plastic material from exit positions of the said at least two opposed flow chambers into corresponding entrance positions of the at least one thin-wall cavity section to thereby form at least one thin-wall portion of the product, wherein the at least one thin-wall cavity section includes at least one zone that is located between said at least two opposed flow chambers, and wherein within the at least one zone inscribed-sphere dimensions at each entrance position are smaller than inscribed-sphere dimensions at the corresponding exit position of the adjoining flow chamber; and

(b) injecting fluid plastic material from the gate into the mold cavity to form the product;

wherein step (a) comprises combining mold parts that define a said mold cavity in which within said at least one zone of the at least one thin-wall cavity section the thickness of the at least one thin-wall cavity section increases in the general direction of flow within the flow chambers adjoining said zone, with said increase being at less than a threshold rate to thereby prevent injected fluid plastic material so directed into the at least one zone from at any time surrounding any gaseous void within the at least one zone.

Additional features of the present invention are described with reference to the detailed description of the preferred embodiments.

BRIEF DESCRIPTION OF THE DRAWING

FIG. **1** illustrates a sequential flow-front pattern of directed plastic material within a region of a thin-wall cavity section in which a void is surrounded by such material during the formation of a thin-wall portion of a product within the thin-wall cavity section.

FIG. 2 shows exemplary dimensions of a preferred embodiment of a thin-wall cavity section defined by a mold according to the present invention. FIG. 2 is drawn approximately to scale.

FIG. 3 illustrates a sequential flow-front pattern of directed plastic material within the thin-wall cavity section shown in FIG. 2.

FIG. 4 is a perspective view of a drink-cup product injected molded in the mold of the present invention.

FIG. 4A is a perspective view of a portion of the product of FIG. 4 that is formed during an empirical determination of whether the rate of increase of the thickness of a thin-wall cavity section is below the threshold rate at which void-based irregularity formation is consistently prevented.

FIG. 5 is a sectional view of a mold in which the mold parts define a cavity section for molding the drink-cup product shown in FIG. 4.

FIG. 6A is a sectional view illustrating the respective inscribed-sphere dimensions in one embodiment of the mold cavity at an entrance position of a thin-wall cavity section and a corresponding exit position of an adjoining flow chamber, as seen along lines 6—6 in FIG. 2.

FIG. 6B is a sectional view illustrating the respective inscribed-sphere dimensions in another embodiment of the mold cavity at an entrance position of a thin-wall cavity section and a corresponding exit position of an adjoining flow chamber, as seen approximately along lines 6—6 in FIG. 2.

FIG. 6C is a sectional view illustrating the respective inscribed-sphere dimensions in still another embodiment of the mold cavity at an entrance position of a thin-wall cavity section and a corresponding exit position of an adjoining flow chamber, as seen approximately along lines 6—6 in FIG. 2.

FIG. 7 is a sectional view illustrating the respective inscribed-sphere dimensions in an embodiment of the mold cavity at an entrance position of a thin-wall cavity section and a corresponding exit position of an adjoining flow chamber near the downstream extremity of the flow chamber, as seen along lines 7—7 in FIG. 2.

DETAILED DESCRIPTION

Referring to FIG. 2, a preferred embodiment of a mold cavity defined by a mold according to the present invention includes a thin-wall cavity section **20** and a pair of opposing flow chambers **21** adjoining opposite sides of the cavity section **20** for directing injected fluid plastic material from exit positions of the two opposed flow chambers **21** into corresponding entrance positions of the thin-wall cavity section **20** to thereby form a thin-wall portion of an injection molded product. The pair of opposing flow chambers **21** extend from a feeding flow chamber **22** that is coupled to a gate **23** defined by the mold.

An exemplary preferred embodiment of a thin-wall cavity section **20** for forming a thin-wall portion of an injection molded plastic product is dimensioned as shown in FIG. 2. The material used for this exemplary embodiment was polypropylene. The thin-wall cavity section **20** includes an initial zone **24**, a first intermediate zone **25**, a second intermediate zone **26** and a terminal zone **27**. The terminal zone **27** extends to a rim portion **28** of the mold cavity at which a rim of a thin-wall portion of a product is formed. The dividing line between the initial zone **24** and the first intermediate zone **25** is 90.35 mm. from the gate **23**. The dividing line between the first intermediate zone **25** and a second intermediate zone **26** is 111.76 mm. from the gate **23**. The dividing line between the second intermediate zone **26** and the terminal zone **27** is 122.94 mm. from the gate **23**. The initial zone **24**, the first intermediate zone **25** and the second intermediate zone **26** are located completely between the pair of opposing flow chambers **21**. Neither of the pair of opposing flow chambers **21** extends to the rim portion **28**, whereby a substantial portion of the terminal zone **27** is not located between the opposing pair of flow chambers **21**. The prevention of formation of void-based irregularities in the terminal zone **27** is enhanced by not extending either of the pair of opposing flow chambers **21** to the rim portion **28**.

The formation of void-based irregularities in the terminal zone **27** beyond the downstream extremities of the flow chambers **21** may not be a problem when they occur very close to a rim portion **28**.

In the initial zone **24**, the thin-wall cavity section **20** has a uniform thickness of 0.15 mm. In the first intermediate zone **25**, the thickness of the at least one thin-wall cavity section **20** increases in the general direction of flow within the flow chambers **21** adjoining the first intermediate zone **25** at a rate of 0.0035. In the second intermediate zone **26**, the thickness of the at least one thin-wall cavity section **20** increases in the general direction of flow within the flow chambers **21** adjoining the second intermediate zone **26** at a rate of 0.0066. In the terminal zone **27**, the thickness of the at least one thin-wall cavity section **20** increases in the general direction of flow within the flow chambers **21** closest to the terminal zone **27** at a rate of 0.0316. Each of the opposing flow chambers **21** adjoining the initial zone **24**, the first intermediate zone **25** and the second intermediate zone **26** has a diameter of 0.85 mm. Approaching the downstream extremities of the opposed flow chambers **21**, the respective inscribed-sphere dimensions of the flow chambers **21** are less than the respective inscribed-sphere dimensions of upstream portions of the adjoining flow chambers **21**. Such decrease in the respective inscribed-sphere dimensions of the flow chamber **21** further enhances prevention of formation of void-based irregularities in the terminal zone **27**.

Referring to FIG. **3**, which illustrates a sequential flow-front pattern of directed plastic material within the thin-wall cavity section shown in FIG. 2, it is seen that the injected fluid plastic material that is directed into the thin-wall cavity section **20** does not at any time surround any gaseous void within any zone of the thin-wall section **20** that is located between the pair of opposing flow chambers **21** (including zones **24, 25, 26** and the portion of zone **27** that is located between the opposing flow chambers **21**).

