

THE GUITBERT TRUMPET: A REMARKABLE DISCOVERY.

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Some years ago, workmen were called in to renovate a castle in the Dordogne in France. The well in the middle of the courtyard had silted up in the course of time. As the workmen began to dig into the silt at the bottom of the well, they uncovered a quantity of old firearms and a trumpet. In view of the significance of the find it is regrettable that trained archaeologists were not brought in immediately. None of the circumstantial evidence survives; what happened to the arms is also not recorded nor are we as yet privy as to the exact location of the castle. The trumpet was taken home by one of the workers. For some time it hung on his wall, where it was seen by an acquaintance who is a collector of brass instruments. The collector eventually purchased the instrument, but for legal reasons remained cautious about publicity. Under French law, artifacts of historical importance excavated on French soil can be deemed to be property of the French State and requisitioned. Nonetheless he consented to our request for a visit; this was arranged, we were hospitably received, the instrument was examined, measured, photographed, and played (Figures 1 and 3). Subsequently, a technical drawing was drafted and copies of the instrument have been made by the authors. Our common desire has been to preserve all the data we could concerning this remarkable instrument and to make its presence known to the world, while respecting the owner's desire to remain anonymous.

Around the garland of the bell in Gothic fractal script are engraved the words: "MARCIAN GUITBERT [shield with insignia] ME FIT A LIMOGES L'AN MIL CCCCXLII (hole)." (Marcian Guitbert made me at Limoges in the year 1442). The lettering is offset by hatching. The insignia is a castle-keep and is the emblem of Limoges. This city was already an important cultural center under the Merovingian and Carolinian dynasties and developed to become one of the leading centers for enamel work from the twelfth century onwards. The metalworkers there specialized in providing almost the whole of Europe with exquisite enameled reliquaries, crosses, altar vessels, and other sorts of beautifully worked devotional objects and in so doing, created a great deal of wealth for the area. Their work was largely beaten out in copper, then enameled in vivid colors, and finally gilded. It comes as no surprise to us then that the trumpet was manufactured in this, the foremost metalworking center in France and that despite its simplicity of design, it bears testimony to an as yet unseen degree of refinement and workmanship in the trumpet making of the fifteenth century.

There is no baptismal register in Limoges before the 1580s and no separate guild of music instrument makers until the early seventeenth century. Significantly, however, the name of Guitbert is associated with musical instrument-making from then on. Archival

research in Limoges has established that a craftsman of that name flourished there around the middle of the seventeenth century; his name appears amongst the members of the goldsmith's guild.

The trumpet is made in brass; its state of preservation is absolutely remarkable, given that it had been in the bottom of a well for probably more than 500 years. It is dark brown in color, the result of oxidation over the centuries. There is no trace of corrosion. The entire surface is beautifully smoothly finished, showing no sign of hammer or file marks. It is made in seven separable pieces that are designed to be butted together.

The mouthpiece (Figure 2) has survived in perfect condition. The style of construction is somewhat similar to the mouthpiece of the Jacob Steiger trumpets made in Basel in 1578 (and now in the Historisches Museum, Basel). It is a composite mouthpiece made in three, four, or possibly even five parts: a broad conical cup; a wide, flat, thick, and presumably cast rim that also reinforces a section of the cup (it is possible that the cup and cast rim are in fact part of one large casting that has subsequently been machined down); a long conical backbore; and a reverse-conical sleeve that is soldered over the backbore and secures a tight fit into the instrument itself. The possible fifth part is the bottom 14mm section, which does not quite conform to the angle of conicity of the beginning of the backbore and may be another section which has been soldered onto the backbore under the sleeve. The sheet metal used to make the mouthpiece is considerably thicker than that used for

