THE CLASSICAL GUITAR

A STUDY IN

STRUCTURAL, TECHNICAL AND MUSICAL EVOLUTION

BY

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requirements for the Degree of
Master of Music.

C O N T E N T S

P R E F A C E

Although complete works have been written dealing with the structural development of the guitar, to the best of my knowledge, no attempt has yet been made to incorporate in one work an account in which structure, playing technique and musical style are correlated. Therefore, the aim of this work has been to provide a compendium on these three main aspects of the historical development of the guitar.

The student of music in South Africa generally finds a paucity of literature on the guitar and, therefore, I have endeavoured to include as many illustrations as possible in the hope that this may prove useful and of interest.

My task in collecting material was made easier by the assistance of Mrs Elspeth Jack and Mr Uliano Marcio of the University of Cape Town, to whom I am most grateful, as well as to Mr Brian Worsfold of Rhodes University for his assistance in providing Spanish translations. I must also thank Mrs Eileen Sadler for her hard hours of typing and, of course, my wife, Jill, for her proof-reading, pictures and patience, as well as help in German translations.

PART I

THE STRUCTURAL EVOLUTION

OF THE CLASSICAL GUITAR

I N T R O D U C T I O N

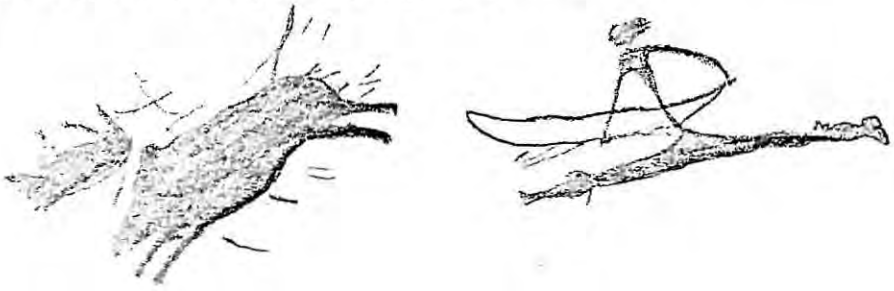
The object of Part I is to try and establish the mainstream of the development of the guitar from the earliest beginnings of string instruments to the present day. Since little information and evidence of early instruments (i.e., before 1500 A.D.) is available, it has been necessary to formulate theories on how these developments may have taken place.

C H A P T E R I

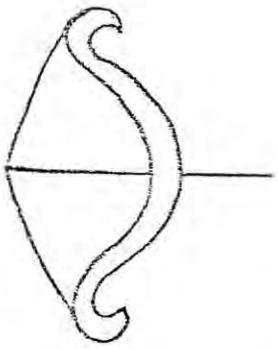
BEGINNINGS IN THE NEAR EAST

The most fundamental and primitive aspect of music is rhythm and the earliest musical instruments were those used for marking rhythm. These were followed by seed-gourd rattles, scrapes and the like. Whistles made from bones and later "trumpets" from hollow horns or shells were used. These trumpets did not actually produce the sound which came from the voice of the man in a way similar to the use of the modern megaphone. Later the "slit drum" could produce two notes of different pitch and there is evidence of a later flute which could produce even more tones. At about this stage came the beginning of the development of string instruments.

The most ancient civilizations were those in Egypt, Mesopotamia, India and China. We must look to the Near East, i.e., Egypt and Mesopotamia for evidence of the origin of the guitar. The necessity to kill for food led to the invention of the "hunting bow" by ancient man. The earliest evidence of the use of the hunting bow comes from the Upper Palaeolithic period (30 000 - 8 000 B.C.), for example, this "Hunting Scene" from Cueva Remigia in Spain. (1)



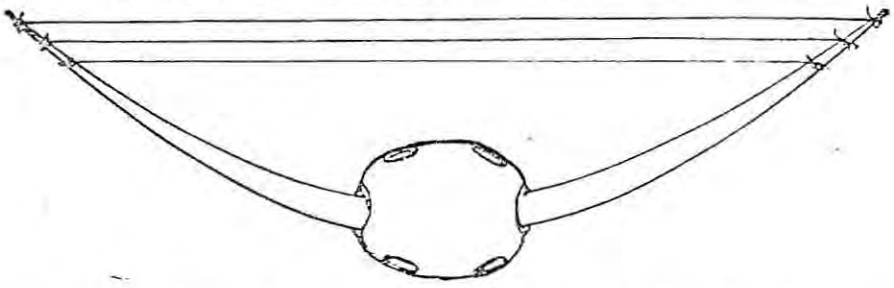
A "Lion Hunt" stele from Uruk in Sumeria dating back to about 3 200 B.C. shows an already highly developed hunting bow being drawn by an archer. (2)



From this we can assume that the hunting bow was also in existence in the Near East as far back as the Upper Palaeolithic period.

One can imagine that it did not take long for the hunter to find out that by plucking the string of his bow he could produce a sound, a sound which no doubt pleased him. This seems to be the most likely explanation for the advent of the "musical bow", the most ancient ancestor of all string instruments.

The sound produced by the bow must have been very soft as at first there was no resonating chamber to increase the volume. Ancient man probably first used his mouth as a resonating chamber in the same way as the Jew's Harp is played today. This theory is supported by a prehistoric painting found in a cave at Ariège in France which depicts a hunter chasing an animal and holding a bow to his open mouth as if trying to cast a spell on the animal. (3) The next obvious step was the addition of a resonator to the bow for which a tortoise shell or a gourd could be used.