A drink cup **40**, as shown in FIG. **4**, having a plurality of thin-wall portions **42** was injected molded by the method of the present invention in a mold **44** according to the present invention, as shown in FIG. **5**. The mold **44** includes a plurality of mold parts **45, 46**, which when combined define a mold cavity **48** for forming the drink-cup **40** and a gate **50** from which fluid plastic material is injected into the mold cavity **48**. The mold cavity **48** includes a plurality of thin-wall cavity sections **20**, as shown in FIG. 2, and a plurality of adjoining opposed flow chambers **21** at opposite edges of each thin-wall cavity section **20**. The thin-wall portions **42** of the drink cup **40** are formed in the thin-wall cavity sections **20**. The drink cup **40** also includes ridges **52**, which are formed in the flow chambers **21** of the mold cavity **48**. The ridges **52** do not extend to a rim **54** of the cup **40**. Each thin-wall cavity section **20** of the mold cavity **48** includes an initial zone **24**, a first intermediate zone **25**, a second intermediate zone **26** and a terminal zone **27**, which are located and dimensioned as described above with reference to FIG. 2.

The threshold rate of increase in the thickness of the thin-wall cavity section **20** within each of the first intermediate zone **25**, the second intermediate zone **26** and the terminal zone **27** below which void-based irregularity formation between the adjoining flow chambers **21** is prevented within all such zones **25, 26, 27** was determined empirically by injection molding test strips generally corresponding to an individual common thin-wall portion **42** of the drink cup **40**, with different quantities of fluid plastic material being injected into a mold cavity, such as shown in FIG. 2, in which the rate of increase in the thickness is varied for each such zone **25, 26, 27** separately, and observing the respective rates of increase of the thickness within each zone **25, 26, 27** at which void-based irregularity formation is or is not prevented.

The dimensions of the mold cavity **48** were initially selected in accordance with such test-strip determinations. Partial test products **56**, such as shown in FIG. 4A, were then injected molded with different quantities of fluid plastic material being injected into the mold cavity **48** to determine whether the respective rates of increase of the thickness within each of the first intermediate zone **25**, the second intermediate zone **26** and the terminal zone **27** of the thin-wall cavity section **20** that were determined by observing the test strips were such that void-based irregularity formation between the adjoining flow chambers **21** in each of the zones **25, 26, 27** was consistently prevented. When observation of the partial test products **56** reveals that void-based irregularity formation is not consistently prevented, the rate of increase in the thickness is reduced in the zone or zones in which void-based irregularity formation is not consistently prevented; and further test strips and partial test products **56** are injection molded for further observation.

FIGS. 6A, 6B and 6C illustrate the respective inscribed-sphere dimensions at an entrance position of a thin-wall cavity section and a corresponding exit position of an adjoining flow chamber in three alternative embodiments of the mold cavity **48**.

In the mold cavity of FIG. 6A, the entrance position **60***a* of the thin-wall cavity section **20***a* is of approximately uniform thickness in a direction normal to the direction of flow within the adjoining flow chamber **21***a*; the cross-section of the flow chamber **21***a* is circular in the direction normal to the direction of flow within the flow chamber **21***a*; and here is a sharp transition between the exit position **62***a* of the flow chamber **21***a* and the entrance position **60***a* of the thin-wall cavity section **20***a*. Injected fluid plastic material is directed from the exit position **62***a* of the flow chamber **21***a* into the corresponding entrance position **60***a* of the thin-wall cavity section **20***a*; and the inscribed-sphere dimension **64***a* at the entrance position **60***a* is smaller than the inscribed-sphere dimension **66***a* at the corresponding exit position **62***a* of the adjoining flow chamber **21***a*.

In the mold cavity of FIG. 6B, the entrance position **60***b* of the thin-wall cavity section **20***b* is of approximately uniform thickness in a direction normal to the direction of flow within the adjoining flow chamber **21***b*; the cross-section of the flow chamber **21***b* is oval in the direction normal to the direction of flow within the flow chamber **21***a*; and there is a tapered transition between the exit position **62***b* of the flow chamber **21***b* and the entrance position **60***b* of the thin-wall cavity section **20***b*. Injected fluid plastic material is directed from the exit position **62***b* of the flow chamber **21***b* into the corresponding entrance position **60***b* of the thin-wall cavity section **20***b*; and the inscribed-sphere dimension **64***b* at the entrance position **60***b* is smaller than the inscribed-sphere dimension **66***b* at the corresponding exit position **62***b* of the adjoining flow chamber **21***b*.

In the mold cavity of FIG. 6C, the thickness of the entrance position **60***c* of the thin-wall cavity section **20***c* decreases in a direction away from and normal to the direction of flow within the adjoining flow chamber **21***c*. Injected fluid plastic material is directed from the exit position **62***c* of the flow chamber **21***c* into the corresponding entrance position **60***c* of the thin-wall cavity section **20***c*; and the inscribed-sphere dimension **64***c* at the entrance position **60***c* is smaller than the inscribed-sphere dimension **66***c* at the corresponding exit position **62***c* of the adjoining flow chamber **21***c*.

FIG. 7 illustrates the respective inscribed-sphere dimensions at an entrance position **60***a* of the thin-wall cavity section **20***a* and a corresponding exit position **62***a* of the adjoining flow chamber **21***a* near the downstream extremity of the flow chamber **21***a* in an embodiment of the mold cavity corresponding to that shown in FIG. 6A. The entrance position **60***a* of the thin-wall cavity section **20***a* is of approximately uniform thickness in a direction normal to the direction of flow within the adjoining flow chamber **21***a*; the cross-section of the flow chamber **21***a*, (which resides within the generally concave surface of the mold cavity **48**) is semicircular in the direction normal to the direction of flow within the flow chamber **21***a*; the flow chamber **21***a* has a smaller inscribed-sphere dimension than in the upstream portion of the flow chamber **21***a* shown in FIG. 6A; and there is a sharp transition between the exit position **62***a* of the flow chamber **21***a* and the entrance position **60***a* of the thin-wall cavity section **20***a*. Injected fluid plastic material is directed from the exit position **62***a* of the flow chamber **21***a* into the corresponding entrance position **60***a* of the thin-wall cavity section **20***a*; and the inscribed-sphere dimension **64***a* at the entrance position **60***a* is smaller than the inscribed-sphere dimension **68***a* at the corresponding exit position **62***a* of the adjoining flow chamber **21***a*.

In additional alternative embodiments (not shown), (a) at least one of the adjoining flow chambers does not extend from the gate either directly or via one or more connected intervening flow chambers; (b) the direction of flow within an elongated flow chamber is not necessarily lengthwise; (c) opposed flow chambers do not necessarily direct fluid plastic material toward a common position between the opposed flow chambers; (d) flow chambers may be curved and/or shaped in any manner; (e) thin-wall cavity sections need not be relatively flat or conical; (f) a thin-wall cavity section may be interposed between at least one flow chamber and the gate; and (g) meld chambers, such as described in U.S. Pat. No. 4,844,405, may be disposed within the thin cavity region between the opposed adjoining flow chambers to further enhance prevention of formation of void-based irregularities in those zones of the thin-wall section **20** that are located between the pair of opposing flow chambers **21**.

The advantages specifically stated herein do not necessarily apply to every conceivable embodiment of the present invention. Further, such stated advantages of the present invention are only examples and should not be construed as the only advantages of the present invention.

While the above description contains many specificities, these should not be construed as limitations on the scope of the present invention, but rather as examples of the preferred embodiments described herein. Other variations are possible and the scope of the present invention should be determined not by the embodiments described herein but rather by the claims and their legal equivalents.