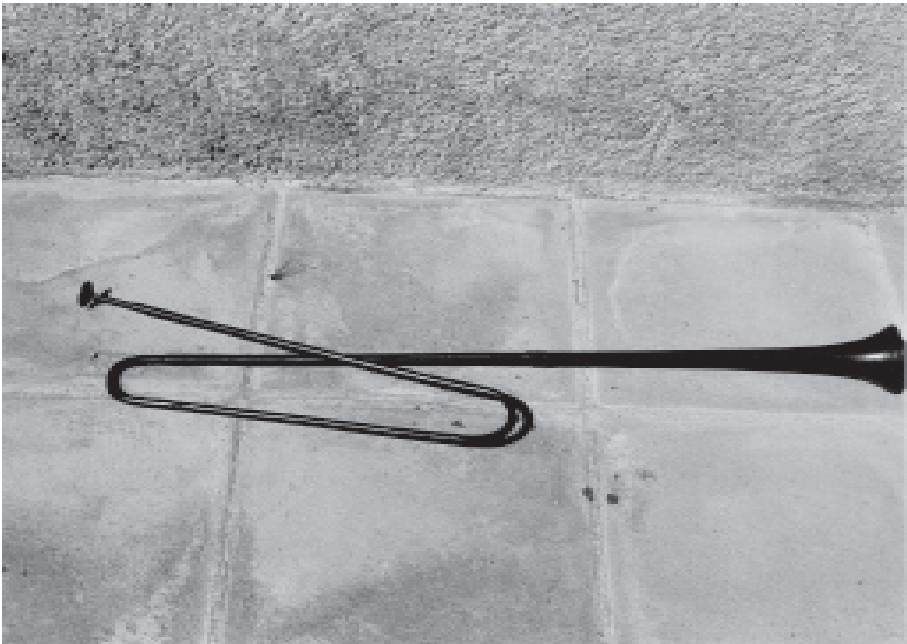


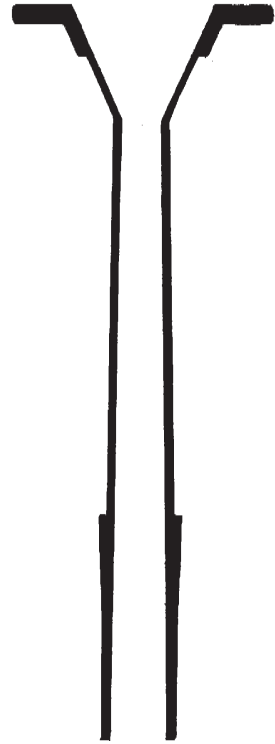
Figure 1:
Trumpet by Marcian Guitbert, Limoges, 1442.

the rest of the instrument, varying between 0.9mm and 1.3mm. The parts are expertly hard-soldered together, making it somewhat difficult to see exactly how it was assembled. This is further hindered by the patina, but it is possible to see that the cup is soldered to the backbore and that the sleeve is soldered over the backbore 69mm from the rim.

The trumpet corpus is made with two yards of unequal length but equal diameter and two bows equal in shape, length, diameter, and radius. Except for one sleeve at the beginning of the bell section, there is none of the sleeves usually associated with European long trumpets made before the valve era. Each yard and each bow begin with a 25mm tapered-out section that has been decorated on the lathe with the maker's patent pattern of two double rings set 8-10mm apart. Each yard and each bow also terminate in a 25mm tapered-in section, so that the whole thing butts together. If one chooses the shorter of the two yards (340mm) as the first yard, one cannot reach the mouthpiece to play. Thus, it appears logical to assume that the longer of the two yards (410m) is the first yard. Both bows splay outwards at an angle of 30 degrees; this is a significant feature of the overall eventual design of the trumpet. The average external diameter of both the yards and bows is 11mm. One of the bows has been repaired by the addition of a patch. The color of this patch is identical to the patina of the rest of the instrument, which has led us to assume that it is contemporary and that the instrument had been used for some time before it was dropped or thrown down the well. The thickness of the brass throughout the trumpet is around 0.5mm.