A classic Greek myth tells of Hermes making an instrument out of a stick, tortoise shell and cow-gut for strings. Much more recently, about 300 B.C. till 400 A.D. the Greeks

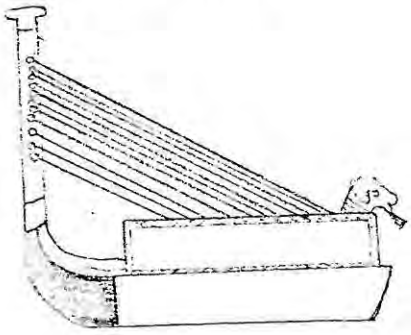
referred to their lyra as chelys which means tortoise and the Romans called a similar instrument testudo which means turtle.

As man's music system developed he began to use more and more tones of different pitch which resulted in an increase in the number of strings attached to the bow and the instrument now becomes known as a "Bow-shaped Harp". A Sumerian votive plaque from Khafaje dated the first half of the third millenium shows a bow-shaped harp with fine strings being played by a standing figure. (4)

The strings may be attached to a small resonating chamber at the bottom of the bow:

but unfortunately this is not quite clear from the plaque.

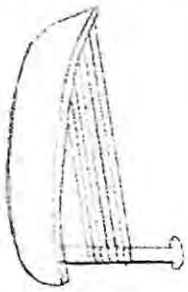
Excavations in the Sumerian city of Ur resulted in the finding of a harp which dates back to the time of Queen Shub-ad, i.e., about 2 500 B.C. (5)



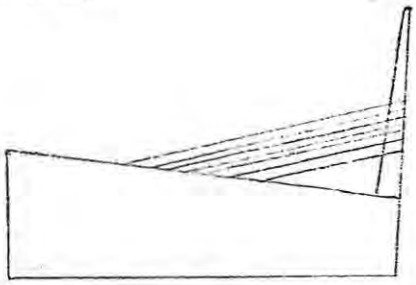
This instrument, known as "Queen Shub-ad's Harp", is clearly a descendant of the bow-shaped harp found at Khafaje. The number of strings used has increased to eleven and the size of the soundbox has increased considerably. Another interesting point is that the instrument consists of a separate neck and soundbox, doing away with the continuous curve of the older bow-shaped harps. The soundbox was ornamented with gold and other inlays and had a bull's head attached to the front.

During the early second millenium Babylon began to gain control over Mesopotamia and the Great Babylonian Empire was founded by King Hammurabi in about 1 800 B.C. The result was that most of the Sumerian culture was absorbed by Babylon.

Small Babylonian figure-plaques dated about 1 800 B.C. show instruments similar to the Sumerian harp being used. The first one found at Eshnunna, as an oval soundbox which is held vertically by the player. (6)



The second one has a more square soundbox which is being held horizontal to the ground.

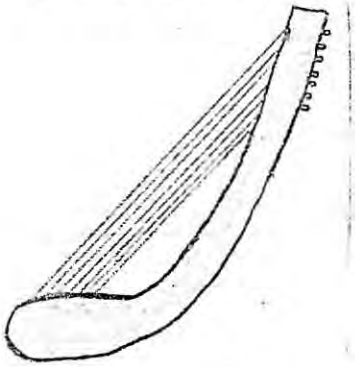


Both these instruments use seven strings and the size of the soundbox is even bigger than that of "Queen Shub-ad's Harp".

There seems to have been a more or less parallel

development of string instruments in Egypt over this same period. But the development of harp type instruments into guitar type instruments is more evident in Egypt than in Babylon. This was due to the Egyptians belief in life after death. They would bury the worldly belongings of the departed with them to ensure pleasure in their future existence. Reliefs and wall paintings are also found on the inside of many tombs.

Many of these reliefs dating back to 2 700 B.C. show a large bow-shaped harp being played. (7)

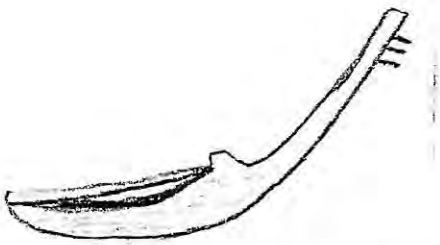


The great number of reliefs depicting this instrument indicates its popularity at the time. The bow was quite thick and broadened at the base to form a small resonating chamber. Most reliefs show this instrument as having six or seven strings and being about one and a half meters long.

This bow-shaped harp then proceded to develop in two main directions. The one was to a more advanced type of harp of about the same size, and the other towards the shape of a guitar, i.e., a smaller instrument with a neck horizontal to the resonating chamber.

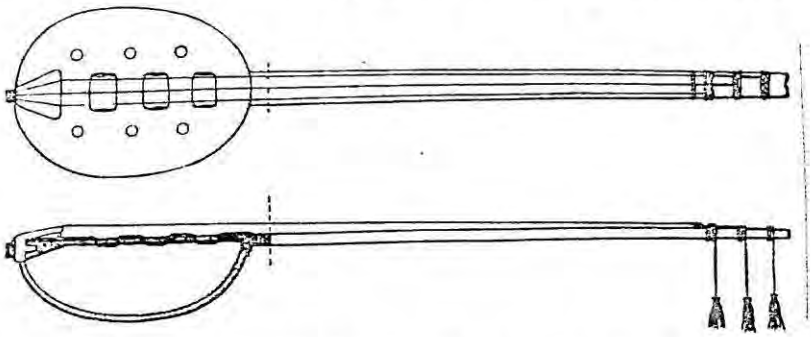
A bow-shaped harp from about 1 900 B.C. was found at El Assiri in Thebes. It is the same as its ancestor and uses six strings but is smaller. The soundbox at the base of the bow was covered with a drumhead of rawhide. Other similar instruments use five strings, two of which were double strings being the first ever evidence of the use of double stringing.