We claim:

1. A method of injection-molding a product that includes at least one thin wall, comprising the steps of:

(a) combining a plurality of mold parts to define a mold cavity for forming the product and at least one gate from which fluid plastic material may be injected into the mold cavity, wherein the mold cavity includes at least one thin-wall cavity section and at least two opposed flow chambers that adjoin opposite edges of the thin-wall cavity section for directing injected fluid plastic material from exit positions of the said at least two opposed flow chambers into corresponding entrance positions of the at least one thin-wall cavity section to thereby form at least one thin-wall portion of the product, wherein the at least one thin-wall cavity section includes at least one zone that is located between said at least two opposed flow chambers, and wherein within the at least one zone inscribed-sphere dimensions at each entrance position are smaller than inscribed-sphere dimensions at the corresponding exit position of the adjoining flow chamber; and

(b) injecting fluid plastic material from the gate into the mold cavity to form the product;

wherein step (a) comprises combining mold parts that define a said mold cavity in which within said at least one zone of the at least one thin-wall cavity section the thickness of the at least one thin-wall cavity section increases in the general direction of flow within the flow chambers adjoining said zone, with said increase being at less than a threshold rate to thereby prevent injected fluid plastic material so directed into the at least one zone from at any time surrounding any gaseous void within the at least one zone.

2. A method according to claim 1, wherein the mold cavity includes a plurality of said thin-wall cavity sections and a plurality of said adjoining at least two opposed flow chambers at opposite edges of each thin-wall cavity section; and

wherein each thin-wall cavity section includes at least one said zone located between the adjoining at least two opposed flow chambers, in which inscribed-sphere dimensions at each entrance position are smaller than inscribed-sphere dimensions at the corresponding exit position of the adjoining flow chamber; and in which the thickness of the thin-wall cavity section increases in the direction of flow within the adjoining flow chambers at less than said threshold rate.

3. A method according to claim 2, wherein the mold cavity defines a hollow product.

4. A method according to claim 3, wherein the mold cavity defines a drink cup.

5. A method according to claim 2, wherein each at least one thin-wall cavity section extends to a rim portion of the mold cavity in which a rim of the product is formed, and

wherein none of at least two opposed flow chambers adjoining the at least one thin-wall cavity section extend to the rim portion.

6. A method according to claim 5, wherein within a terminal zone of the at least one thin-wall cavity section adjacent the rim portion of the mold cavity, the respective inscribed-sphere dimension of the adjoining flow chambers are less than the respective inscribed-sphere dimension of upstream portions of the adjoining flow chambers.

7. A method according to claim 2, wherein within a terminal zone of the at least one thin-wall cavity section adjacent a rim portion of the mold cavity in which a rim of the product is formed, the respective inscribed-sphere dimension of the adjoining flow chambers are less than the respective inscribed-sphere dimension of upstream portions of the adjoining flow chambers.

8. A method according to claim 1, wherein within a terminal zone of the at least one thin-wall cavity section adjacent a rim portion of the mold cavity in which a rim of the product is formed, the respective inscribed-sphere dimension of the adjoining flow chambers are less than the respective inscribed-sphere dimension of upstream portions of the adjoining flow chambers.

9. A method according to claim 1, wherein each at least one thin-wall cavity section extends to a rim portion of the mold cavity in which a rim of the product is formed, and

wherein none of at least two opposed flow chambers adjoining the at least one thin-wall cavity section extend to the rim portion.

10. A method according to claim 9, wherein within a terminal zone of the at least one thin-wall cavity section adjacent the rim portion of the mold cavity, the respective inscribed-sphere dimension of the adjoining flow chambers are less than the respective inscribed-sphere dimension of upstream portions of the adjoining flow chambers.

11. A method according to claim 9, wherein within a terminal zone of the at least one thin-wall cavity section adjacent the rim portion of the mold cavity, the thickness of the at least one thin-wall cavity section increases in the direction of flow within the closest portions of the adjoining flow chambers at a rate greater than the rate of increase within the at least one zone of the at least one thin-wall cavity section.

12. A method according to claim 11, wherein a portion of the terminal zone is located between the adjoining at least two opposed flow chambers.

13. A method according to claim 11, wherein within an intermediate zone of the at least one thin-wall cavity section that is located between the adjoining at least two opposed flow chambers and between the at least one zone and the terminal zone, the thickness of the thin-wall cavity section increases in the direction of flow within the adjoining at least two opposed flow chambers at a rate less than the threshold rate, greater than the rate of increase within the at least one zone and less than the rate of increase within the terminal zone.

14. A method according to claim 1, wherein within an initial zone of the thin-wall section between the adjoining at least two opposed flow chambers and upstream from the at least one zone, the thickness of the thin-wall section does not change in the direction of flow within the adjoining at least two opposed flow chambers.

15. A method according to claim 1, wherein the flow chambers are elongated in the direction in which injected plastic material is directed within the flow chambers.

16. A method according to claim 1, wherein at each entrance position, the thin-wall cavity section is of uniform thickness in a direction normal to the general direction of flow within the adjoining flow chamber.

17. A method according to claim 1, wherein the thickness of each entrance position of the thin-wall cavity section decreases in a direction away from and normal to the general direction of flow within the adjoining flow chamber.

18. A mold for injection-molding a product that includes at least one thin wall, comprising:

a plurality of mold parts, which when combined define a mold cavity for forming the product and at least one gate from which fluid plastic material may be injected into the mold cavity;

wherein the mold cavity includes at least one thin-wall cavity section and at least two opposed flow chambers that adjoin opposite edges of the thin-wall cavity section for directing injected fluid plastic material from exit positions of the said at least two opposed flow chambers into corresponding entrance positions of the thin-wall cavity section to thereby form at least one thin-wall portion of the product;

wherein the at least one thin-wall cavity section includes at least one zone that is located between said at least two opposed flow chambers;

wherein within the at least one zone inscribed-sphere dimensions at each entrance position are smaller than inscribed-sphere dimensions at the corresponding exit position of the adjoining flow chamber; and

wherein within the at least one zone the thickness of the at least one thin-wall cavity section increases in the general direction of flow within the flow chambers adjoining said zone, with said increase being at less than a threshold rate to thereby prevent injected fluid plastic material so directed into the at least one zone from at any time surrounding any gaseous void within the at least one zone.

19. A mold according to claim 1, wherein the mold cavity includes a plurality of said thin-wall cavity sections and a plurality of said adjoining at least two opposed flow chambers at opposite edges of each thin-wall cavity section; and

wherein each thin-wall cavity section includes at least one said zone located between the adjoining at least two opposed flow chambers, in which inscribed-sphere dimensions at each entrance position are smaller than inscribed-sphere dimensions at the corresponding exit position of the adjoining flow chamber; and in which the thickness of the thin-wall cavity section increases in the direction of flow within the adjoining flow chambers at less than said threshold rate.

20. A mold according to claim 19, wherein the mold cavity defines a hollow product.

21. A mold according to claim 20, wherein the mold cavity defines a drink cup.

22. A mold according to claim 19, wherein each at least one thin-wall cavity section extends to a rim portion of the mold cavity in which a rim of the product is formed, and

wherein none of at least two opposed flow chambers adjoining the at least one thin-wall cavity section extend to the rim portion.

