A Simplified Guide to: SHERLOCK HOLMES AND THE GASOGENE and TANTALUS or

"Remember, alcohol can cause a man to mistake words for thought."

Steve Mason Diogenes Club of Dallas



This is the second of my simplified guides. The first described in simple terms the British coinage of the Victorian period.

Let's start with the GASOGENE:

"His manner was not effusive. It seldom was; but he was glad, I think, to see me. With hardly a word spoken, but with a kindly eye, he waved me to an armchair, threw across his case of cigars, and indicated a spirit case and a **gasogene** in the corner. Then he stood before the fire, and looked me over in his singular introspective fashion."

From "A Scandal in Bohemia"

"Even my limited sense of humour could evolve a better joke than that. But we may be comfortable in the meantime, may we not? Is alcohol permitted? The **gasogene** and cigars are in the old place. Let me see you once more in the customary armchair. You have not, I hope, learned to despise my pipe and my lamentable tobacco? It has to take the place of food these days."

From "The Adventure of the Mazarin Stone"

Given that Holmes casually refers to a gasogene, one can assume the readers of the 1890s were familiar with the term, and understood the object Holmes was indicating.

For the rest of us 21st century devotees, a little explanation is called for.

In the Victorian period, in jolly ol' London, carbonated drinks were not sold in stores.

A gasogene, or seltzogene as it was also commonly known, was a late Victorian device for producing and delivering carbonated water.





The gasogene was developed in the early 1880's, and continued in use through the turn of the century. Gasogenes were considered to be in the class of siphon bottles. There were two varieties, one French and the other English. All of the early models were produced in Paris.

While the English and French models operated slightly differently, they both had the basic function of using a reaction of powders to produce the gas, which was then mixed with the fluid, with the resulting pressure pushing the fluid

to the top through the siphon.

The gasogene consisted of two linked glass globes (one on top of the other), enclosed by a wicker or wire protective mesh, which kept the globes in place while under pressure. The mesh was designed to contain potential glass shards, as the device was susceptible to sudden explosions. This would quickly put a damper on the evening's festivities.

The lower globe contained water or other drink to be made carbonated, the upper sphere a mixture of tartaric acid and sodium bicarbonate that reacted to produce carbon dioxide. The produced gas pushes the liquid in the lower container up a tube and out of the device.

For the chemistry novices, the basic reaction is:

Tartaric acid + sodium bicarbonate \rightarrow sodium tartrate + carbon dioxide + water

For the real chemistry lovers, the balanced equation:

 $C_4H_6O_6\text{+}2NaHCO_3 \rightarrow Na_2C_4H_4O_6\text{+}2CO_2\text{+}2H_2O$

Tartaric acid is a white crystalline organic acid. It occurs naturally in many plants, and is commonly combined with baking soda to function as a leavening agent in food recipes. In the mouth, tartaric acid provides some of the tartness in wine.

Sodium bicarbonate (baking soda) is a white solid that is crystalline but often appears as a fine powder. It has a slightly salty, alkaline taste. It has numerous uses, including: leavening agent, vegetable softeners, meat tenderizer, acid/base neutralizer, fire extinguishing, swimming pool buffer, antacid, chronic renal failure, aspirin overdose, uric acid renal stones, first aid, removing splinters from the skin, toothpaste, mouthwash, antiseptic, deodorant, shampoo, cleaning agent, fungicide, and odor control.



Gasogenes were used to make sparkling wines, lemonade, cider, ginger ale or other saccharine (sugar containing) beverages.

Gasogenes were made in both quart and half gallon sizes. Smaller sample sizes were also used in very limited areas.

So, now let's look at the Tantalus...

"Yes," said Holmes; "I think that both inferences are permissible. Was there any other spirit but rum in the room?"

"Yes; there was a **tantalus** containing brandy and whisky on the sea-chest. It is of no importance to us, however, since the decanters were full and it had therefore not been used."

"For all that its presence has some significance," said Holmes. "However, let us hear some more about the objects which do seem to you to bear upon the case."

