

SALTY COMMENTS - #10  
(Facts and opinion about open salt collecting)

The history of the glass industry in America is an interesting one, and the open salts which we collect reflect what has happened. Glass has always been a good material for serving salt, so with every change in making glass dishes there is a salt which demonstrates it.

The first American glass factory known to make open salts was started by Henry William "Baron" Stiegel in Manheim, Pennsylvania in 1765. In those days glass was made using lead and potash, yielding what we call flint glass today. It was made in a furnace fired with 1" thick slabs of split wood, dry enough so that they could be lit with a candle. This gave a fire barely hot enough to melt the glass, but this did not matter since it was all hand blown. Whenever the glob of glass on the blowers "pipe" cooled too much, it was held over the fire to get it pliable again. The early factories made mostly bottles and window glass; only a few sold any open salts. The ones they did make were usually the pedestal type, such as Smith 387-6-3 (none in H&J). They were made both clear and in color, although the latter are quite rare. Salts of this era were either free-formed or had a pattern impressed before the final shape of the dish was made. This is called "pattern molding" in most books. If you examine one of the Stiegel-type salts you can see how the pattern was stretched out as the bowl was formed, and can feel the pattern on the inside as well as on the outside. The salt also has a beautiful "ring" when it is tapped lightly, a key characteristic of lead (flint) glass.

The next step forward in glass manufacturing was the mold blown or "blown three mold" process which was used about 1810-1830. The latter name is misleading. The dish is formed, complete with shape and pattern, by blowing the glass into a full-size mold. Salts like this are shown in Smith 332-3-2, 334-3-2 and several on plate 339. H&J shows several, including 3653 and 3680. The "three mold" name came from the fact that many (but not all) of the early molds like this had 3 pieces to them. We have had people tell us that a dish made in a 3-part mold is of this type, even though it was obviously pressed - watch out for this. Since the dish is blown, it will have some unevenness on the inside, in contrast to the straight surfaces left by the plunger in a glass press. Another characteristic is that the rim on these dishes had to be worked in some fashion after blowing, because the bubble left a jagged edge on top when the blower finished his job. Sometimes the rim is cut or ground; other times the dish is attached to a pontil rod while the rim is shaped, and there will be a pontil mark on the bottom.

The first major change to make glass tableware more available came in the 1820's. The hand-operated glass press was developed, and made "mass" production of dishes practical. Before this, skilled glass blowers were in very short supply. It was not unusual for someone to recruit men from Europe to start a new glass factory. The press allowed the use of relatively unskilled labor, and increased productivity substantially. The quality of the glass was relatively poor at first; we have seen a salt where wood ashes from the fire were pressed into the corners of the bowl - a positive sign of the age of the piece. To hide the defects, the dishes often had elaborate patterns, and stippling where the surface was relatively flat. This "lacy" design hid the flaws in the glass, so there were fewer rejects during manufacture. Examples of lacy salts can be seen in plates 326-331 in Smith, and #3460-3509 in H&J.

In the 1830's, the problem of fuel supply began to hit the industry. Successful glass houses had to haul wood further and further to keep their furnaces operating. Coal had started to be used, and it gave a competitive advantage because it cost much less. It also burned hotter, giving glass which had fewer bubbles and which handled easier in the press. In 1836, the Boston and Sandwich Glass Co. switched to coal which they were able to obtain at a reasonable cost by using ships for transportation. Glass houses away from the water had no way of getting coal other than by wagons; this put them at a competitive disadvantage, and many had to close. Conversely, new glass companies were started along rivers where there was coal, such as in Pittsburgh and West Virginia.

The 1840's marks the decline of lacy patterns and a major shift from blown to pressed glass. Tableware was still a minor part of glass production - the country used many more bottles and window panes than they did salts. It is hard to pin down the early non-lacy styles made then - the books give differing dates for many - but we believe that Smith 398-1-2 and 398-2-1, H&J 3594 and 3586 fall in this time period.

Until about 1850, pressed glass had limited popularity. About this time the consumer's tastes changed, and the boom in pressed tableware started. The years 1850-1891 are known as the "pressed tableware period", which marks the time when glassware replaced china on a large percentage of the tables in the U.S. Glass companies prospered, and at the height of the boom the glassware was sold to wholesalers by the carload, and they in turn resold it by the barrel. To keep up with competition, most tableware firms had to issue at least one new pattern every spring and fall. It was not unusual for a single pattern to be issued in 60 different pieces, which meant a large expense in making molds. As a result of all the activity, pattern glass collecting today has an enormous number of different styles to choose from. The Bennington Museum, for example, has a collection of 1400 different goblets on display, dating from this period. The book "Pressed Glass in America" lists over 3000 patterns, most of them from this time. If you want to collect only pattern glass salts, you will be able to hunt for a long time before you run out of new patterns to look for. There are more different designs of salts to be collected from this period than any other, although those from the 20th century are more available because they have had less time to get lost or broken.