It seems that in about 1 600 B.C. it was first realized that the pitch of a note could be changed by stopping the string against the neck and that the lower the neck, the easier it was to stop the string. Because more notes could be obtained from each string, the number of strings on the instrument could be decreased. An instrument from about 1 600 B.C. has followed all these developments. (8)

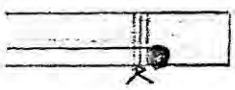


It is smaller than the "El Assiri" harp, used only four strings and the neck is only about fifteen degrees from the horizontal. Its soundbox was also covered with rawhide.

The gradual lowering of the neck culminates in the "Har-mosĕ" instrument dating from about 1 500 B.C. (9)



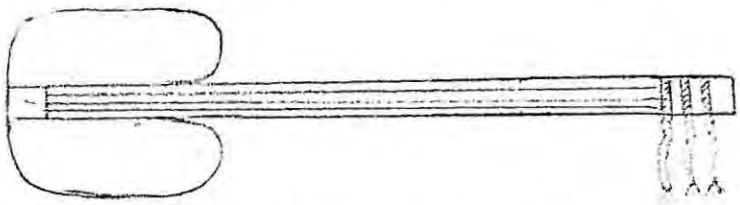
Har-mosĕ was a famous musician of 1 500 B.C. and this, his instrument, was buried with him when he died. It has a perfectly straight neck which was separate from the soundbox. The neck was passed through slits in the rawhide which covered the soundbox. The rawhide also had six small sound holes. At the one end of the neck is a small bridge to which the three gut strings were attached and over which they passed. The strings were held at the top of the neck by tying a knot of linen at the end of the string and winding rope tightly around this against the neck.



The soundbox is oval and a plectrum is attached to the instrument with a cord. Many wall paintings from the fifteenth century B.C. show musicians playing both the now more elaborate harp and the Har-Mosĕ type instrument, i.e., this painting from the tomb of Nakht in Thebes dated about 1420 B.C.

It is now necessary to find a more general name for the Har-Mosĕ type instrument as it no longer falls under the category of harps, nor can it be called a guitar yet. Many different names have been given to these instruments from nefer to lute. But the most reasonable name seems to be that of tanbur. Michael Kasha defines a tanbur as being 'a long-necked string instrument having a small rounded or vaulted oviform or pear-shaped body generally with wooden soundboard and a long straight narrow neck'.

We have already noted the use of bow-shaped harps and later of "angular" harps in Babylon. The first evidence of a tanbur in Babylon is a clay relief found at Eshnunna dated at about 1 900 B.C. The detail of the relief is not very clear, but a better relief was found at Ishali from 1 800 B.C. (10)



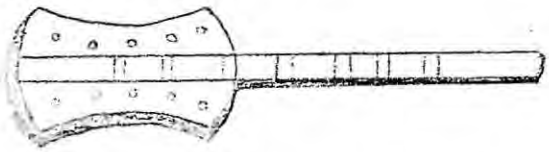
The detail of these Babylonian tanburs is not as clear as the Egyptian tabur but what is noticeable is the use of knots and

tassels to hold the strings in place, that there were two or three strings and that there was a definite separate neck and body. These instruments also seem to have been made in various sizes.

No trace of any "transition instruments" between the harp and the tanbur have been found in Babylon as they were in Egypt so we can only assume that the same lowering of the neck process took place in Babylon.

From about 1 500 B.C. Egypt controlled almost the whole of the Near East except for the Hittites and Assyrians. This resulted in the importation of Babylonian instruments to Egypt, e.g., an Egyptian relief from the tomb of Patenemhab of 1 310 B.C. shows a musician playing a tanbur closer in construction to the Babylonian tanbur than the Egyptian tan tanbur. (11)

There is not much evidence of the musical instruments used by the Hittites. According to the archeologists this is mainly due to the climatic and geographical conditions. But a remarkable stone carving found at the city gates of Alaja Hüyük dated at about 1 300 B.C. shows an instrument more like a guitar than a tanbur and which is therefore called the "Hittite Guitar". (12)



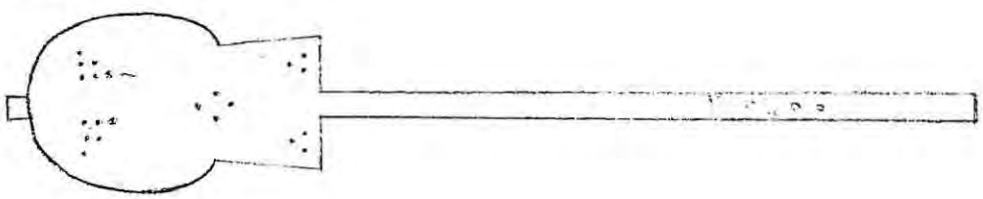
Two tassels hanging from the end of the neck indicate that it had two strings attached to the neck in the same way as with the tanburs of Egypt and Babylon , The neck runs through the full length of the body and uses a system of frets being the first evidence of the use of frets. The soundboard was probably wood and had ten sound holes. From the position of the "guitar" on the players chest, it would seem that the back was also flat. Another striking feature is the incurving of the sides. A plectrum was attached to the body of the instrument with a cord.