From "Black Peter"



A Tantalus is a form of decanter stand in which the stoppers or caps for the bottles are secured by a locked metal bar, as a means of preventing unauthorized use of the alcohol of the house.

The decanters themselves, however, remain clearly visible, "tantalizing" the thirsty. During the time a tantalus was popularly in use, it was considered a

running joke that people who drank liquor would 'tantalize' their servants by putting their liquor into a locked bottle left in plain sight.

The Tantalus usually came with one, two, or three bottles or decanters in the stand.

The term "Tantalus" is derived from Greek mythology, in which the Greek figure, Tantalus was punished for the sin of sacrificing his son, and allowing others to eat part of the body. The punishment, handed down by Zeus, was for Tantalus to stand in a pool of water beneath a fruit tree with low branches. Whenever he reached for the fruit, the branches raised his intended meal from his grasp. Whenever he bent down to get a drink, the water receded before he could get any. Thus, Tantalus was cursed with eternal deprivation of nourishment.





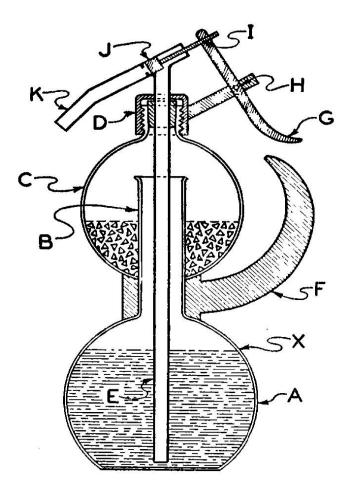
One small, but intriguing side-note to the use of a tantalus. Although the term 'tantalus' has become synonymous with Holmes and Watson, just as the term 'gasogene,' Watson never actually stated that he or Holmes owned or used a 'tantalus.' From the quotes above, the use 'spirit case' and 'gasogene' were used, and it was pointed out that a tantalus was located in Black Peter's cabin, but a tantalus was never identified as being located in the famous 221b rooms.

Over the years, people just assumed the spirit case referred to by Watson in "A Scandal in Bohemia," was in actuality a tantalus. After all, most references indicate a 'tantalus' was a spirit-case with a lock. To this date, Sherlockians will debate whether a true 'tantalus' graced a side bar in Baker Street, or just an ordinary decanter set.

One final note ...

The terms 'gasogene' and 'tantalus' have become such a part of Holmesian lore that many of the Sherlockian Societies use the terms to identify their highest officers in the society. So instead of 'President,' 'Chair,' or even 'Grand Poobah,' the highest ranking title of the society would simply be known as the 'Gasogene.'

THE GASOGENE



Construction: This airtight system consists of a glass flask (A) with a long neck (B), and a small glass globe (C) mounted upon the flask. At the top of (C) is a removable screw-cap (D). Attached to the screw-cap are two tubes, (K) extending outside the globe and (E) extending nearly to the bottom of flask (A); also attached to the screw-cap is a valve (J) controlled by the lever-system (G), (H), and (I). A handle is provided in (F). (A) and (C) are usually enclosed in a stiff metal network, to prevent breakage, either by pressure or by accidental dropping or contact with other objects. should the "hand of the potter shake." Operation: Globe (A) is filled with beverage water. In (C) is deposited a small quantity of chemical tablets or salts. The screw-cap (D) is closed. The whole device is tipped so that water from (A) will run into (C) until (C) is about one-third full. The device is then brought back to a vertical position. The chemical action of the water upon the crystals in (C) produces carbonic acid gas (carbon dioxide) which builds up a pressure in (C) and is driven down through (B) into the water in (A). The operator grasps handle (F) and presses upon lever (G), holding some vessel under tube (K). The depression of (G) causes the levers (G) to pivot at (H) and pull at (I), thus opening the valve (J) and permitting water charged with gas to be ejected by pressure through the tube (E) into tube (K) and so into the vessel held below (K). Release of pressure upon (F) allows an internal spring to close (J) (not shown), closing the system.