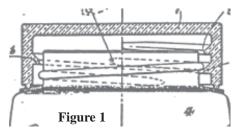
Cataloging a Russell Uhl-Patented, Glass Screw Cap

by Barry L. Bernas

Have you ever closely examined a SIMPLEX-embossed, glass screw cap? The specific one I'm talking about has been associated with the SIMPLEX MASON and ATLAS MASON'S PATENT, front-embossed jars. However, it could just as well have been used on any container with a regular-size mouth and an embossed, threaded finish.

If you have, you already know that each closure of this type is different in some way from any other one. Besides two, different, raised-lettering styles, these sealers have dissimilar, inner-surface characteristics. Likewise, every glass cap possesses a unique shape and comes in varying heights. Looking more intently at these closures, you will encounter additional, minor aspects which further discriminate one sealer from another.

In case you aren't familiar with this sealer, the drawing in Figure 1 is an example of it. This sketch was used by Russell Uhl when he filed an application to patent this design on May 20th, 1905. A little less than seven months after submission, his request was granted by the United States Patent Office on December 5th of the same year. Strangely, Mr. Uhl assigned the rights for his concept to the Perfection Glass Company; a firm he wasn't visibly affiliated with in any manner.



Whether you are already know about this closure or are finding out about it for the first time here, there is no screw-cap, reference guide where more data can be found about the various types of Uhlpatented sealers that have been reported. However, once you have read this article, you will have all of the necessary data to catalog your own examples and recognize an already reported one from a new find.

Merchant and Entrepreneur but not Inventor

Russell Uhl was an unlikely candidate to come up with the Figure 1 innovation. Between 1898 and 1905, he was a merchant, living in Wilkes-Barre, Pennsylvania. During this snap-shot look at his life, Mr. Uhl was the proprietor of several firms, including the Western Butter Market, Royal Tea Company, Royal Manufacturing Company, and Royal Soap Company. Also, he co-invested in the Perfection Water Bottle Company, Perfection Bottle Company, Perfection Manufacturing Company and managed the Penn Tobacco Company. Around the same period, land transfer from Luzerne records County, Pennsylvania indicated he was active in the acquisition of property within that municipal boundary.² Throughout this span of time, there was nothing uncovered to suggest Mr. Uhl was anything but a merchant and entrepreneur. I believe the idea for his 1905 patent came from another source. His inspiration probably resulted from the settlement of a failed partnership he had with William Beach Fenn.

From early 1900 to late 1903, Russell Uhl was involved in a business venture with Mr. Fenn. Both men along with others initially formed the Perfection Water Bottle Company in New York City at the turn of the twentieth century. Over the next three years, this firm went thorough several name changes and relocated at least two times. It appeared Mr. Uhl was a major investor in each of these enterprises because he was carried as the Perfection Company's president, regardless of the concern's title or where it was located.³

By all measures of effectiveness, the relationship between William B. Fenn and Russell Uhl was amicable and productive. Mr. Fenn was involved with successfully running the various Perfection operations while Mr. Uhl remained in Wilkes-Barre, minding his concerns in that City.⁴ However, in late 1903, a rift in their association developed.

The problem started when Mr. Fenn bought out Russell Uhl's share in the Perfection Manufacturing Company. This resulted in an overall obligation of \$17,500 to Mr. Uhl. On top of this debt, William B. Fenn owed money to other suppliers of goods and services to the Perfection Glass Company and its predecessor firms. Whether Russell Uhl knew about the unpaid debts from the two concerns he formerly headed as president was unclear.

Regardless of his foreknowledge, he soon found out about them when representatives from several enterprises filed separate actions against him and his old partner in the County Court of Washington, Pennsylvania. The different suits alleged that Russell Uhl and William B. Fenn of the Perfection Bottle and Perfection Manufacturing Companies failed to pay obligations incurred in the name of their Companies. To make matters worse, Mr. Fenn soon vanished. This left Mr. Uhl to face the County Court charges alone and empty-handed with respect to the \$17,500 owed to him by William B. Fenn.⁵