This was obviously a highly developed instrument, but no links with its past can be found. The amount of influence from the Babylonian instruments is also not clear but it is known that there was not a lot of cultural exchange between the Babylonians and the Hittites.

From about 300 B.C. the Hellenistic Empire was in control of most of the Near East including Egypt and Babylon. The favourite string instruments of the Greeks were the lyra and kithara, both of which were types of harps. However there are a few examples of instruments of the tanbur type. A relief from about 320 B.C. called The Mantinea Base shows a young woman playing a tanbur. (13)

Unfortunately this relief has been damaged and so some of the detail of the instrument has been lost, but certain distinctive features can be seen. The body seems to be triangular almost coming to a point in the middle of the back. At the shoulders of the body are definite cusps and the head of the neck has a double fan design. Neither tuning pegs nor strings can be seen but Greek literature occasionally makes mention of a three string instrument which may have been this tanbur. Due to the unique shape of the instrument we can assume that it is for the most part a native instrument of Greece.

In about 100 B.C. the Romans conquered the Greeks and by 180 A.D. the Roman Empire had control of the Near East, the Mediterranean lands and most of Europe. A guitar-type instrument dating from the Roman period was found in Egypt. (14)

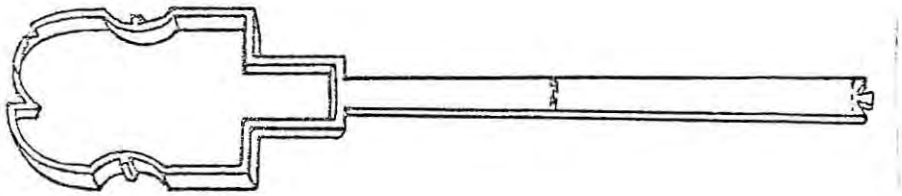


Certain aspects of this instrument show the possible influence of the "Hittite Guitar" on the Egyptian tanbur. The Hittites and Egyptians had been at war for many years but had made peace in 1 271 B.C. after which cultural exchanges took place. The body of the Roman period instrument has slightly incurved sides and a wooden soundboard which has five groups of small sound holes, one of which is in the centre of the soundboard where the sound hole of the modern guitar is located. The section of the neck furthest from the body is cylindrical as in the older Egyptian tanbur. About half way down the neck are four holes which probably held tuning pegs. From these holes to the body the neck is flat so as to provide a finger-board.

In Rome itself the situation as regards guitar type instruments was similar to that which we found in Greece, i.e., the popularity of the lyra and kithara with only a few examples of a tanbur. A Roman sarcaphagus now in the British Museum dated at about 300 A.D. is ornamented with a carving of a musician playing a Roman tanbur. (15)

Once again certain distinctive features are worthy of special note. The instrument has a very thick neck at the head of which is a semi-circular three painted decoration. Four tuning pegs are stuck through the neck in the same way as with the Egyptian Roman period instrument. The shape of the body is similar to that of the older Egyptian tanbur.

The Roman tanbur can be considered to be a European instrument and all further development of guitar type instruments took place in Europe except for one important instrument found in a tomb at Qarara in Egypt dating from the Coptic period (about 450 A.D.). (16)



This "Coptic Guitar" is a further development of the Roman period guitar. It has a flat back and definite sides. The curves in the sides are deeper and now similar to those of the modern guitar. The Soundboard is lost but was probably similar to the Roman period instrument with the same grouping of the sound holes. The instrument used four strings and the three points at the head of the neck are similar to the decoration found on the Roman tanbur.

NOTES

1 G. Bazin, A Concise History of Art, Part I, p.17.
2 P. Hamlyn, The Ancient World, p. 12.
3 G. Brace, The Story of Music, p. 4.
4 A. Parrot, Sumer, p. 132.
5 A. Bellow, Illustrated History of the Guitar, Prologue.
6 A. Parrot, Sumer, p. 292.
7 S. Lloyd, The Art of the Ancient Near East, p. 76.
8 A. Bellow, Illustrated History of the Guitar, p. 18.
9 A. Skira, Egyptian Painting, p. 33.
10 A. Bellow, Illustrated History of the Guitar, p. 5.
11 A. Bellow, Op. cit., p. 24.
12 M. Kasha, A New Look at the History of the Classic Guitar, p. 5.
13 F. Grunfeld, Art and Times of the Guitar, p. 8.
14 A. Bellow, Illustrated History of the Guitar, p. 26.
15 M. Kasha, A New Look at the History of the Classic Guitar, p. 8.
16 A. Bellow, Illustrated History of the Guitar, p. 26.

C H A P T E R I I

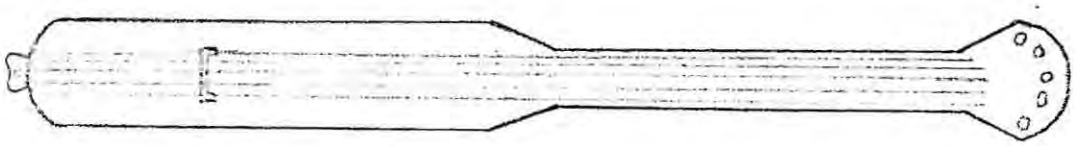
EUROPE BEFORE 1 500 A.D.