23. A mold according to claim 22, wherein within a terminal zone of the at least one thin-wall cavity section adjacent the rim portion of the mold cavity, the respective inscribed-sphere dimension of the adjoining flow chambers are less than the respective inscribed-sphere dimension of upstream portions of the adjoining flow chambers.

24. A mold according to claim 19, wherein within a terminal zone of the at least one thin-wall cavity section adjacent a rim portion of the mold cavity in which a rim of the product is formed, the respective inscribed-sphere dimension of the adjoining flow chambers are less than the respective inscribed-sphere dimension of upstream portions of the adjoining flow chambers.

25. A mold according to claim 18, wherein within a terminal zone of the at least one thin-wall cavity section adjacent a rim portion of the mold cavity in which a rim of the product is formed, the respective inscribed-sphere dimension of the adjoining flow chambers are less than the respective inscribed-sphere dimension of upstream portions of the adjoining flow chambers.

26. A mold according to claim 18, wherein each at least one thin-wall cavity section extends to a rim portion of the mold cavity in which a rim of the product is formed, and

wherein none of at least two opposed flow chambers adjoining the at least one thin-wall cavity section extend to the rim portion.

27. A mold according to claim 26, wherein within a terminal zone of the at least one thin-wall cavity section adjacent the rim portion of the mold cavity, the respective inscribed-sphere dimension of the adjoining flow chambers are less than the respective inscribed-sphere dimension of upstream portions of the adjoining flow chambers.

28. A mold according to claim 26, wherein within a terminal zone of the at least one thin-wall cavity section adjacent the rim portion of the mold cavity, the thickness of the at least one thin-wall cavity section increases in the direction of flow within the closest portions of the adjoining flow chambers at a rate greater than the rate of increase within the at least one zone of the at least one thin-wall cavity section.

29. A mold, according to claim 28, wherein a portion of the terminal zone is located between the adjoining at least two opposed flow chambers.

30. A mold according to claim 28, wherein within an intermediate zone of the at least one thin-wall cavity section that is located between the adjoining at least two opposed flow chambers and between the at least one zone and the terminal zone, the thickness of the thin-wall cavity section increases in the direction of flow within the adjoining at least two opposed flow chambers at a rate less than the threshold rate, greater than the rate of increase within the at least one zone and less than the rate of increase within the terminal zone.

31. A mold according to claim 18, wherein within an initial zone of the thin-wall section between the adjoining at least two opposed flow chambers and upstream from the at least one zone, the thickness of the thin-wall section does not change in the direction of flow within the adjoining at least two opposed flow chambers.

32. A mold according to claim 18, wherein the flow chambers are elongated in the direction in which injected plastic material is directed within the flow chambers.

33. A mold according to claim 18, wherein at each entrance position, the thin-wall cavity section is of uniform thickness in a direction normal to the general direction of flow within the adjoining flow-chamber.

34. A mold according to claim 18, wherein the thickness of each entrance position of the thin-wall cavity section decreases in a direction away from and normal to the general direction of flow within the adjoining flow chamber.

* * * * *

EXHIBIT B

SORENSEN RESEARCH & DEVELOPMENT

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CONFIDENTIAL OFFER OF COMPROMISE
Subject To Federal Rules Of Evidence § 408

RE: Sterling International, Inc.'s (hereinafter "Sterling International") apparent unauthorized usage of the technology claimed in United States Patent No. 6,599,460; Rescue W-H-Y Insect Trap, Our Case No. 7279, P757

Dear Mr. Schneidmiller:

We have recently examined several of Sterling International's products. From our experts' examination and testing, we have determined that the structure of the above referenced products meets the claim limitations of United States Patent Number 6,599,460 ("the '460 patent"). Further, our records indicate that Sterling International is not currently licensed under the '460 patent.

Further, for your information, Sorensen R&D also holds and controls the following foreign counterparts of the '460 patent: Japanese Patent No. 4,717,273 and European Patent No. 1174238. European Patent No. 1174238 has been designated in the following contracting states: Germany, France, Italy, and the United Kingdom.

Sorensen Research & Development ("Sorensen R&D"), is the owner of the '460 patent entitled "PREVENTION OF VOID-BASED-IRREGULARITY FORMATION IN

THIN-WALL, INJECTION-MOLDED PLASTIC PRODUCT," filed on July 3, 2000. Sorensen R&D is a leader in the field of plastic manufacturing technology. Its patents, both U.S. and foreign, are at the forefront of advances in manufacturing and disclose valuable knowledge to the manufacturing industry in the form of significant improvements to the processes used for manufacturing products. Sorensen R&D licenses this valuable technology to various industries and promotes cutting-edge research and development efforts thereby fostering progress and the discovery of scientific advancements in injection molding. Sorensen R&D's patents teach innovative and cost-effective manufacturing process solutions that provide licensees with a competitive advantage. Its patents further provide companies with limited capital, or limited accessibility to highly skilled scientists, access to advancements in research and development that would otherwise be unattainable.

Specifically, the '460 patent provides an elegant solution for injection molding of plastic products with flow chambers and particularly for preventing the formation of void-based irregularities in thin-wall portions of such products.

In 1962, Jens Ole Sorensen, a young mathematician, desiring to manufacture his geometric toy invention, founded O.S. Plastics. In 1963, the company expanded to include production of flower pots, a product, which Sorensen sought to improve by minimizing the amount of raw material required per flower-pot, through an overall reduction in wall thickness. Sorensen's thinner flower-pots became wildly successful, with O.S. Plastics growing to become the world's largest manufacturer of flower-pots by 1968, manufacturing an amount pots per year that if lined up side by side would span a length equal to the distance to the moon and back.

Spurred by success and market demands Sorensen dreamed of further minimizing the amount of raw materials used per flower-pot. For seven years he worked to find a way to use relatively less material near the base of the flower pot without sacrificing breaking strength and while maintaining resistance to deformation, a feat no manufacturer had yet been able to accomplish. Attempts at the time by the industry to manufacture flower-pots with walls having thickness tapered to allow relatively less material near the bottom of the flower-pot resulted in difficulty of fully filling the mold and also caused an unacceptable warpage of the product.

At the time, the injection-molding industry had also experimented with the use of flow-ribs to lend strength to the walls of injection-molded products and to improve the flow of the injected plastic away from the gate to the distal ends of these products. Sorensen attempted to combine the flow-rib technology and the tapering of the wall thickness of his flower-pots to allow relatively less material to be used near the base. This combined technique eliminated both the warpage problem and the mold filling problem, but at the expense of causing the formation of void-based irregularities in the product occurring between the flow-ribs. These void-based irregularities caused weakness, color changes, and holes at their sites in the product walls.

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At the time, the injection-molding industry had also experimented with the use of flow-ribs to lend strength to the walls of injection-molded products and to improve the flow of the injected plastic away from the gate to the distal ends of these products. Sorensen attempted to combine the flow-rib technology and the tapering of the wall thickness of his flower-pots to allow relatively less material to be used near the base. This combined technique eliminated both the warpage problem and the mold filling problem, but at the expense of causing the formation of void-based irregularities in the product occurring between the flow-ribs. These void-based irregularities caused weakness, color changes, and holes at their sites in the product walls.

As stated above, this notice of infringement is an affirmative communication of a specific charge of infringement against the Accused Products satisfying the actual notice requirement for tolling damages.