The sixth part or third yard of the instrument represents something of a departure from the norms of trumpet building that we have encountered. It is a tube of 415mm in length, about a third of which is cylindrical, with an external diameter of 12mm; the rest of it is conical, continuing up to 14mm. The beginning of the bell section is only 13.9mm internally; thus, we have to pass the sixth part of the instrument back through the mouth of the bell where it wedges into position at the very beginning of the bell. The length of the bell and the sixth part together is around 855mm.

The bell itself is comparable in quality with the work of the best Nuremberg makers, such as Schnitzer. It is strengthened at the beginning by a 30mm decorated sleeve that is soldered in place. Its function is to reinforce externally the area of the bell that is to receive



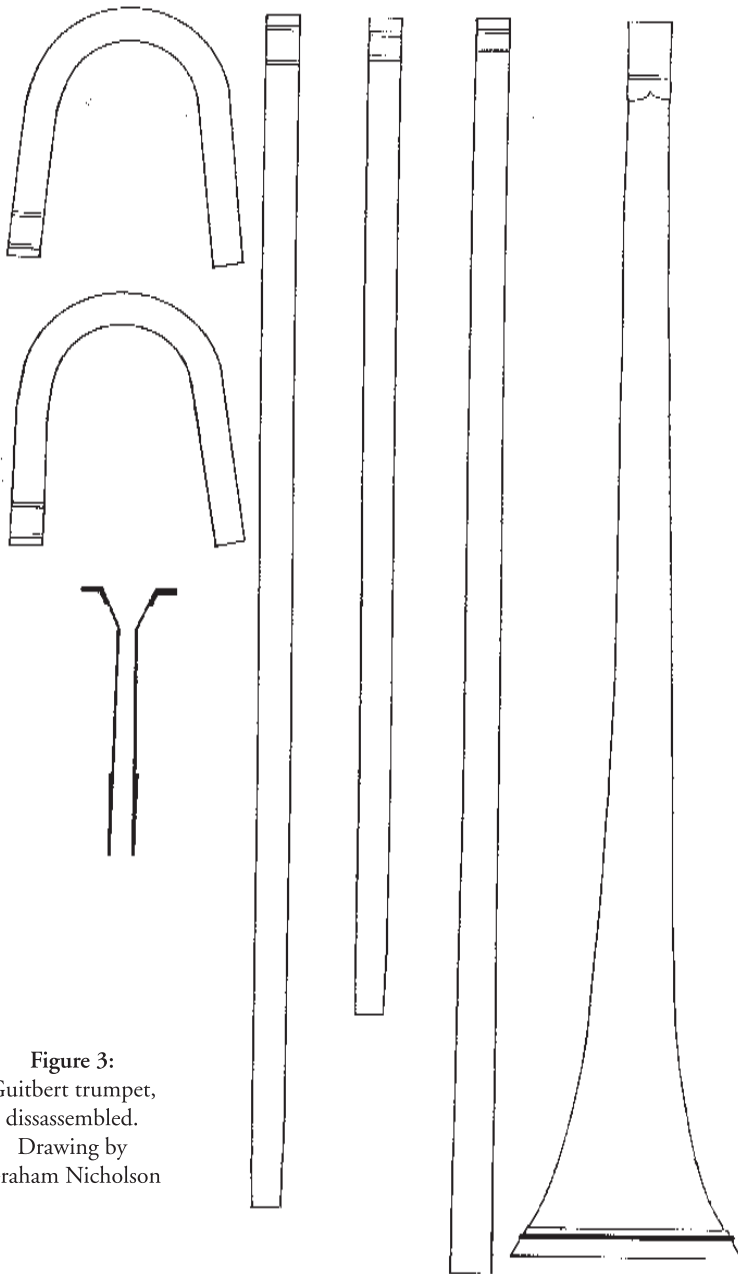


Figure 3:
Guitbert trumpet,
disassembled.
Drawing by
Graham Nicholson

the third yard. The tabbed silver-soldered seam is perfectly executed and visible along the entire length of the bell. It has been polished to a high finish, possibly on the lathe. There is a fissure 277mm from the end of the bell of the kind that can occur from spinning, though this is by no means certain without further investigation. There is none of the scraping and burnishing marks as found on most of the Nuremberg trumpets. With the single exception of the Billingsgate trumpet from fourteenth-century London, the design of the garland is a departure from everything we have yet seen. The garlands seen on German, English, Austrian, Dutch, Portuguese, and Italian instruments of the sixteenth and seventeenth centuries vary in size between around 20 to 30mm, whereas this one is only 13.3mm wide. The rim is neither turned over nor reinforced at the edge with a wire in any of the traditional ways. A wire, which is half round in profile, is soldered 2.5mm from the beginning of the garland, after which the lettering reaches right up to the very edge of the bell without any further reinforcement. The garland is simply soldered to the bell; the result is strikingly elegant. None of us has yet seen the Billingsgate trumpet, which was excavated from the mud-banks of the Thames in London in 1984. From two published articles,¹ we have been able to deduce that the garland is very similar in design. At around 10mm, it is even smaller than the Guitbert and by virtue of the X-ray we can definitely see that it is soft-soldered to the bell and that the rim is similarly not turned over. Although it is not engraved, two additional design factors appear to be identical to the Guitbert garland and they are the existence and positioning of a half-round profiled ring and the existence of a sizeable hole in the garland. The Guitbert has a 3.2mm hole, which goes right through both the garland and the bell. The maker has engraved a square boundary around it, proving that it is part of his design and not something that was added subsequently by someone else. In Nuremberg, wire was threaded through slightly smaller holes in the