The development of string instruments in Europe before 1 500 is characterized by three main aspects.

1. The fusion between the instruments of the Near East with the native instruments of Europe.
2. The lack of standardization between instruments resulting in some confusion as to which family as instrument might belong.
3. The lack of information and details of instruments found in drawings, paintings, sculptures, etc.

This seems to have been a time of experimentation resulting in considerable development.

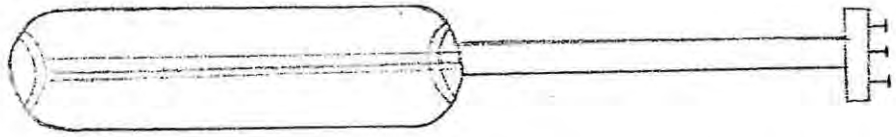
We have already noted the Roman tanbur of about 300 A.D. which seems to be partly a native instrument of Europe. From the ninth century comes evidence of an instrument called the "Carolingian" instrument. (1)



A Psalter from the ninth century, now in Stuttgart, shows several pictures of this instrument as does another manuscript of 926 called the "Commentarius Super Apocalypsum". The most interesting details of this instrument are firstly that the body is rectangular and of equal length to the neck and secondly that it has a rounded head which holds four or five tuning pegs (the instrument having the same number of strings accordingly). The difference in shape of the Carolingian instrument to that of the tanbur of the Near East together with the fact that the earliest examples of the Carolingian instrument appear in Northern Europe can only lead to the conclusion that the Carolingian instrument was a native instrument of Europe which developed, at first, free of

Eastern influence. None of the drawings show any sound holes on the instrument and the sides of the body are straight. The drawing from the Stuttgart Psalter clearly shows an arched bridge near the middle of the body. The total length of the instrument is comparatively long (almost the same length as the height of its player).

Another instrument of the "Commentarius" shows some differences.



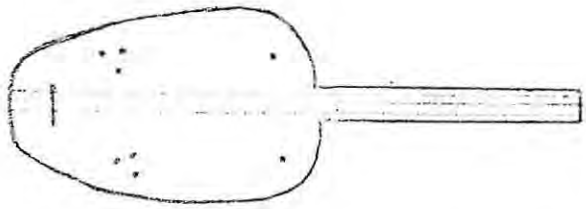
It has three strings and a thinner neck which is more clearly differentiated from the body. The shoulders are rounded off giving the body an oval shape. The strings are attached to three pegs which are in a "T" shaped head and are shown protruding horizontal to the neck. They may well have protruded out the back of the head, but were drawn as shown by the artist to indicate their existence.

Both the above instruments are always shown being plucked with the fingers or a plectrum, but a page from the same manuscript shows an instrument of slightly different shape being played with a bow.

Its body is squared off at the end and the shoulders taper off into the neck.

All three of these Carolingian instruments are obviously the result of centuries of development of which there is not trace.

A French Psalter from the time of Emperor Lothar (early ninth century) shows an instrument shorter than the Carolingian instrument. (2)



No head is shown in the drawing and the soundboard (or skin covering) has a pattern of small sound holes.

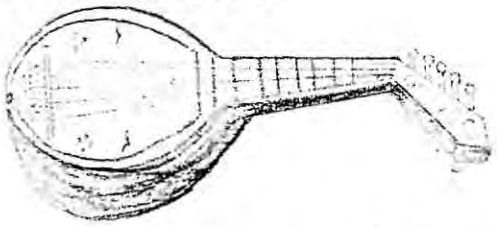
A drawing of another interesting instrument is to be found in the "Utrecht Psalter" from the ninth century. (3)

The most outstanding feature is the half-moon shape of the body. The head of the instrument is shown as being the same as that of the bowed Carolingian instrument but the size relation between the body and neck is the same as that of the tanburs of the Near East.

We have already seen how conquests by the Greeks and the Romans, amongst others, influenced the development of guitar type instruments and their spreading to new lands. The most important such conquest of the European middle ages as regards this study was the Moorish invasion of the Iberian peninsula during the early part of the eighth century. Their cultural influence on Spain is unmistakable in the different art forms including music. The instruments which they brought from the Near East were introduced to Europe where they influenced the native instruments of the continent as well as those which had come to Europe from the Near East via the Mediterranean lands.

The most important of these instruments was the "Al-Ud". (4) The first evidence of an "Ud" is after the beginning of the A.D. era. This makes it a late starter when compared to the Eastern tangurs. The Ud came to the Arabs from Persia. The word "Al-Ud" in Arabic means the "branch"

of a tree and so the name obviously referred to the wooden construction of the instrument.



The Al-Ud was eventually to develop into the lute which became the most important fretted string instrument of the Renaissance. The word "lute" is even derived from Al-Ud. The most distinctive features of the Al-Ud are the oval, half pear shape of the body and the angle of the head to the neck both of which became distinctive features of the Renaissance lute.

Another instrument shaped like the al-ud but played with a bow was the rebec.(5) It was also an import from the Near East. It is first mentioned in German literature dating from the eighth century and the earliest drawings show it as having only one string, but it later became a three string instrument.