Sterling International must recognize that licensing the '460 patented technology will allow it to continue to enjoy all the benefits and competitive advantages offered by this useful patent. By contrast, failure to license its usage of the '460 patented technology can only lead to the risk and expense of litigation, an award of damages, and attorneys' fees.

There are scores of businesses that have licensed their usage of Sorensen R&D's patented technology. Some of those businesses include Helen of Troy, Microsoft, Hewlett-Packard Company, 3M Company, Adidas-Salomon, Atomic Ski, Bosch, BMW AG, Chicony Electronics, DaimlerChrysler AG, Fluke, Head USA, Mercedes-Benz, Dremel, Garmin International, Irwin Tools, Milwaukee Electric (Milwaukee Tools), Nordica, Rubbermaid, Salomon, Skil, Strait-Line, Technica, The Stanley Works (Stanley Tools), and Welch Allyn. Sorensen R&D is committed to protecting the value to its licensees by stopping infringement wherever it is found. To protect Sorensen R&D's intellectual property rights, we cannot allow Sterling International's unlicensed usage to continue.

Courts have routinely found that the penalties for patent infringement can be high relative to the economic benefit that the infringer might have realized from use of the technology. In *Snellman v. Ricoh Co,* 862 F.2d 283 (Fed. Cir. 1988), *cert. denied*, 109 S.Ct. 3199 (1989), the Federal Circuit upheld a jury award equal to more than four times the infringer's total sales revenue. In *TVM Manufacturing Co. v. Dura Corp.*, 789 F.2d 895 (Fed. Cir. 1986), *cert. denied,* 479 U.S. 852 (1986) the Federal Circuit approved a 30% royalty granted by the trial court. The Federal Circuit in *Bio-Rad Laboratories, Inc. v. Nicolet Instrument Corp.*, 739 F.2d 604 (Fed. Cir.), *cert. denied*, 469 U.S. 1038 (1984) affirmed a royalty rate equal to one-third of the sales price of the infringing product. The Federal Circuit in *Deere & Co. v. International Harvester Co.*, 710 F.2d 1551 (Fed. Cir. 1983) approved a 15% royalty, despite the fact that some licenses were granted as low as 1%.

In *Weinar v. Rollform, Inc.*, 744 F.2d 797 (Fed. Cir. 1984), *cert. denied*, 470 U.S. 1084 (1985), the Federal Circuit upheld an award of three cents per infringing product, which resulted in a damage award exceeding the gross sales figure for the infringing device. The Court in *DNIC Brokerage Co. v. Morrison and Dempsey Communications, Inc.*, 14 USPQ.2d 1043 (C.D. Cal. 1989) awarded a royalty equal to 22% of the infringer's sales, stating that "the [p]laintiff is at least entitled to a royalty that prohibits defendants from profiting from their infringement by retaining the difference between a reasonable royalty and their net profit." Finally, the Federal Circuit in *Stickle v. Heublein*, 716 F.2d 1550 (Fed. Cir. 1983) observed that "the trial court may award an amount of damages greater than a reasonable royalty...[because] the infringer would have nothing to lose, and everything to gain if he could count on paying only the normal, routine royalty non-infringers might have paid." This type of increase over an ordinary "reasonable royalty" is sometimes referred to by the Federal Circuit as a "reasonable royalty *for an infringer*."

The Federal Circuit has repeatedly stated that: "Intent is not an element of infringement. *See, e.g., Kewanee Oil Co. v. Bicron Corp.*, 416 U.S. 470, 478, 94 S.Ct. 1879, 1884, 40 L.Ed.2d 315 (1974). A patent owner may exclude others from practicing the claimed invention, regardless of whether infringers even know of the patent." *Hilton Davis Chem. Co. v. Warner-Jenkinson Co.*, 62 F.3d 1512, 1519 (Fed. Cir. 1995), *overruled on other grounds*, 520 U.S. 17 (1997).

> This question [of infringement] is one irrespective of motive. The defendant may have infringed without intending, or even knowing it; but he is not, on that account, the less an infringer. His motives and knowledge may affect the question of damages, to swell or reduce them; but the immediate question is the simple one, has he infringed?
> *Id.*

Infringement "is a strict liability offense, and a court must award 'damages adequate to compensate for the infringement,' 35 U.S.C. § 284, regardless of the intent, culpability or motivation of the infringer." *Jurgens v. CBK Ltd.*, 80 F.3d 1566, 1570 n.2 (Fed. Cir. 1966) (citation omitted) (citing *Hilton Davis*, 62 F.3d 1512, 1527 (Fed. Cir. 1995)).

Further, U.S. law mandates a reasonable royalty as the floor below which damages shall not fall. 35 U.S.C. §284. See *Stickle v. Heublein Inc.*, 716 F.2d 1550, 219 USPQ 377, 385 (Fed. Cir. 1983). A reasonable royalty is the amount a person, desiring to manufacture, use, or sell a patented article or practice a patented method would be willing to pay as a royalty.

The royalty arrived at must be reasonable under all the circumstances; that is, it must be at least a close approximation of what would be "adequate to compensate" for the "use made of the invention by the infringer" as required by §284. *Fromson v. Western Litho Plate & Supp. Co.*, 853 F.2d 1568, 7 USPQ2d 1606 (Fed. Cir. 1988). It is a hypothetical royalty resulting from arm's-length negotiations between a licensor and a licensee.

A logical measure of a hypothetical reasonable royalty is an actual, established royalty paid by others. And even if there is no existing royalty rate, it is appropriate to consider royalties paid by others in the industry for use of a comparable patent. *American Original Corp. v. Jenkins Food Corp.*, 774 F.2d 459, 227 USPQ 299 (Fed. Cir. 1985). Here, Sorensen R&D has established a pre-litigation floor for a reasonable royalty rate by licensing the '460 patent for a standard royalty rate of $240,000 or 6% of the total gross sales of the Accused Products for a release of the Accused Products.

There is a narrow window of opportunity at this early stage wherein the parties can resolve this matter without incurring high costs and legal fees through amicable discussions leading to a license agreement. We look forward to receiving Sterling International's substantive response to our infringement assertions within thirty (30) days. Further, we are enclosing a binder illustrating a selection of products manufactured by Sorensen R&D's licensees.

Finally, Sorensen R&D is not subject to personal jurisdiction in any state except California pursuant to the holding in *Radio Systems Corporation v Accession, Inc*, Case No. 2010-1390 (C.A. Fed., Apr. 25, 2011). Further, under the published opinion in *Nordica USA Corp. v. Jens Ole Sorensen*, 475 F. Supp. 2d 128 (D.N.H. 2007) and the unpublished opinions in *Head USA, Inc. v. Jens Erik Sorensen*, United States District Court of Connecticut, Case No. 3:06-cv-00983 and *Big Lots Stores, Inc. v. Sorensen Research and Development Trust*, United States District Court of Ohio, Case No. 2:08-cv-00506 the courts found that Sorensen R&D is not subject to personal jurisdiction in New Hampshire, Connecticut, and Ohio. For the same reasons articulated in these opinions, Sterling International is on notice that there is no personal jurisdiction in any state in the United States of America except California.

