

THE CREMONESE KEY TO EXPERTISE

In the second half of a two-part guide to violin connoisseurship, ROGER HARGRAVE explains why knowledge of classical Cremonese makers can unlock the secrets of so many European violins of that period and beyond

HUNDREDS OF YEARS BEFORE ANDREA Amati and his sons developed the first violins, musical instrument making was already well established in Europe. During all this time, and in some cases right through to the end of the 18th century (and very occasionally even later), most, if not all, handheld bowed and plucked instruments were constructed using variations of the same basic system. Essentially, this involved fitting the neck to the sides of the instrument (or in the case of lute-type instruments, to the panelled back) before aligning the neck and finalising the body outline.

The objective of this pan-European system was always the same: to allow the strings to run in a straight line along the fingerboard, over the bridge to the tailpiece and endpin. Any soundholes cut through the belly's surface were then centred upon this axis. As a result of this basic system, all hand-

held bowed and plucked instruments were constructed with some degree of geometric imbalance between the treble and bass sides of their bodies. Visually they may appear symmetrical, but they are almost never mathematically symmetrical: they are asymmetrical (see drawing opposite and drawings on next page).

With violins, the basic construction system aligned the body and f-holes to the neck, rather than, as has generally been the case since the beginning of the 19th century, aligning the neck to the body and f-holes. As a result, all violins made in the first 200 years of the instrument's history are to a greater or lesser degree asymmetrical. Connoisseurs often register such details intuitively without fully realising what is helping them to assess the age of a particular instrument, just as they might intuitively assess the authenticity and extent of an instrument's wear and patina.

STRADIVARI
BRESCIA
BERTOLOTTI
STAINER
GUARNERI
MITTENWALD
ROGERI
VUILLAUME
TESTORE
TURIN
AMATI
TONINI
GRANCIANO
DA SALÒ
BALESTRIERI
BOLOGNA
MONTAGNANA
GAGLIANO
TYROL
ROME
CAMILLI

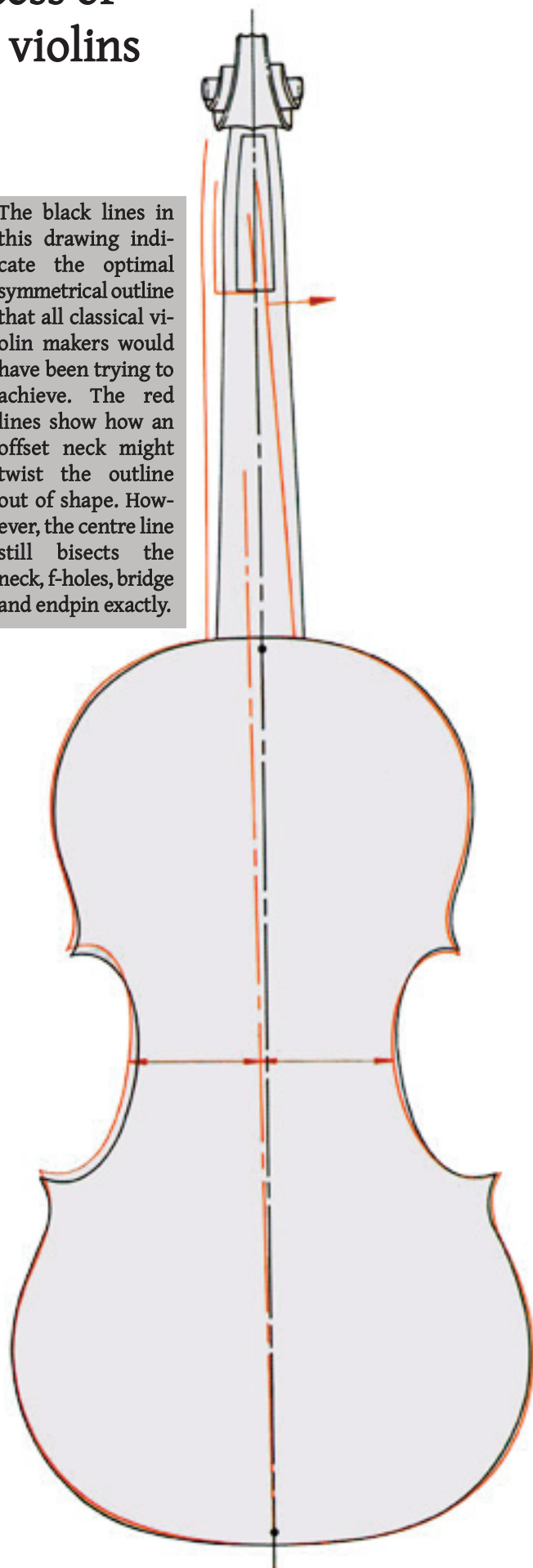
The Amatis' inside mould is of singular importance to the process of identifying classical Cremonese violins