Russell Uhl's solution to this dilemma was swift. In a decisive move, he joined with several other Pittsburgh plaintiffs who had tendered individual suits against him and Mr. Fenn. Together, they filed a petition of involuntary bankruptcy in the United States District Court in Pittsburgh, Pennsylvania against William B. Fenn in late December 1903. This action caused the Western District Court of the Commonwealth to appoint a receiver who seized all of Mr. Fenn's estate assets in order to pay off his and Mr. Uhl's creditors.⁶

Early in 1904, Washington County Court records showed that petitions filed by many of the individuals and companies that were owed money by Messrs. Uhl and Fenn withdrew their submissions.7 In all probability, since these creditors had the opportunity to be listed in the statement of debts for Mr. Fenn in the bankruptcy proceedings being held against him in United States District Court, they chose this avenue rather than pursue their claim in the lower, Washington County Court. The outcome of the Western District Court's case placed the burden of repayment on the estate of William B. Fenn and probably set the stage for Russell Uhl's patent request in 1905.

The absent Mr. Fenn was a prolific inventor. From 1900 until 1905, records in the United States Patent and Trademark Office showed a minimum of eighteen patents were issued to him. Six of these were for jar closures or similar devices. During the same period, none were ever granted to Russell Uhl.⁸ So where did he get the notion to apply for a separate patent on an all-glass, screw cap?

Although lacking direct evidence, I think it came about because Mr. Uhl didn't get sufficient restitution from the petition he partially initiated in bankruptcy court. From his \$17,500 claim at the time, Russell Uhl got back only \$1207.50 or 0.069 percent of his total input. Out of the same ruling, other claimants faired much better. For Republic example, the Glass Manufacturing Company (read John P. Elkin) got the letters patent for an improved jar closure (759,168) while Paul Synnestvedt, an attorney that processed and managed many of Mr. Fenn's patent applications, purchased the rights to six of Mr. Fenn's patents for \$30. Included in these was one for an improved jar closure (769,600). Figure 2 has the two examples of the above patents sitting sideby-side in chronological order.9

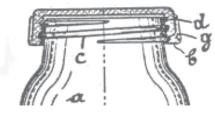
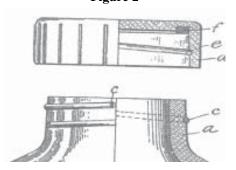


Figure 2



The left-side model was already being used on a widely distributed and fancily designed, Flaccus Brothers product jar (FLACCUS BROS. STEERS HEAD FRUIT JAR). In addition, it sealed the new "SIMPLEX packing jar" made for the Perfection Manufacturing and then Perfection Glass Company. To say the least, it was a product with money making potential for the patent owner. The right-

hand specimen was an advance, although clumsily in my opinion, to this popular, side-sealing closure. For me, it represented a step toward making an all-glass closure for a Mason-style container with a standard-diameter mouth and threaded finish.

I opine the right-hand model in Figure 2 was used as the basis for Russell Uhl's later submission. When produced, it represented a chance to recoup some of his lost investment.10 This partfactual and part-speculative scenario is one way to explain why Russell Uhl, a man with no known inventive proclivities, suddenly requested a patent to seal fruit or packers jars. Maybe some day, someone will come across new ephemera that will provide the piece of data, unlocking the door on this conundrum once and for all. However, for now all we're left with is my supposition or your insight.

Standard Terminology

Well, enough with the quasi-historical musings, let's get on with the methodology for identifying and cataloging these sealers. The first item to talk about is a set of descriptive terms to standardize the way each Uhl-patented closure is described. Basically, this section divides the screw cap into four, distinct areas. Let me describe each one, using the Figure 3 sketch.

Figure 3

a
d
b
b

Outer, Top Surface or "a"

The first part of the Uhl-patented, screw cap is the outer, top surface. Considered to be the top of the sealer, this region has several traits which assist in determining one cap from another.

Skirt - Outer and Inner or "b"

This is my term for the circular sidewall of the closure. On the outer skirt, vertical ribs are molded onto it. There may or may not be a bottom band in addition to the grippers on the sealer. The inner skirt has the cover's thread cut onto the interior side-wall. This aligns with its counterpart on the container's finish to tighten the screw cap.