Your anticipated courtesy in working with us toward a rapid and amicable resolution of this matter is greatly appreciated.

Sincerely,

Chris Kuczynski
Registered In-House Counsel

Encl: Drawing No. D-7279
Claim Chart for Drawing No. D-7279
U.S. Patent No. 6,599,460
Binder

U.S. PATENT NO. 6,599,460
Sterling International, Inc.
Claim Chart for Rescue W-H-Y Insect Trap
Sorensen R&D Drawing No. D-7279

CLAIM 1 -- '460 PATENT	REMARK	REM. NO.	REF. FIGURE
A method of injection-molding a product that includes at least one thin wall, comprising the steps of: (a) combining a plurality of mold parts to define a mold cavity for forming the product and at least one gate from which fluid plastic material may be injected into the mold cavity	*The Accused Product shows a product that includes at least one thin wall comprising the steps of (a) combining a plurality of mold parts to define a mold cavity for forming the product and at least one gate from which fluid plastic material may be injected into the mold cavity*	1	Figs. 1 and 2
wherein the mold cavity includes at least one thin-wall cavity section and	*At least one thin-wall cavity section is identified.*	2	Figs. 1 and 2
at least two opposed flow chambers that adjoin opposite edges of the thin-wall cavity section for directing injected fluid plastic material from exit positions of the said at least two opposed flow chambers into corresponding entrance positions of the at least one thin-wall cavity section	*At least two opposed flow chambers that adjoin opposite edges of the thin-wall cavity section for directing injected fluid plastic material from exit positions of the said at least two opposed flow chambers into corresponding entrance positions of the at least one thin-wall cavity section are identified.*	3	Figs. 1 and 2
to thereby form at least one thin-wall portion of the product,	*At least one thin-wall portion of the product is identified.*	4	Figs. 1, 2, and 3
wherein the at least one thin-wall cavity section includes at least one zone that is located between said at least two opposed flow chambers, and	*At least one thin-wall cavity section includes at least one zone that is located between at least two opposed flow chambers.*	5	Figs. 1, 2 and 3

CLAIM 1 -- '460 PATENT	REMARK	REM. NO.	REF. FIGURE
wherein within the at least one zone inscribed-sphere dimensions at each entrance position are smaller than inscribed-sphere dimensions at the corresponding exit position of the adjoining flow chamber; and	*Within the at least one zone inscribed-sphere dimensions at each entrance position are smaller than inscribed-sphere dimensions at the corresponding exit position of the adjoining flow chamber.*	6	Figs. 2 and 3
(b) injecting fluid plastic material from the gate into the mold cavity to form the product;	*Fluid plastic material is injected from the gate into the mold cavity to form the product.*	7	
wherein step (a) comprises combining mold parts that define a said mold cavity in which within said at least one zone of the at least one thin-wall cavity section the thickness of the at least one thin-wall cavity section increases in the general direction of flow within the flow chambers adjoining said zone,	*Step (a) comprises combining mold parts that define the mold cavity in which within the at least one zone of the at least one thin-wall cavity section the thickness of the at least one thin-wall cavity section increases in the general direction of flow within the flow chambers adjoining said zone.*	8	
with said increase being at less than a threshold rate to thereby prevent injected fluid plastic material so directed into the at least one zone from at any time surrounding any gaseous void within the at least one zone.	*It is substantially likely, within the meaning of Title 35 U.S.C. § 295, that the increase is at less than a threshold rate to thereby prevent injected fluid plastic material so directed into the at least one zone from at any time surrounding any gaseous void within the at least one zone.*	9	

SORENSEN RESEARCH & DEVELOPMENT
DRAWING NO. D-7279
RESCUE W-H-Y INSECT TRAP

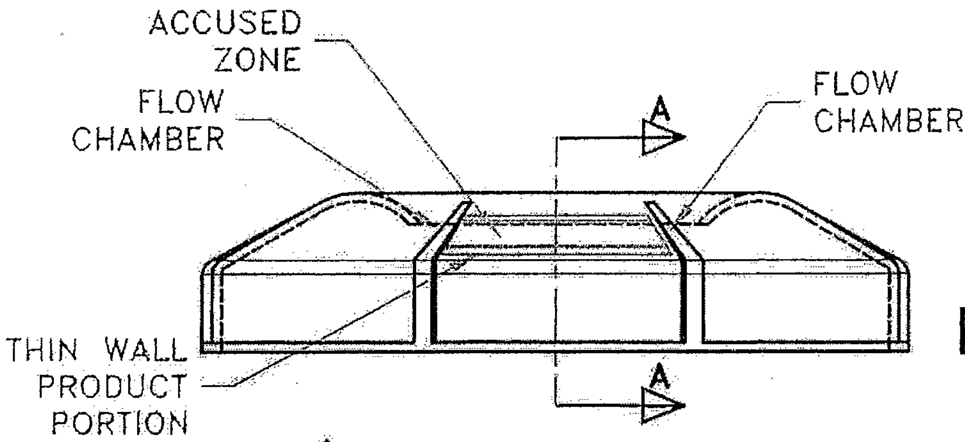
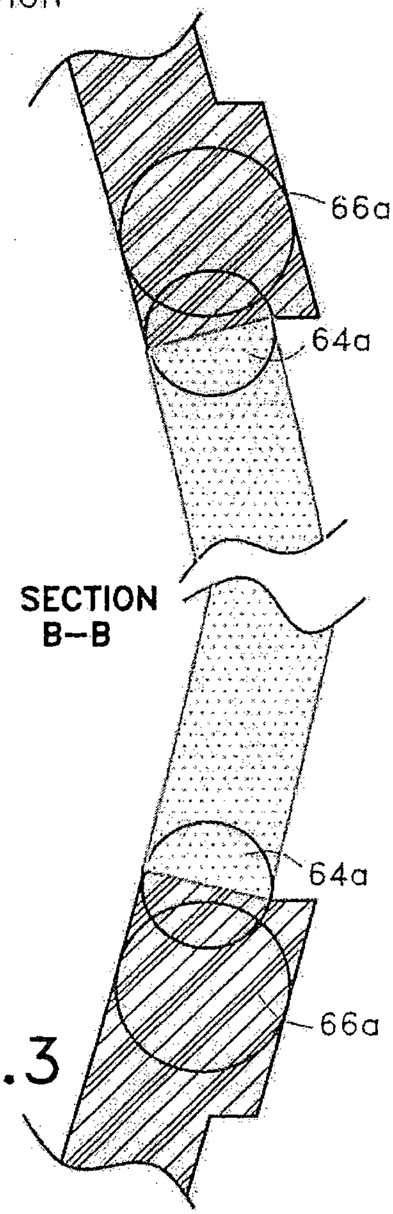