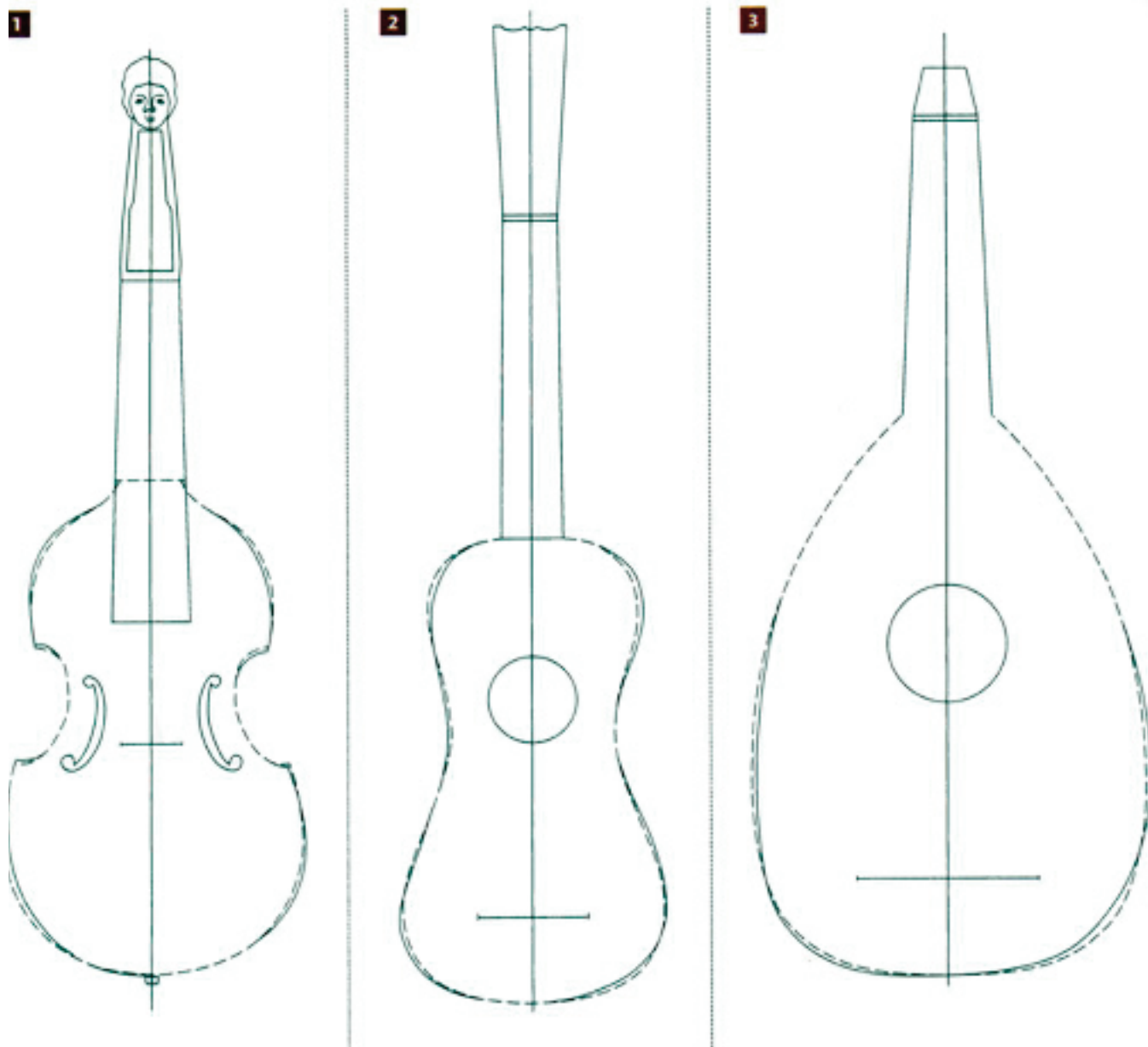
DESPITE THE FACT THAT the early concept of aligning the body and f-holes to the neck was ubiquitous in Europe, each school of instrument making developed its own idiosyncratic method of making the sides or ribs and attaching and aligning the neck (see drawings on page 53). In addition, each school jealously protected and controlled its unique method of construction, and within each school the favoured method was replicated, often for centuries. We can liken this pattern of development to the evolution of the ancient four-wheeled wagon that would have been pulled by horses or oxen. Because all four wheels were originally fixed to a rigid frame, these wagons were extremely difficult to manoeuvre: they had to be dragged around corners. Then at some point it was realised that if the front two wheels could be turned, the wagon might be manoeuvred more easily. However, although this concept of wheel steering was easily understood and spread very rapidly, in each settlement or area, wagon makers developed their own idiosyncratic method of mounting and turning (usually) the front wheels. And this has continued until the present day. Indeed, although the concept remains simple, most modern car makers have developed and continue to develop different methods of solving this age-old problem. Moreover, their experiments with such developments are always carried out in extreme secrecy. And secrecy is also an important element in the violin story.