Bottom Edge of the Skirt or "c"

The area between the bottom of the outer and inner skirt is labeled the bottom edge of the skirt. It encompasses the

circular width of the skirt and has varying features on it. The most prominent one is a protruding, annular ring which creates the air-tight seal between this portion of the closure and the rubber, jar ring sitting on the container's shoulder.

Inner Surface or "d"

The inner surface of an Uhl-inspired closure is the final region to scrutinize. By turning the screw cap upside down this area is exposed to view. The inner surface is the circular area lying between the inner skirt of the sealer.

Five, Distinct Groups of Uhl caps

The next step in the process is to identify the Group in which an Uhldesigned sealer belongs. The features molded onto the screw cap on the inner surface determine the Group. Up to this point, I have discovered five, dissimilar characteristics. By no means allinclusive, my findings are only a starting point for identifying other groups that haven't been reported.

At this point, it should be noted that the order of the Groups I'm about to present shouldn't be construed with the time period each one was manufactured. For instance, Group I might not be the earliest design produced. Similarly, Group V models weren't necessarily the last style turned out. The progression of examples from oldest to newest for the Uhl-patented screw cap is a topic for another article.

The picture in Figure 4 shows the inner surface of a screw cap assigned to Group I. The embossing, (dot) SIMPLEX GLASS CAP (dot) FOR MASON JARS (in a circle) with PATD (smaller D) DEC (dot) 5 (dot) 05 (dot) (in the center on two lines), is cut backwards on the inner surface of this sealer. The molded lettering on the inner surface can be read through the outer top section of the cap. It is this feature, embossing on the inner surface, that makes this specimen a Group I member.

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Figure 4

The next example or Group II model can be seen in Figure 5. The left-hand version has a raised, circular plane in the center of the closure's inner surface. Pictured beside it is a mate. This one has a depressed, circular surface in the same location.



Figure 5



A Group III cap is pictured below in Figure 6. It has a raised, hollowed-out ring with a raised dot inside the hollowed-out segment in the center of the sealer's inner surface.



Figure 6

The Group IV example follows in Figure 7. It has a raised dot in the middle of the screw cap's inner surface. The contour of the raised dot may differ. Some Group IV closures have a conical or pointed dot. Others carry a rounded, raised dot.



Figure 7

The final version carries a Group V designation. The inner surface on the Figure 8 variant has a flat or irregular feel to it. There is no embossed wording or molded traits on this inner surface. The lettering appears to be like that in Figure 4; however, it is on the outer, top surface vice on the inner surface.



Figure 8

With regard to referencing each of the five Groups, a roman numeral is the recommended means to designate one Group from another. For example, the Figure 4 model would be "Group I" followed in sequence through Figure 8 which carries the "Group V" label.

Four Separate Screw Cap Shapes

Once the Group is determined, the shape of the Uhl-patented, glass closure is the next aspect to substantiate. So far, I've been able to identify four contours for this screw cap. Separate names have been assigned to each one for reference ease.

Again, I need to point out that the order in which I've chosen to list the contours of these sealers doesn't imply these were made one after the other in a timeline-like manner. As such, the Figure 9 specimen shouldn't be thought of as the first, Uhl design to be made. Likewise, the Figure 12 example may or may not have been the final version to be pressed. As with the inner-surface attributes of the screw cap that determine its placement within a distinct Group, the alignment of closure shapes in a progression from first-made to last produced will be left to a separate discussion.

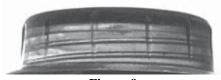


Figure 9

The Figure 9 side view of an Uhlpatented cover has a simple design to it. In my opinion, the outward appearance of it resembles the same motif seen on a smaller screw cap that fits on the groundlip version of the FLACCUS BROS. STEERS (steer head in a circle) HEAD FRUIT JAR labeled container. It is the one with the embossed wording, TO REMOVE CAP PRESS DOWN & UNSCREW, on the inner surface of the sealer. Due primarily to this similarity, the Figure 9 model was named Flaccuslike.



Figure 10

The next variant has a stunning profile quite different from the simplistic model shown in Figure 9. Displayed in Figure 10, the vertical ribs on the outer skirt ascend from a small band at the bottom of the closure to a point above the outer, top surface of the screw cap. The semicircular protrusions give this area of the cover a jewel-like aspect. Thus, I've given the Figure 10 design the moniker, jeweled crown.