FIG.1



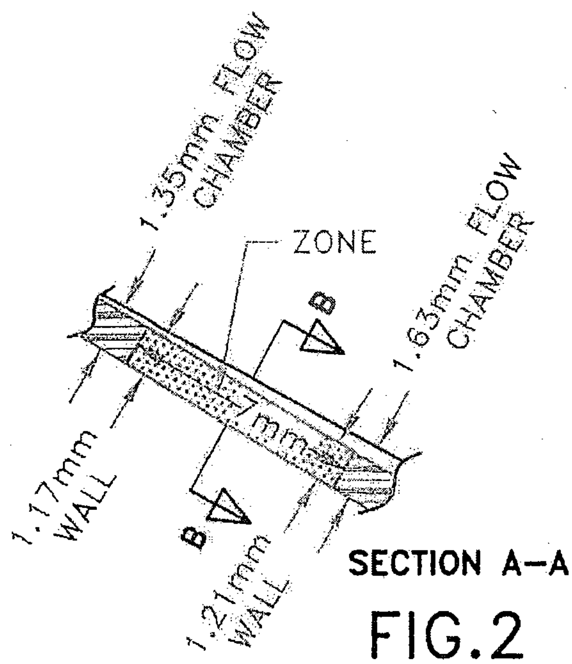


FIG.2

FIG.3

UNITED STATES DISTRICT COURT
CENTRAL DISTRICT OF CALIFORNIA

NOTICE OF ASSIGNMENT TO UNITED STATES MAGISTRATE JUDGE FOR DISCOVERY

This case has been assigned to District Judge Audrey B. Collins and the assigned discovery Magistrate Judge is Robert N. Block.

The case number on all documents filed with the Court should read as follows:

CV13- 938 ABC (RNBx)

Pursuant to General Order 05-07 of the United States District Court for the Central District of California, the Magistrate Judge has been designated to hear discovery related motions.

All discovery related motions should be noticed on the calendar of the Magistrate Judge

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NOTICE TO COUNSEL

A copy of this notice must be served with the summons and complaint on all defendants (if a removal action is filed, a copy of this notice must be served on all plaintiffs).

Subsequent documents must be filed at the following location:

[✓] **Western Division** **312 N. Spring St., Rm. G-8** **Los Angeles, CA 90012**	[ ] **Southern Division** **411 West Fourth St., Rm. 1-053** **Santa Ana, CA 92701-4516**	[ ] **Eastern Division** **3470 Twelfth St., Rm. 134** **Riverside, CA 92501**

Failure to file at the proper location will result in your documents being returned to you.

Name & Address:
Scott C. Moore (CA SBN 203181)
MORRISON & FOERSTER LLP
555 West Fifth St.
Los Angeles, CA 90013-1024

UNITED STATES DISTRICT COURT
CENTRAL DISTRICT OF CALIFORNIA

Sterling International, Inc., PLAINTIFF(S)	CASE NUMBER CV13-00938 ABC (RNBx)
v.	
Sorensen Research and Development Trust, DEFENDANT(S).	**SUMMONS**

TO: DEFENDANT(S):

A lawsuit has been filed against you.

Within 21 days after service of this summons on you (not counting the day you received it), you must serve on the plaintiff an answer to the attached ☑ complaint ☐ ____________ amended complaint ☐ counterclaim ☐ cross-claim or a motion under Rule 12 of the Federal Rules of Civil Procedure. The answer or motion must be served on the plaintiff's attorney, Scott C. Moore, whose address is Morrison & Foerster LLP, 555 West Fifth St., Los Angeles, CA 90013-1024. If you fail to do so, judgment by default will be entered against you for the relief demanded in the complaint. You also must file your answer or motion with the court.

Clerk, U.S. District Court

Dated: FEB - 8 2013

By: MARILYN DAVIS
Deputy Clerk

(Seal of the Court)

SEAL OF THE U.S. DISTRICT COURT CENTRAL DIST. OF CALIFORNIA 1227

[Use 60 days if the defendant is the United States or a United States agency, or is an officer or employee of the United States. Allowed 60 days by Rule 12(a)(3)].

UNITED STATES DISTRICT COURT, CENTRAL DISTRICT OF CALIFORNIA
CIVIL COVER SHEET

I (a) PLAINTIFFS (Check box if you are representing yourself ☐) Sterling International, Inc.	**DEFENDANTS** Sorensen Research and Development Trust
(b) Attorneys (Firm Name, Address and Telephone Number. If you are representing yourself, provide same.) Scott C. Moore, Morrison & Foerster LLP, 555 W.5th St., L.A., CA 90013, 213.892.5200; Brian F. McMahon, John D. Denkenberger, James W. Anable, Christensen O'Connor Johnson Kindness PLLC, 1420 5th Ave, Seattle, WA 9810, 206.682.8100	Attorneys (If Known)

COPY

II. BASIS OF JURISDICTION (Place an X in one box only.)

☐ 1 U.S. Government Plaintiff
☑ 3 Federal Question (U.S. Government Not a Party)
☐ 2 U.S. Government Defendant
☐ 4 Diversity (Indicate Citizenship of Parties in Item III)

III. CITIZENSHIP OF PRINCIPAL PARTIES - For Diversity Cases Only (Place an X in one box for plaintiff and one for defendant.)

	PTF	DEF		PTF	DEF
Citizen of This State	☐ 1	☐ 1	Incorporated or Principal Place of Business in this State	☐ 4	☐ 4
Citizen of Another State	☐ 2	☐ 2	Incorporated and Principal Place of Business in Another State	☐ 5	☐ 5
Citizen or Subject of a Foreign Country	☐ 3	☐ 3	Foreign Nation	☐ 6	☐ 6

IV. ORIGIN (Place an X in one box only.)

☑ 1 Original Proceeding ☐ 2 Removed from State Court ☐ 3 Remanded from Appellate Court ☐ 4 Reinstated or Reopened ☐ 5 Transferred from another district (specify): ☐ 6 Multi-District Litigation ☐ 7 Appeal to District Judge from Magistrate Judge

V. REQUESTED IN COMPLAINT: JURY DEMAND: ☐ Yes ☑ No (Check 'Yes' only if demanded in complaint.)

CLASS ACTION under F.R.C.P. 23: ☐ Yes ☐ No ☐ **MONEY DEMANDED IN COMPLAINT: $**________

VI. CAUSE OF ACTION (Cite the U.S. Civil Statute under which you are filing and write a brief statement of cause. Do not cite jurisdictional statutes unless diversity.)
35 U.S.C. §1 et seq., Invalidity and non-infringement of U.S Patent No. 6,599,460

VII. NATURE OF SUIT (Place an X in one box only.)

OTHER STATUTES
☐ 400 State Reapportionment
☐ 410 Antitrust
☐ 430 Banks and Banking
☐ 450 Commerce/ICC Rates/etc.
☐ 460 Deportation
☐ 470 Racketeer Influenced and Corrupt Organizations
☐ 480 Consumer Credit
☐ 490 Cable/Sat TV
☐ 810 Selective Service
☐ 850 Securities/Commodities/ Exchange
☐ 875 Customer Challenge 12 USC 3410
☐ 890 Other Statutory Actions
☐ 891 Agricultural Act
☐ 892 Economic Stabilization Act
☐ 893 Environmental Matters
☐ 894 Energy Allocation Act
☐ 895 Freedom of Info. Act
☐ 900 Appeal of Fee Determination Under Equal Access to Justice
☐ 950 Constitutionality of State Statutes