A major reason for the variations in violin makers' working practices was the nature of European society, in particular the constant threat of war. Almost everyone, especially artisans, lived close to or within walled cities, which despite their close proximity and lively commercial, political and social interaction, were often more isolated than many countries are today. Moreover, the artisans and tradesmen of each city jealously guarded the secrets of their profession through various guild-like institutions.

In violin making, perhaps the best examples of this were the Cremonese and Brescian schools. For about a hundred years until the devastating plague of the 1630s, these two instrument making schools existed almost side by side. Both were highly productive and

The black lines in this drawing indicate the optimal symmetrical outline that all classical violin makers would have been trying to achieve. The red lines show how an offset neck might twist the outline out of shape. However, the centre line still bisects the neck, f-holes, bridge and endpin exactly.



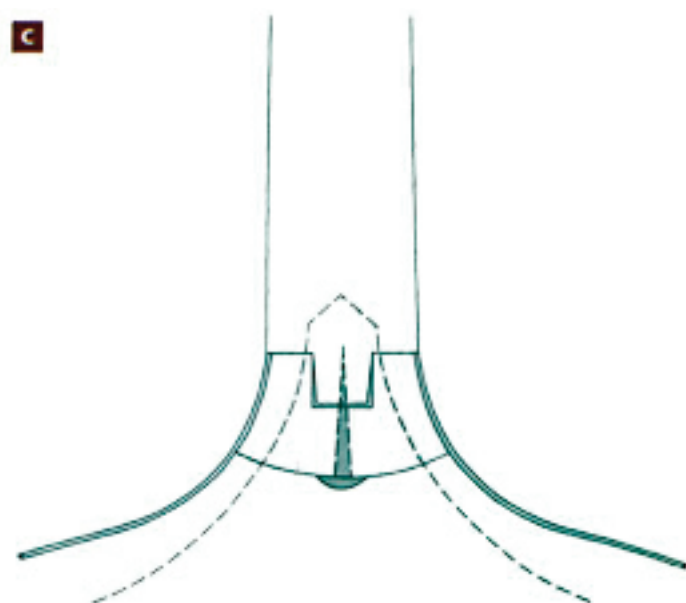
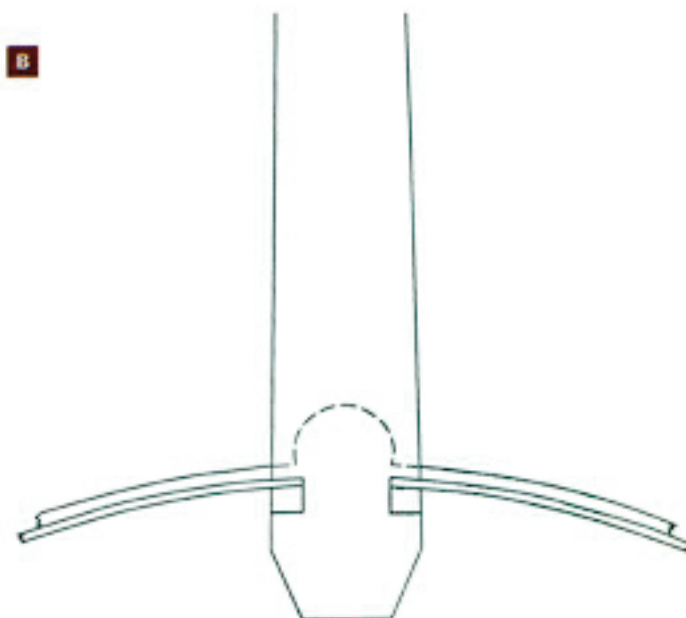
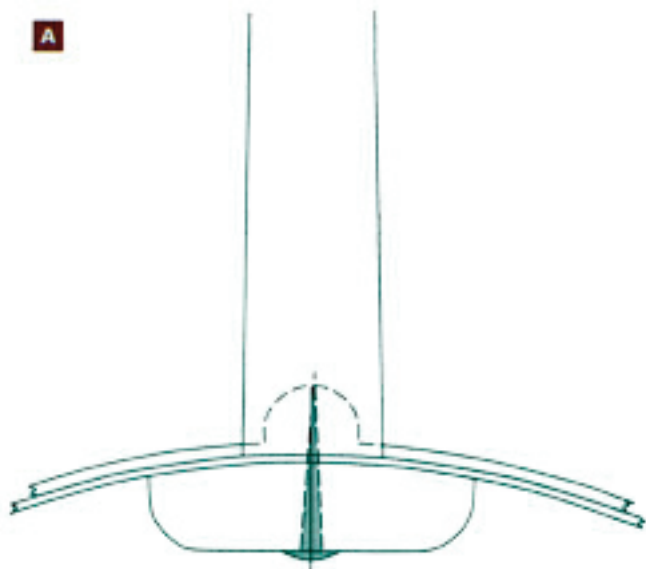