Figure 11

The third version is portrayed as Figure 11. As you can easily see, the vertical ribs on this type rise out of a somewhat taller band at the bottom of this sealer. However, the grippers don't ascend up and over the outer skirt. Instead, these stop short of the outer, top surface of the screw cap. The region above the top of the ribs appears to me to be a dome. Because of this feature, I've called the Figure 11 example a domed crown.

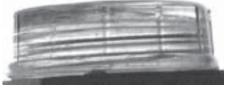


Figure 12

The last shape appears in Figure 12. The much taller band at the base of the outer skirt on this specimen of an Uhlpatented closure is the most prominent trait on this cover. From it, thinner, vertical ribs rise along the outer skirt to just below the cap's outer, top surface. For me, the symmetrical design of this sealer

looked remarkably like a man's chapeaux. As a result, its shape is labeled a hat.

In order to simplify any reference listing for the four shapes reported for the Russell Uhl-patented screw cap, a numeral can be assigned to each motif. For example, the "Flaccus-like" variant would be referred to with the number "1." The "Jeweled Crown" model carries the digit "2." The others would follow in sequence with the "Hat" item having the numeral "4."

Three Closure Heights

The Uhl-conceived sealer comes in at least three heights. The elevation of the screw cap is measured from the bottom edge of the skirt to the closure's outer, top surface. Any protrusion above the sealer's outer, top surface by a vertical rib isn't considered in determining the height of the cover.

The first example is a tall closure. It is one inch or more tall. The second variant or standard example measures between three-fourths of an inch but less than one inch. The small version has a height of less than three-fourths of an inch.

These distances can be easily referenced by the use of numerals to distinguish one height from another. Under this category, the number "1" would represent a tall specimen of Uhlpatented, screw cap. The digit "2" is for the sealer with a standard height and so forth.

Two Styles of Lettering

On all variants, an embossed phrase, several words and/or a patent date appear on the outer top or inner surfaces of Uhlinspired closures. This attribute permits each screw cap to be further categorized.

The two styles of lettering are as listed in the following lines. Along with each one is a number for identifying the individual trait. A small letter indicates the presence of a variation in the way the phrasing or wording was cut into the mold.

- 1. The following wording and phrasing is molded onto the closure SIMPLEX MASON PATENT APPL'D FOR.
- a. Variation one (dot) SIMPLEX (dot) MASON (dot) PATENT (dot) APPL'D (dot) FOR (Dots are in front of SIMPLEX and between all other words.)
- b. Variation two (dot) SIMPLEX (dot) MASON (dot) PATENT

(dot) APPL'D FOR - (No dot is between APPL'D and FOR.)

- c. Variation three (dot) SIMPLEX MASON (dot) PATENT (dot) APPL'D (dot) FOR - (There is no dot between SIMPLEX and MASON.)
- d. Variation four (dot) SIMPLEX MASON (dot) PATENT APPL'D FOR (There are only two dots. One is between the words SIMPLEX and FOR. The other is between the words MASON and PATENT.)
- 2. The following wording is molded onto the closure SIMPLEX GLASS CAP FOR MASON JARS (around the outer edge of the sealer) PATD (elevated, smaller, capital D) DEC 5 05 (in center of sealer on two lines).
- a. Variation one (dot) SIMPLEX GLASS CAP (dot) FOR MASON JARS PATD DEC (dot) 5 (dot) 05 (dot). There are five dots in this phrase variant. One is before the word SIMPLEX. The other is between the words CAP and FOR. The final three are in the date after the abbreviation for December, after the number "5", and then at the end of the two digits "05".
- b. Variation two SIMPLEX GLASS CAP FOR MASON JARS (dot) PATD DEC (dot) 5 (dot) 05 (dot) The only dot in the first phrase is after the word JARS. The dots in the date are positioned as in variation one.
- c. Variation three SIMPLEX GLASS CAP FOR MASON JARS PATD DEC (dot) 5 (dot) 05 (dot) There are no dots in the first phrase. The only dots on this version are in the date. These are positioned in the same positions as in variation one.