This rebec is generally considered to be a forerunner of the violin family which it certainly is, but there are certain examples of it "wandering" toward the guitar family. According to A.P. Sharpe the Spanish players of the thirteenth century played it by plucking rather than bowing thereby making it into one of the forerunners of the guitar.(6) Rebecs came in different sizes, e.g., a larger version was called the "Rebaba", an Arabian instrument which, under the influence of the Moors, had been in use in Spain since about the tenth century.

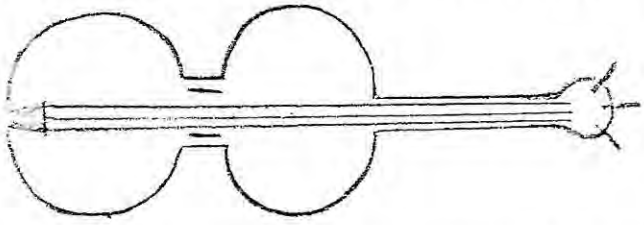
The manner in which an instrument was played, i.e., plucked or bowed, did not tie it to a particular family of instruments. Examples of this which we have already noted are the Caroligian instrument and the rebec. All through the middle ages are examples of similar instruments being

both bowed and plucked. A drawing from the "De Universo" by Hrabanus Maurus [7] shows an instrument similar to the rebec being played with a plectrum and is labelled by Reese as a "plucked viol".

The Spanish vihuela of the later middle ages, as we shall see, was both plucked and bowed. Even the famous "Hittite guitar" of 1 300 B.C. is to be found in the work "Precursors of the Violin Family", by K. Schlesinger. [8] It was not until the sixteenth century that there was a clearer differentiation between families of bowed and plucked instruments.

The original reason for the incurving of the sides of guitar type instruments is not known, but what is quite clear is that the "waisted" sides of the instruments made it easier to bow the strings resulting in the increased use of the incurving sides. Thus we can see the use of the bow during the middle ages as influencing the morphological development of the guitar by establishing the waisted body of these earlier instruments.

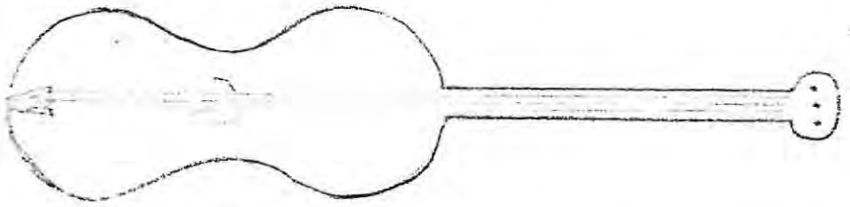
A manuscript of the "Commentary of St Jerome" dating from the early twelfth century shows a picture of a guitar type instrument with waisted sides being bowed. [9]



Galpin accords this instrument as being the earliest illustration of a viol in Europe. He also describes this viol as being 'the adaption of the bow to that guitar shaped instrument which was in use in oriental countries centuries before'.

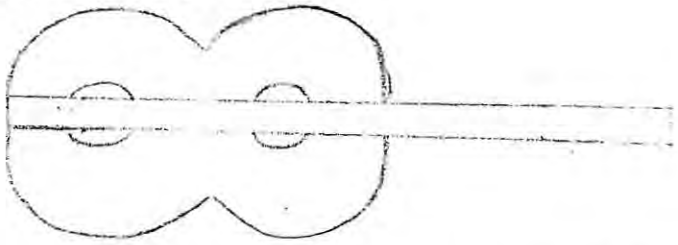
A similar instrument which also has a waisted body,

three strings connected to three tuning pegs in a rounded head and two sound holes, one on each side of the strings, was found illustrated in a passional from Zwifalten dated 1180. (10)



Grunfeld describes this instrument as being 'one of the earliest recognisable guitars in European art'. (11)

Yet another similar instrument is to be found in the form of a twelfth century sculpture on the cathedral of Saint-Denis in France. (12)



The essential differences are that the neck runs through to the end of the body and that the body contains four semi-circular sound holes.

A particular evolutionary change which we can note at this stage is the gradual decrease in the number of sound holes used and at the same time their increase in size. The Egyptian "Roman period" guitar had twenty two tiny sound holes. The three above mentioned twelfth century instruments had two or four larger sound holes leading towards the single larger sound hole of the modern guitar.

The spread and popularization of medieval musical instruments in Europe was greatly helped by the minstrels, jongleurs, troubadours and trouvéres. (13) Jongleurs and minstrels were active in Europe after the tenth century. They were concerned with the lighter side of music and with entertainment in general. They played a great variety of instruments including the string instruments with which this study is concerned. They also travelled all over Europe and

were not confined to any particular country. The troubadours and trouvéres on the other hand were mostly members of the nobility and did not travel to the extent of the jongleurs. They were only active for about two hundred years (1100-1300). The troubadours were active in the south of France and the trouvéres in the north. But there were also overflows into the north of Italy and the north of Spain.

Even before 1000 B.C., the "Missionaries of Civilization", the Phoenicians, had sailed as far afield as Spain, Britain and West Africa and were the masters of trade in the Mediterranean. The result of the establishment of these trade routes over the centuries was the importation of Eastern culture to the Mediterranean lands of Europe. In this way the string instruments of the Near East were introduced to the southern France region known as Provençe where they were adopted by the troubadours.

The principle instruments of the troubadours was the "viol". It has already been noticed that the viol was a bowed guitar type instrument. It was favoured for its versatility, e.g., it could be plucked or bowed, it could accompany songs or play solos, it had a wide compass and was portable.