In these drawings of a viola da gamba (1), a guitar (2) and a lute (3), the dotted lines indicate the intended symmetrical outline while the unbroken lines indicate the actual asymmetrical outline. In each case, the neck, soundholes and bridge remain on the centre line.

both exported instruments throughout Europe. However, although Brescia is only about 50km from Cremona, and although they were chasing the same concept, Brescian and Cremonese makers developed and continued to use entirely different methods of making the sides or ribs of their instruments and of attaching and aligning their necks. Accordingly, it is the peculiarities of the Cremonese method of construction, and the particular features that this method engendered, that help experts distinguish Cremonese violins from those of Brescian and other European schools. Fundamentally, the Cremonese method, which was almost certainly devised by Andrea Amati, involved the use of an inside mould.

ANOTHER FEATURE OF THE VERY earliest violin

making schools (and here again Cremona and Brescia are the best examples) was their tendency to produce different and often highly individual designs or models. Considering their close proximity, differences between the Cremonese and Brescian models are both obvious and extreme. However, after the European plague of the 1630s, the tendency to create and develop new models declined rapidly. The plague killed virtually every violin maker in Europe, sparing only the finest maker of the time, Nicolò Amati something for which we should all be eternally grateful. Even before the plague the demand for Cremonese violins was already well established, but from this time on it rapidly became insatiable, and it quickly outstripped what Cremona could supply.



This page: Different ways of fitting necks for the violin (A, the classical Cremonese method, and B, a variation of a method using wedges that was popular in German-speaking schools) and the viola da gamba (C). The chosen method, which varied from school to school, was generally modified slightly for different instruments. A school that used nails would use nails for gambas, violins and lutes, and a school that used wedges employed wedges for each type of bowed or plucked instrument that they were making. This was not always the case, however. Stainer is an example of a maker who employed one system (Cremonese) for violins and another (Venetian) for gambas. This may be because he learnt the methods for each instrument in different places.

At this point it is worth mentioning that among the earliest European violin makers those of the Brescian school had considerable influence. Brescia was a highly important centre of musical instrument manufacture and export. And craftsmen who came across Brescian instruments of the violin family sought to emulate those works, which in musical terms, along with those of Cremona, represented the cutting edge of late Renaissance technology. Nevertheless, in spite of the widespread nature of this early Brescian influence, it was destined to be short-lived. The combination of a growing preference for Cremonese works, coupled with the plague's decimation of the early Brescian school, largely stifled Brescia's immediate influence.