To reference any of the wording or phrasing styles seen on the Uhl-patented cover, the number and letter combination would suffice. In this case, the combination of "2.b." would signify a screw cap with the following on it – "SIMPLEX GLASS CAP FOR MASON JARS (dot) PATD DEC (dot) 5 (dot) 05 (dot)."

Others Characteristics

There are some other characteristics that appear on the Uhl-conceived sealer. These serve to further segregate one screw cap from another within a Group.

The first is the size of the capital letters in the wording or phrasing that is cut onto the closure. Two types have been identified. The large one has alphabetical characters that are 5/16 of an inch high or higher. For the smaller type, the same letters are 1/4th of an inch or less tall.

The next feature is the shape of the middle component in the capital letter "M" in the word "SIMPLEX" on the screw cap. Three styles have been uncovered. The initial one has a "Y" in the center. A "V" comprises the second example. This would be exactly like the large "V" that serves as the character between the two straight lines in the letter "M" in the word "SIMPLEX." The final version has a small "v" as the central aspect in the large letter "M."

The style and shape of the vertical ribs or grippers on the outer skirt of this type of fruit-jar cover is the third attribute. Two basic styles have been revealed. One has a partial gripper on it. For this variant, the gripper is segmented. The separate piece can be at the top, bottom or top and bottom with a smooth space between it. The second features a complete vertical rib. Regardless of the version, each vertical rib has a distinct shape. Four shapes have been discerned. The first has a thin, fountain pen profile.11 The next looks like a spike.¹² For the third variant, a cannon barrel appearance is suggested.¹³ The last motif has been labeled log-like.14

On the bottom edge of the screw cap's skirt is the fourth characteristic. This region can be rounded or flat. The first model normally has a raised ring on the bottom edge of the skirt. For the flat specimens, a polished or ground surface has been recorded.

The final trait totals the number of vertical ribs on the closure's outer skirt.

Any or all of these attributes from the Uhl-patented sealer can be identified and recorded in the remarks section of the reference guide under the Group of closure being listed.

Reference Guide Listing

Up to this point, I've discussed the various components of an Uhl-designed screw cap. Now I'd like to put them all together into a sample listing.

How would a depressed, circle on the inner surface; jeweled-crown; standard-height closure embossed with "(dot) SIMPLEX (dot) MASON (dot) PATENT (dot) APPL'D FOR" be cataloged? What if the same model had small size letters; a capital letter "V" as the middle component of the "M" in the word SIMPLEX; a spike style of complete,

vertical gripper; a rounded, bottom edge and fourteen ribs around the cap's outer skirt?

By using the information from this article, the above example would be shown in a reference guide for Russell Uhl-patented covers as follows – II.2.2.1.b. Remarks: Depressed, circular surface; Small-size, capital letters; capital V; spike-style, complete ribs; rounded, bottom edge; fourteen grippers.

Catalog of Reported Uhl-Patented Closures

By using the methodology from the prior sections, I want to list all of the Uhlinspired closures that are known to me. This input will provide a starting point for others to add to the catalog. A remarks column to list the "other characteristics" about each sealer isn't being shown in this assembly of closures.

Group I - I.4.1.2.a.

Group II - II.2.1.1.b and II.4.1.2.b.

Group III - III.2.2.1.a.

Group IV - IV.1.1.2.b, IV.1.1.2.c, IV.2.1.1.b, IV.2.1.2.a, IV.2.1.2.b, IV.3.1.1.d, IV.4.1.1.a, IV.4.1.2.b, IV.4.1.2.c, and IV.4.2.2.c.

Group V - V.2.1.1.a, V.2.1.1.b and V.2.1.2.b.

Postscript

My simple but explicit methodology fills a void. Previously, this type of closure was described only by the embossed wording on it. While collectors knew variations abounded, there was no means available to describe the sundry examples or list them in a future reference guide for screw caps. Now one way to accomplish this objective has been presented. Your comments would be appreciated. BLB

(Endnotes)

¹ Fruit Jar Patents Volume III 1900-1942, compiled by Dick Roller, Phoenix Press, Chicago, Illinois, 1996, pg. 192. For more information about Russell Uhl's invention, see Bottles and Extras, More Information on SIMPLEX Glass Screw Caps, by Barry L. Bernas, June 2000, pgs 3-4.