garland in order to attach the bell to the first bow, but here, as can be seen in Figure 1, there is nothing to which it could be attached. We propose that this hole was used to fasten a banner. Contemporary iconographical evidence exists to support this idea. Paintings such as the famous Memling triptych in Antwerp, as well as many others, also seem to portray a similar style of narrow garland. It is clear that the instruments depicted in the triptych were made in silver with gold embellishments, materials suitable for the theme of the painting, the lamentation of Christ. The Guitbert trumpet is, by way of contrast, probably army issue.

The instrument can be assembled in two slightly differing configurations, both seen in the iconography of the period. The first is a simple open "S" shape, in which the bell can be held either above or below the first yard. The second configuration is where the first yard crosses the third yard diagonally. By swiveling the second bow up or down one passes from the one shape to the other.

The trumpet plays with a beautifully resonant and strident timbre. It is remarkably well in tune in all registers, though with a mouthpiece bore of 5.5mm and a cup depth of 15.75mm it is obviously designed to play in the principal register. It is pitched in modern E \flat ; but to the player who used it, it may have been in C or D, or perhaps even in F.

There has been a good deal of musical experimentation and scholarly argument concerning the validity of the slide trumpet in the *alta capella* over the last ten years. It is not

our intention to enter this debate since what we are dealing with here is clearly a military instrument, in all probability in a military context. We nonetheless find it worthwhile pointing out that if one were to experiment with the idea of building a *trompette de menestrelle*, the Guitbert trumpet provides us with the only historically tenable bell form in existence on which to base such an experiment. Furthermore it furnishes us with a mouthpiece that is a considerably better model on which to attempt the reconstruction of the slide-trumpet "sound" than the seemingly ubiquitous use of an almost modern trombone mouthpiece. To assuage our intellectual curiosity, we built a slide trumpet based on the Guitbert model, continuing the backbore of the mouthpiece right down inside the first yard to the bow. The resulting trumpet produced a vibrant and strident sound and matched the timbre of the shawm and pommer in a convincing manner. The modern trombone mouthpiece pales in timbre by comparison.

Efforts are being undertaken to fill in the gaps concerning this instrument's history. A longer and more thorough investigation of the instrument is also being planned. However, these things by their very nature take time and we could no longer reign in our excitement to bring this into the public domain.

NOTES

¹ G.Lawson and G.Egan, "Medieval Trumpet from the City of London," *Galpin Society Journal* 41 (1988): 63-66; and G. Lawson, "Medieval Trumpet from the City of London, II," *Galpin Society Journal* 44 (1991): 151-56.