The Brescian school was capable of producing works that, in addition to their musical qualities, were distinguished by their exceptional artistic and

aesthetic merit. As early as the 15th century (and probably much earlier) makers were producing exquisitely decorative instruments in the city. However, in the formative years of the violin's development, the differences in production methods between Cremona and Brescia were reflected in the finish of their respective instruments. Many Brescian works hint at speed and large-scale manufacture, whereas all of Cremona's pre-plague works suggest a more disciplined and consistent process with strictly regulated working practices, and an emphasis on quality rather than quantity. However, this may be an illusion created by the Amati family's inside mould. Brescian makers were clearly capable of producing works of exceptional quality, but by employing their mould the Amati family were able to reproduce virtually identical instruments over and over again. The Amatis' mould imparted a consistency of appearance and function that simply was not present in the work of



The f-holes on this early Amati (left) and late Guarneri 'del Gesù' (right) may be starkly different in style, but the two violins share a virtually identical method of construction

It is the connoisseur's job to interpret the interplay between the construction method and an individual maker's stylistic interpretation

Cremona's rivals, especially those working in Brescia. Moreover, the mould allowed the Amati family to make controlled modifications that they could later retain or reject.

The long-term importance of the Amatis' inside mould cannot be underestimated. Without substantial changes it was adopted in turn by every maker of the classical Cremonese school, and for more than two centuries it was the salient feature of Cremonese violin making. Its use generated typical characteristics that are readily recognisable to violin connoisseurs and as a result, it is of singular importance to the process of identifying classical Cremonese violins.

The plague of the 1630s that decimated the Brescian school and killed almost all Europe's violin makers left Nicolo Amati with a virtual monopoly. Nevertheless, the general collapse of social order meant that for almost a decade very few new violins were produced. Subsequently, however, the demand for Cremonese violins rapidly began to re-establish itself. At this point Nicolo Amati, with no sons of working age, was faced with a labour shortage, and to

satisfy the increasing demand he was eventually forced to employ non-family members. This new group of Cremonese makers was soon constructing violins, initially bearing Nicolo Amati labels. But even this new labour force could not keep pace with the insatiable demand for instruments of the violin family.

Despite the devastating effects of the plague on the business, the tradition survived. The demand for violins was quickly recognised and musical instrument makers of various disciplines began to build instruments of the violin family. This may have been a fortunate development for European music, but it eventually led to the demise of both the Amati family and the generations of Cremonese makers that followed. In almost every European town and city of importance, skilled artisans gradually took up violin making. Freed of many of the restrictions that had controlled artisans before the plague years, they simply copied Cremonese designs. And they copied them in much the same way that modern makers still copy classical Cremonese works. In particular, they began by copying the highly popular instruments of the Amati family. Eventually, they moved on to copy the works of Stainer, followed later by those of Stradivari and finally the idiosyncratic works of Guarneri 'del Gesù'.

WITH NEARLY EVERYONE COPYING Cremonese instruments, the development of new models and patterns stopped almost entirely. By the end of the 17th century, any rules governing the design of violins were almost certainly no longer being used. Even in Cremona, instrument makers quickly learnt to copy and adapt successful designs rather than produce their own. As Stewart Pollens wrote in *The Violin Forms of Antonio Stradivari*, 'Stradivari copied sections of earlier outlines and modified other areas to produce new shapes. Thus empiricism, rather than a rigid system of geometry and proportion, typifies Stradivari's technique of design: Indeed, it might be argued that the Stradivari family, and possibly the Bergonzis, were the last makers anywhere seriously to modify violin designs, empirically or otherwise. Aside from their methods of construction and design, there was one further important stage in the development of the violin, and it is one that is of particular importance to the connoisseur.