2 Wilkes-Barre City Business Directory 1898, pg. 410; Ibid, 1899, pg. 342; Ibid, 1900, pg. 263; Ibid, 1901, pgs. 201 and 262; Ibid, 1902, pg. 288; Ibid, 1903, pgs. 397 and 439; Ibid, 1904, pgs. 323 and 370; Ibid, 1905/06, pgs. 513, 565 and 659; R. L. Polk & Co.'s Washington Directory, 1903-04, R. L. Polk Publishers, Pittsburg, Pa., pgs. 274 and 333; Commoner and Glassworker, February 14, 1903, pg. 2; and Luzerne County Deed Book, Volume 397, pgs. 216-218. In my article, More on Perfection, that appeared in the December 2000 edition of Bottles and Extras, I hadn't found any reference to the Perfection Bottle Company in Wilkes-Barre, Pennsylvania when

that submission was drafted. Subsequently in later research, I located a reference to it in the 1901 *Wilkes-Barre City Directory*.

3 Directory of the Boroughs of Manhattan and Bronx City of New York, Trow Directory, Printing and Bookbinding Company, 21 University Place, Manhattan, New York, New York, 1900 (for the year ending July 1, 1901), pgs 1050 and 1374; Ibid, 1901 (for the year ending July 1, 1902), pgs. 1050 and 1374; Ibid, 1902 (for the year ending July 1, 1903); Wilkes-Barre City Directory, 1901, pg. 201; Ibid, 1902; R. L. Polk & Co.'s Washington Directory, 1903-04, R. L. Polk Publishers, Pittsburg, Pa., pgs. 274 and 333; Crockery and Glass Journal, February 8, 1900, pg. 23; Ibid, May 10, 1900, pg. 19; Ibid, May 31, 1900; Ibid, February 7, 1901, pgs 7 and 28; Commoner and Glassworker, February 14, 1903, pg. 2; and Pressed Glass in America Encyclopedia of the First Hundred Years 1825-1925, John and Elizabeth Welker, Antique Acres Press, Ivyland, Pennsylvania, 1985, pg. 82.

⁴ The *City Directories* for Wilkes-Barre (1898-1905/06) and Washington (1903-04), Pennsylvania carried Mr. Uhl as a resident of Wilkes-Barre. Conversely, Mr. Fenn was listed with the glass concern whether in New York City or the Borough of Washington.

⁵ Washington County Court records, Wheeling Stamping Company vs. Russell Uhl and W. B. Fenn, October 16, 1903, pgs. 169 and 623; Ibid, Pittsburg Clay Pot Company vs. W. B. Fenn, December 2, 1903, pgs. 50 and 138; Ibid, Edward P. Remington vs. W. B. Fenn, December 4, 1903, pg. 54; *China, Glass and Lamps*, November 14, 1903, pg. 12; and *National Glass Budget*, December 26, 1903. It should be noted that the above list is only a partial one. There were other men and firms seeking restitution that included Perfection Glass employees for back wages that I didn't mention.

⁶ National Glass Budget, December 26, 1903 and District Court of the United States for the Western District of Pennsylvania, Docket 2339, National Archives and Records Administration, Mid Atlantic Region in Philadelphia, Pennsylvania.

Washington County Court records, Wheeling Stamping Company vs. Russell Uhl and W. B. Fenn, January 21, 1904, pg. 568; Ibid, Edward P. Remington vs. W. B. Fenn, March 10, 1904, pg. 54 and Ibid, Pittsburg Clay Pot Company vs. W. B. Fenn, March 19, 1904, pgs. 50 and 138.

⁸ United States Patent and Trademark Office, Patent Gazette Volumes for 1900 (Design patent numbers D32,426, D32,427, D32,428 along with patent 664,472 were issued to William B. Fenn.); Ibid, 1901 (No patents were issued to William B. Fenn.); Ibid, 1902 (Patent numbers 706,812 and 706,813 were issued to William B. Fenn.); Ibid, 1903 (No patents were issued to William B. Fenn.); Ibid, 1904 (Patent numbers 755,223; 758,515; 759,168; 765,570; 767,807; 768,439; 768,440; 769,600 and D36,876 were issued to Mr. Fenn); and Ibid, 1905 (Patent numbers 802,381; 802,382; and 802,383 were issued to William B. Fenn).