The 1860's had two major developments which contributed to the pressed glass period. Natural gas was discovered, and gradually became the fuel of choice wherever glass was made. It was plentiful and cheap, and gave the user a higher quality for a lower price. For many years the industry followed the natural gas supply. In the '80's when gas fields were discovered in Ohio and in Indiana, towns near the gas wells offered free land and free gas to companies who would move there. Many did, including a number of glass factories. New ones were also started to take advantage of the offers. In Findlay, Ohio, for example, there were 50 industrial plants operating on natural gas in 1887. Unfortunately the natural gas was used very freely, and much of it was lost through large leaks or was wasted. By 1892, Findlay was rationing the supply, and by the following year most of its glass plants had shut down or moved out. The experience in Indiana was similar but longer in coming. By 1910 the gas boom in the midwest had completely collapsed.

The second and more permanent improvement of the 1860's was the development of a formula for making high-quality soda-lime glass. This type of glass was known before, but the old formulas made glass that lacked the clarity and quality of the flint type. The new process replaced the expensive lead and potash ingredients with lime and sodium bicarbonate, cutting the cost of raw materials in half. At the same time, the glass was lighter and cooled more quickly, which made the men on the glass lines work faster to get a good dish. This combination of cheaper ingredients and higher productivity cut the

cost of the pressed tableware by 70% - a really big change! As a result, more families could afford it, and the pressed glass boom was on.

During the pressed glass period, there was a gradual swing from master or table salts to individual ones. Looking at the patterns made in 1860, about one design in 5 had an individual size in it. The balance changes gradually over the years, and by 1900 individuals outnumber masters almost 3 to 1. Both sizes were made in tableware patterns as well as in simple shapes for everyday use. Several common individual ones are shown in a wholesaler's catalog about the turn of the century at prices of 29 cents per dozen. They may have been almost as cheap as the salt itself!

In the 1890's, the competition between factories and the influx of foreign glass was so great that some companies decided to join forces. They figured that by combining they could improve efficiency and compete better in the marketplace. In 1891, 18 of them merged to become U.S. Glass. The various factories were set up to specialize in window glass, tableware, etc. and the flood of new patterns was reduced substantially. Unfortunately the depression of 1892-3 came soon after the change, and by the time it ended only 8 U.S. Glass factories remained open. Chinaware came back into fashion about this time, shakers were becoming practical since more freely flowing salt was available, and after 1900 open salts were becoming obsolete.

The story of glass manufacture in the 20th century is one of gradual automation. As labor has become more expensive, hand pressing operations have been replaced by machines which turn out hundreds of pieces per hour. Non-mechanized factories such as Heisey, Cambridge, Imperial, and Westmoreland have disappeared one by one. Since open salts could never be sold in the volumes turned out by automated equipment, their manufacture has shifted to small family-type businesses such as Boyd's Crystal Art Glass Co. or Vogel song's Summit Art Glass Co. Their output is aimed at the collector market, with an emphasis on color. Few if any of their dishes ever have any salt put in them. Hand pressing is still done in a few larger companies such as Fenton, Viking and Smith, but we get the impression that it is not a prosperous part of the business when we visit.

Salt dishes will continue to be made in new colors but there will be very few new designs. Older dishes are still out there, and are fun to find; they will become more scarce as the collecting hobby grows. The number of homes with dusty attics full of old-time goodies is diminishing rapidly. The old adage of "Grab it when you see it - someone else will get it if you don't", is becoming more and more important. So when you find another old salt for your collection, appreciate its scarcity but also be sure to appreciate the bit of history that it represents.

Ed Berg  
401 Nottingham Rd.  
Newark, DE 19711

August 1986

References: Ten books "Open Salts Illustrated" by Allan B. and Helen B. Smith.

"5000 Open Salts" by William Heacock and Patricia Johnson

"American Glass" by George S. and Helen McKearin - one of the classic works on early glass.

"Pressed Glass in America" by John and Elizabeth Welker - a new book containing enormous amounts of information - destined to become a classic in its field.