Each new Cremonese maker initially worked with the methods and designs of their teacher, but as they developed into master violin makers themselves,



Another comparison of an early Amati instrument (left) and a late Guarneri 'del Gesù' violin (right) shows that despite stylistic differences, the same basic construction method was retained

they gradually developed a style of their own. During the two centuries of the classical Cremonese school (c.1550-1750), Cremonese makers continued to copy the Amati designs, occasionally, as in the case of Stradivari, extending and refining them slightly. However, stylistically, by the first half of the 18th century, the Amati influence in Cremona was in most cases nearly unrecognisable. Yet despite this, concealed beneath a veneer of stylistic details, the basic Cremonese rules of construction, as established by Andrea Amati and his two sons, remained largely unchallenged and unchanged. For example, it is difficult to imagine two more divergent styles than that of a late Guarneri 'del Gesù' and an early Amati (see photographs). Although working in the same immediate neighbourhood, they were separated by almost 200 years. But when the instruments of these two

makers are scrutinised, it gradually becomes apparent that even with their glaringly obvious stylistic differences, the method of their construction is virtually identical. And this is true of all the classical Cremonese makers. Their basic method of construction never changed in 200 years.

IN THE REST OF EUROPE, despite the predilection to copy Cremonese violins, makers from each particular school remained fundamentally true to the method of construction they had learnt as apprentices. Thus in England in the first years of the 18th century, Daniel Parker was making stylistically close copies of an instrument by Stradivari while continuing to use construction methods specific to the English school of Barak Norman and Nathaniel Cross (see photographs on page 58). We see a similar phenomenon in Germany in the middle of the 18th century



An early 18th-century violin by English maker Daniel Parker. He copied a Stradivari instrument but used construction methods specific to the English school of Barak Norman and Nathaniel Cross.

with Gabriel David Buchstetter of Regensburg (see photographs). He copied the outline and form of a 1690s long-pattern Stradivari with considerable success. Nevertheless, the varnish and method of construction remained specific to his native school.

When I refer to methods of construction, I include such details as how the ribs or sides were put together; how the linings were inserted and shaped; the technique used to fit the neck and establish the f-hole positions; whether or not locating pins were used; the method of arching and hollowing the plates; and the method of marking and cutting the f-holes and scroll. Because each construction method creates features that are both unique and typical, it is reasonable to conclude that a violin's school can be defined or identified by its method of construction. Although

it is not always possible to uncover

Another comparison of an early Amati instrument and a late Guarneri 'del Gesù violin shows that despite stylistic differences, the same basic construction method was retained the exact method of a particular maker or school, the features engendered by the method are often enough for connoisseurs to form an opinion.

Within each school, as was the case in Cremona, as each new apprentice developed into a master violin maker, they gradually developed a style of their own. I define style as including such features as corner lengths and widths; the back and belly overhangs; the edge thickness; how the purfling mitres were finished; the way in which the volutes and flutings of



Right, a mid-18th-century violin by Gabriel David Buchstetter. He was inspired by long-pattern Stradivaris (such as the 1693 'Harrison', left), but used his native school's construction methods and varnish.

the scroll and f-hole wings were formed; and of course the idiosyncratic ways in which each maker's tools left their marks.

Although these early violin makers appear earnestly inclined to change their style of working as they matured, they were extremely unlikely to change the method of construction they had been taught as apprentices. And this leads us to another key that can help unlock the secrets of violin identification. Once you have established the school, identifying individuals within that school is largely a case of examining stylistic details. Construction methods thus define schools, and stylistic details separate the individuals within a school. There are, naturally, a great many crossovers and exceptions to this general directive, but by and large it is this interplay between

the construction method and an individual maker's stylistic interpretation that forms the basis of visual expertise. And, in essence, it is the connoisseur's job to interpret this interplay and reach some form of appraisal.

AS TIME PROGRESSED after the plague of the 1630s, through the 17th and 18th centuries, three great influences upon violin design were established. They were the Amati family, followed by Jacob Stainer and later by Antonio Stradivari. Others played a minor role from time to time but throughout this period it was these makers who led the field. Their influence reached every corner of Europe and no important group or individual maker remained unaffected.

Understandably, the Amatis were the first to influence violin making in Europe. Their fame was enormous and long-lasting, and they were soon copied and even counterfeited - apart from those individuals who were taught directly by Nicolo Amati. The Amatis influenced the Italian schools of Florence, Venice, Turin, Milan, Bolzano and Bologna. Outside Italy, they were particularly influential in the Netherlands, and later, towards the end of the 18th century, in England. It was only with the increasing vogue for Stainer's instruments that the Amatis' star was eventually eclipsed.