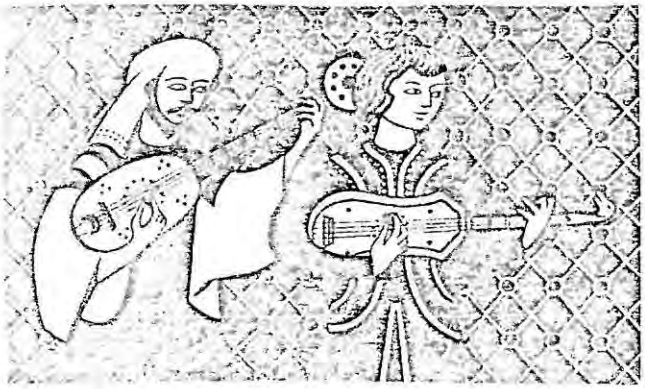
The art of the troubadours and their instruments spread to the trouvéres in the north of Europe. During the age of the troubadours, Catalonia, now a province of Spain, was more closely linked with Provençe than with Spain. The introduction of troubadour instruments to Catalonia was thus inevitable as was their later adoption by the Spanish troubadours.

Probably due to the spread of troubadour art, a guitar type instrument appeared in England called a gittern (or more correctly gitter). (15) It is first found mentioned in the Ormesby Psalter of the thirteenth century. It had four pairs of gut strings attached to a tail piece and was always played with a plectrum. This instrument was an

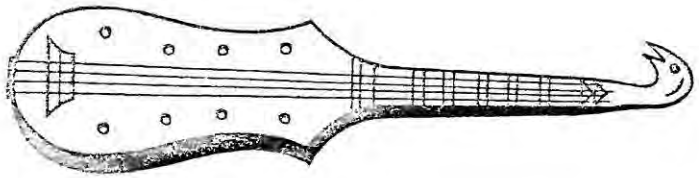
off-shoot from the mainstream of guitar development and therefore played no particular part in that development. By the late sixteenth century it was ousted by the popular five course guitar which had developed in Europe and never recovered from the blow.

Probably the most important instrument from the middle ages in the history of the guitar is the "Guitarra Latina". Its counterpart was the "Guitarra Morisco". (16) A famous collection of Spanish songs known as the "Cantigas de Santa Maria", compiled by Alfonso X the "Wise" (completed in 1270), contains illustrations of both the latina and morisco instruments. Other evidence is to be found at the Santiago de Compostela Cathedral in Spain which was built from 1078 till 1211. Of particular interest is its "Gate of Glory" on which are carved many different types of instruments which were in use at the time including the guitarra latina and morisco.

A clear distinction is always made between these two types of guitar. The guitarra latina is shown in the Cantigas as being played by a fair skinned youth in Spanish dress while the guitarra morisco is shown being played by a dark skinned Arab in Moorish dress.

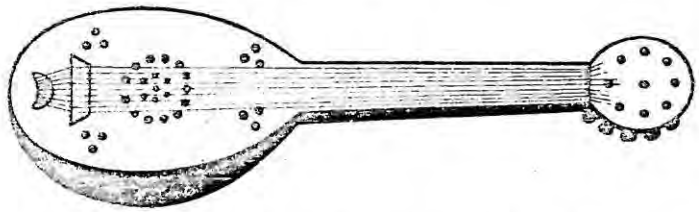


"Latina" as the name given to the indigenous population of the European Mediterranean lands. According to the musicologist Karl Geiringer, the guitarra latina originated from these regions and was therefore also named "latina".



The lower part of the body is shaped the same as that of the modern guitar but the cusps at the shoulders are reminiscent of those of the Greek tanbur. The body has a flat back and waisted sides. Of particular interest is the pattern of the sound holes which resembles that of the "Hittite Guitar", the only difference being that the Hittite instrument had six holes on each side of the body while the guitarra latina had only four on each side. The latina instrument has a fretted neck and the four strings pass over a bridge to be fixed to the end of the body. It was this instrument that was eventually to develop into the modern guitar.

The guitarra morisco (also called "Guitarra Saracenica") was undoubtedly a moorish import. An Arab living in Spain was known as a "morisco".



It is usually shown as having from five to nine strings attached to tuning pegs in a round head. The body is similar to that of the al-ud in that it is oval and half pear-shaped with an elaborate pattern of small sound holes on the soundboard and about an equal number of strings.

It has become necessary at this stage to define more clearly the shape required for an instrument to be categorized as a guitar.

A guitar is a stringed instrument having a long fretted neck and a waisted body with a flat back and soundboard connected by sides vertical to the back and top.

From this definition it is clear that the morisco instrument should not be called a guitar at all. In fact it was closer to the lute family and gradually began to disappear as the lute became more popular in Europe.

The latina and morisco instruments were not only used in Spain but also in Europe to a certain extent. During the fourteenth century Duke Jehan of Normandy employed musicians who played the "Guiterre Latine" and "Guiterre Morische".

The most reasonable explanation for the linguistic origin of the word "guitar" comes from Michael Kasha.(17) In the languages derived from Sanscrit, "târ" invariably means "string". A prefix was added to the word "tar" according to the number of strings which the particular instrument had. The word for "two" in modern Persian is "do" and the two string folk instrument used there is called a "dotar". In the same way "se" means "three" so that the "setar" or "sitar" is a three string instrument found in Iran. "char" means "four" and the "chartar" was a four string instrument found in Persia and Old Spain.