United States Patent Office, SPECIFICATION forming part of Letters Patent No. 759,168, dated May 3, 1904. Application filed June 10, 1903. Serial No. 160,830. Mr. Fenn applied for this patent to seal a neck differentially threaded, glass jar with a differentially threaded, glass screw cap. His concept entailed a closure with threads on the inner skirt and a circular, rubber band that screwed onto the container's outer threads. A side-seal was created between the outer jar and inner skirt of the sealer when the glass screw cap was tighten down on the rubber band. United States Patent Office, SPECIFICATION forming part of Letters Patent No. 769,600, dated September 6, 1904. Application filed September 16, 1903. Serial No. 173,420. This design by William B. Fenn sealed on the jar's mouth. A coiled wire held the screw cap in place. The wire was screwed onto the jar by means of a debossed channel that was formed in the finish area of the container. The same type of groove was made on the inner skirt of the cover. This permitted the screw cap to be tightened on the container via the coiled wire. As far as I know, this

model wasn't transitioned into production at Perfection Glass or elsewhere. District Court of the United States for the Western District of Pennsylvania, Docket 2339, National Archives and Records Administration, Mid Atlantic Region in Philadelphia, Pennsylvania

¹⁰ The facts surrounding both questions about Russell Uhl's patent submission and assignment of rights to the Perfection Glass Company are few. As stated, Mr. Uhl lost a sizeable portion of his original investment (\$16,292.50) when the final payments from the William Beach Fenn estate were issued. After the ruling, I can't believe he didn't immediately start to explore options to recoup a portion or all of the funds he had lost. With the estate being liquidated, the patents either issued to William B. Fenn or the applications for those from him that were pending presented the best advantage to accomplish his goal. More specifically, the two, glass closures in Figure 2 offered a means to this end. The 759,168 patent was popular and by all accounts, making money for the parties involved. The patent rights belonged to the Republic Glass Manufacturing Company (read John P. Elkin) with the molds being in the possession of the new owners of the reorganized Perfection Glass Company (The Washington Observer, December 3, 1903, pg. 1). Some arrangement between these two corporations permitted workers at the Perfection Glass plant to make and sell this product. Tapping into this existing process probably wasn't feasible for Mr. Uhl. Another way to proceed must be found. I believe he saw patent 769,600 as his next best course. The rights to it and others had been purchased by attorney, Paul Synnestvedt prior to the Court ordered repayment scheme being consummated. What he would do with them was anyone's guess. I opine Russell Uhl swung a deal with Mr. Synnestvedt to improve on the design of the closure for patent 769,600. Once agreed to, Mr. Uhl most likely approached the leaders of Perfection Glass with a proposal that went something like the following. In exchange for mold-maker assistance in retooling the inner skirt of the screwcap from the 769,600 design to a threaded surface and a monetary stipend. Russell Uhl would agree to seek a patent on the new, closure motif and grant the sole rights to make and sell it to the Perfection Corporation. If this happened as I have averred, Russell Uhl would stand to benefit and perhaps, attain part of his overall goal. Of course, other than the facts I've already presented, the above account is only my theory about what actually happened. Without more details, further clarity can't be provided.

This vertical rib is rounded at the top. The sides slope gently inward toward the base of the gripper where the stylus would be on an actual fountain pen if the cover was removed. Besides the profile of a fountain pen, this style of rib has a thin aspect to it. It is considerably narrower than the other three versions. ¹² The second, gripper shape is distinctive. From the front, the vertical rib has a rounded top. It is wider at the summit than it is at the base. A normal width at this point is $3/16^{th}$ of an inch. The sides of the gripper angle inward towards the bottom of the rib. At the base, a standard rib of this kind is 1/8th of an inch wide. By turning the screw cap for a side look at the same vertical rib, the topmost portion of the gripper angles backward onto the outer, top surface of the sealer. This view gives the rib the same appearance

¹³ The third, rib motif has a triangular, topmost segment. The sides of this example angle inward at a slightly less rate than those on the second model. Both of these features give the whole gripper the appearance of a downwardly pointing cannon barrel.

14 The fourth vertical rib has rounded top and straight sides with a standard width throughout.