CONTRACT
☐ 110 Insurance
☐ 120 Marine
☐ 130 Miller Act
☐ 140 Negotiable Instrument
☐ 150 Recovery of Overpayment & Enforcement of Judgment
☐ 151 Medicare Act
☐ 152 Recovery of Defaulted Student Loan (Excl. Veterans)
☐ 153 Recovery of Overpayment of Veteran's Benefits
☐ 160 Stockholders' Suits
☐ 190 Other Contract
☐ 195 Contract Product Liability
☐ 196 Franchise

REAL PROPERTY
☐ 210 Land Condemnation
☐ 220 Foreclosure
☐ 230 Rent Lease & Ejectment
☐ 240 Torts to Land
☐ 245 Tort Product Liability
☐ 290 All Other Real Property

TORTS
PERSONAL INJURY
☐ 310 Airplane
☐ 315 Airplane Product Liability
☐ 320 Assault, Libel & Slander
☐ 330 Fed. Employers' Liability
☐ 340 Marine
☐ 345 Marine Product Liability
☐ 350 Motor Vehicle
☐ 355 Motor Vehicle Product Liability
☐ 360 Other Personal Injury
☐ 362 Personal Injury- Med Malpractice
☐ 365 Personal Injury- Product Liability
☐ 368 Asbestos Personal Injury Product Liability

IMMIGRATION
☐ 462 Naturalization Application
☐ 463 Habeas Corpus- Alien Detainee
☐ 465 Other Immigration Actions

TORTS
PERSONAL PROPERTY
☐ 370 Other Fraud
☐ 371 Truth in Lending
☐ 380 Other Personal Property Damage
☐ 385 Property Damage Product Liability

BANKRUPTCY
☐ 422 Appeal 28 USC 158
☐ 423 Withdrawal 28 USC 157

CIVIL RIGHTS
☐ 441 Voting
☐ 442 Employment
☐ 443 Housing/Accommodations
☐ 444 Welfare
☐ 445 American with Disabilities - Employment
☐ 446 American with Disabilities - Other
☐ 440 Other Civil Rights

PRISONER PETITIONS
☐ 510 Motions to Vacate Sentence Habeas Corpus
☐ 530 General
☐ 535 Death Penalty
☐ 540 Mandamus/ Other
☐ 550 Civil Rights
☐ 555 Prison Condition

FORFEITURE / PENALTY
☐ 610 Agriculture
☐ 620 Other Food & Drug
☐ 625 Drug Related Seizure of Property 21 USC 881
☐ 630 Liquor Laws
☐ 640 R.R. & Truck
☐ 650 Airline Regs
☐ 660 Occupational Safety /Health
☐ 690 Other

LABOR
☐ 710 Fair Labor Standards Act
☐ 720 Labor/Mgmt. Relations
☐ 730 Labor/Mgmt. Reporting & Disclosure Act
☐ 740 Railway Labor Act
☐ 790 Other Labor Litigation
☐ 791 Empl. Ret. Inc. Security Act

PROPERTY RIGHTS
☐ 820 Copyrights
☑ 830 Patent
☐ 840 Trademark

SOCIAL SECURITY
☐ 861 HIA (1395ff)
☐ 862 Black Lung (923)
☐ 863 DIWC/DIWW (405(g))
☐ 864 SSID Title XVI
☐ 865 RSI (405(g))

FEDERAL TAX SUITS
☐ 870 Taxes (U.S. Plaintiff or Defendant)
☐ 871 IRS-Third Party 26 USC 7609

FOR OFFICE USE ONLY: Case Number: CV13-00938

AFTER COMPLETING THE FRONT SIDE OF FORM CV-71, COMPLETE THE INFORMATION REQUESTED BELOW.

UNITED STATES DISTRICT COURT, CENTRAL DISTRICT OF CALIFORNIA
CIVIL COVER SHEET

VIII(a). IDENTICAL CASES: Has this action been previously filed in this court and dismissed, remanded or closed? ☑ No ☐ Yes
If yes, list case number(s):

VIII(b). RELATED CASES: Have any cases been previously filed in this court that are related to the present case? ☐ No ☑ Yes
If yes, list case number(s): 2:11-cv-03720-GW

Civil cases are deemed related if a previously filed case and the present case:
(Check all boxes that apply) ☐ A. Arise from the same or closely related transactions, happenings, or events; or
☑ B. Call for determination of the same or substantially related or similar questions of law and fact; or
☐ C. For other reasons would entail substantial duplication of labor if heard by different judges; or
☑ D. Involve the same patent, trademark or copyright, and one of the factors identified above in a, b or c also is present.

IX. VENUE: (When completing the following information, use an additional sheet if necessary.)

(a) List the County in this District; California County outside of this District; State if other than California; or Foreign Country, in which **EACH** named plaintiff resides.
☐ Check here if the government, its agencies or employees is a named plaintiff. If this box is checked, go to item (b).

County in this District:*	California County outside of this District; State, if other than California; or Foreign Country
	Sterling International, Inc., Washington State

(b) List the County in this District; California County outside of this District; State if other than California; or Foreign Country, in which **EACH** named defendant resides.
☐ Check here if the government, its agencies or employees is a named defendant. If this box is checked, go to item (c).

County in this District:*	California County outside of this District; State, if other than California; or Foreign Country
	Sorensen Research and Development Trust, San Diego County, California

(c) List the County in this District; California County outside of this District; State if other than California; or Foreign Country, in which **EACH** claim arose.
Note: In land condemnation cases, use the location of the tract of land involved.

County in this District:*	California County outside of this District; State, if other than California; or Foreign Country
	Washington State

*** Los Angeles, Orange, San Bernardino, Riverside, Ventura, Santa Barbara, or San Luis Obispo Counties**
Note: In land condemnation cases, use the location of the tract of land involved

X. SIGNATURE OF ATTORNEY (OR PRO PER): [signature] **Date** 2/7/2013

Notice to Counsel/Parties: The CV-71 (JS-44) Civil Cover Sheet and the information contained herein neither replace nor supplement the filing and service of pleadings or other papers as required by law. This form, approved by the Judicial Conference of the United States in September 1974, is required pursuant to Local Rule 3-1 is not filed but is used by the Clerk of the Court for the purpose of statistics, venue and initiating the civil docket sheet. (For more detailed instructions, see separate instructions sheet.)

Key to Statistical codes relating to Social Security Cases:

Nature of Suit Code	Abbreviation	Substantive Statement of Cause of Action
861	HIA	All claims for health insurance benefits (Medicare) under Title 18, Part A, of the Social Security Act, as amended. Also, include claims by hospitals, skilled nursing facilities, etc., for certification as providers of services under the program. (42 U.S.C. 1935FF(b))
862	BL	All claims for "Black Lung" benefits under Title 4, Part B, of the Federal Coal Mine Health and Safety Act of 1969. (30 U.S.C. 923)
863	DIWC	All claims filed by insured workers for disability insurance benefits under Title 2 of the Social Security Act, as amended; plus all claims filed for child's insurance benefits based on disability. (42 U.S.C. 405(g))
863	DIWW	All claims filed for widows or widowers insurance benefits based on disability under Title 2 of the Social Security Act, as amended. (42 U.S.C. 405(g))
864	SSID	All claims for supplemental security income payments based upon disability filed under Title 16 of the Social Security Act, as amended.
865	RSI	All claims for retirement (old age) and survivors benefits under Title 2 of the Social Security Act, as amended. (42 U.S.C. (g))