Where Stainer learnt his trade has still not been established beyond doubt. However, not only did he use the Cremonese method of construction (in particular an inside mould), but at first he also closely followed the Amati model in almost every respect. Whatever his provenance, Stainer's fame quickly outgrew that of the Amatis. But unlike the Amatis, Stainer's influence was apparently only indirect; he claimed to have taught no one. The response of other makers to the public demand for Stainer instruments was therefore all the more astounding. In Italy his model penetrated every important centre of violin making with the exceptions of Cremona, Brescia and Milan. Apart from the Klotz family in Mittenwald, who remained faithful to the Amati ideal, in Germany and Austria Stainer's influence was almost ubiquitous. A typical scenario in the Low Countries was that of Hendrick Jacobs and his pupil Pieter Rombouts working in Amsterdam. Jacobs built beautiful instruments after the Amati pattern, but Rombouts gradually adopted the Stainer model.

STAINER WAS A TRULY OUTSTANDING and highly important maker whose work has been seriously undervalued for many decades. Perhaps because Stainer taught no one directly, his influence was always that much weaker. His patterns were often copied and re-copied to the point of caricature. Unfortunately, it was in England where the effect of 'Stainerisation' among serious makers was the most devastating. From the first years of the 18th century Daniel Parker's outstanding copies of Stradivari's instruments should have laid the foundations of a great English school. It was sadly not to be. Almost every 18th century English violin is a copy of a Stainer or an Amati, with some makers, such as Dodd, alternating between one and the other for their entire working lives.

The ultimate insult to Stainer's memory, however, was paid by the factories of the late 19th century,

whose primitive Stainer copies almost beggar belief. In order to satisfy market requirements, millions of poor-quality replicas were produced. They owe little to Stainer's good working practices and even less to his good taste. Nevertheless, and this is why I mention them, even these hideous factory instruments conform to the rule that construction methods define schools.

Stradivari inspired several makers outside Cremona during his lifetime, but it was after this death that the full extent of his influence was felt. With a few notable exceptions, it was not until the 19th century, when the French rediscovered the classical Italian school, that 'Stainerisim' began to give way to 'Stradivarism'. From then on it was Stradivari who inspired the majority of violin makers.

Unlike Stainer, Stradivari did have pupils. He was directly responsible for teaching at least two of his sons, Omobono and Francesco, and he may also have been involved in the tuition of Carlo Bergonzi and possibly even Guarneri 'del Gesu'. Stradivari was also copied as badly as Stainer and the Amatis, but, at their best, Stradivari-inspired works are full of skill and artistry. Since classical times Stradivari has been copied more often, by exceptional violin makers, than any other maker and this is reflected in the prices that such instruments bring at auction: Lupot, Vuillaume, the Gaglianos, the Guadagninis, Rocca, Pressenda, Voller, Lott and Sacconi, to name but a few, all copied Stradivari with considerable success.

Some of these makers also successfully copied Guarneri 'del Gesu'. His influence matured much later than that of Stradivari and with the possible exception of his wife Catarina Guarneri and Lorenzo Storioni, the classical period was long gone before he was copied with gusto. Realistically, it was only after Paganini's endorsement in the first half of the 19th century that Guarneri 'del Gesu' joined Stradivari in the first rank. Unfortunately, in attempting to imitate his popular, but rather eccentric later works, most copyists have fallen disastrously short of the mark. It might even be argued that Vuillaume, who was so successful with his Stradivari models, never really captured the idiosyncrasies of Guarneri 'del Gesu'.

And this is mainly due to Vuillaume's more accurate system of construction, something that is slightly less obvious in his Stradivari and Amati copies.

As I wrote in the first part of this article, there are ways of becoming an established expert on minor national schools or inexpensive instruments without having to study classical Cremonese works. Günther Hellwig wrote his highly important work on the Hamburg maker Joachim Tielke with little knowledge or experience of classical Cremonese works. The same is true of Walter Senn's book about the life and work of Stainer. Nevertheless, for anyone wishing to become proficient at instrument identification, the importance of Cremona cannot be overestimated. Quite simply, because the influence of classical Cremonese violins was almost ubiquitous, anyone who can identify the works of the classical Cremonese makers (even superficially) is already well on the way towards a better understanding of all violins.