Often an instrument, due to further development, would obtain more strings than it had when originally names. The name would not change through and so the original meaning of the prefix was lost.

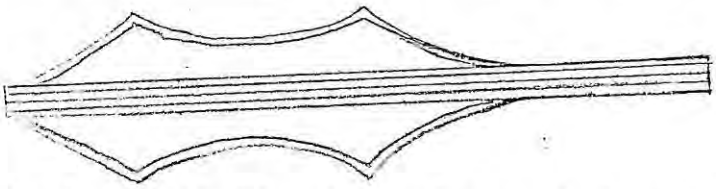
With the diffusing of instruments into new regions with different languages the name of an instrument became corrupted and changed. The "chartar" of Persia became the "qitharo" in Arabic which then became "quitarra" in old Spanish, "chitarra" in Italian, "guitarra" in modern Spanish and "guitar" in English.

Another example of a name changing with time and diffusion into new countries is found in the linguistic origins of "viola" and "vihuela".(18) The beginning of this development was with the Roman "fidicula" which literal-

ly meant "strings". This was the Latin word, the Low Latin being "vitula". This became "vielle" in French, "viula" in Provencal, "viola" in Italian, "fiedel" in German, "fiddle" in English and "viuela" in Old Spanish which became the essentially guitar type instrument of the Renaissance called the "vihuela".

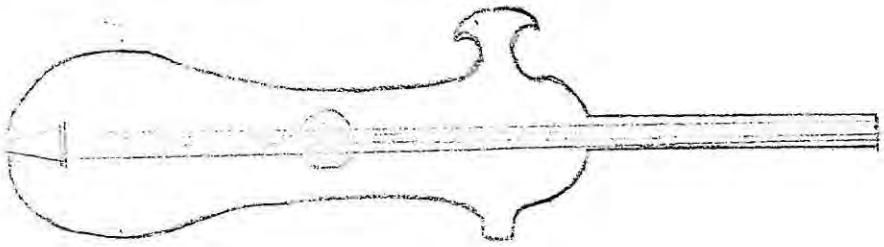
The original meaning of the name vihuela during the later middle ages in Spain was more general. Vihuela was the name given to all kinds of string instruments with a neck. If it was played with a bow it was called "vihuela de arco", with a plectrum "vihuela de pendola" or with the right hand fingers "vihuela de mano". The three above forms of vihuela are all mentioned in writings by the Archpriest of Hita during the fourteenth century. During the Renaissance, however, both the vihuela de arco and vihuela de pendola had fallen into disuse and the most popular instrument was the vihuela de mano, an instrument which will be discussed in some detail in the next chapter.

Two instruments dating from about the thirteenth century, are at Rheims Cathedral and the other at Cologne Cathedral, show a body shape similar to the guitarra latina. (19)



Not much detail is available from the sculptures but the most important features are the painted shoulders as with the guitarra latina and similar paints on the lower bout.

Another instrument showing similarities to the guitarra latina is to be found in the English manuscript known as "Queen Mary's Psalter" (1310 - 1320). (20)



This instrument retains the rounded lower bout of the guitarra latina but has a rather strange arrangement at the shoulders as seen above. A possible explanation for the shape of the upper shoulder is that a strap or chord was tied to it and to the knob at the end of the body thus enabling theplayer to hang the instrument around his neck. The lower shoulder may have been squared off so that the instrument could be laid on its side when not in use without bumping its tuning pegs. The instrument had four strings as did the guitarra latina but had a single, large, ornamented sound hole in the middle of the soundboard.

The similarity in origin of the modern guitar and violin families is particularly evident towards the end of the middle ages. A sculpture dating from about 1400 is to be found at the cathedral of Toledo in Spain. (21)

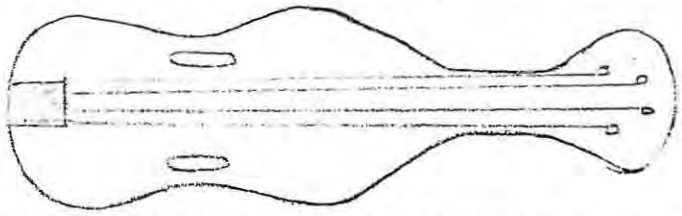
This instrument has both the single sound hole of the guitar and the "f" holes of the violin. The shape of the curves in the side of the body is approximately the same as that of the "Coptic guitar" found in Egypt a thousand years earlier. The head of the instrument is similar to that of the modern guitar and the total size is about half way between that of the violin and guitar. It is shown being held on the front of the player's body like a guitar and is being played with the fingers and not a bow.

Another similar instrument dating from about 1430 is shown being played with a bow. It is an Italian painting from the "Coronation of the Virgin". (22)

Kinsky calls this instrument a "guitar-fiddle". The shape of the waist curves is similar to that of the modern guitar

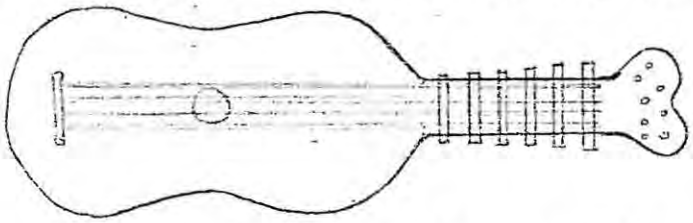
but it still has both the violin "f" holes and the guitar sound hole.

The last two mediaeval instruments of interest are from Germany and Italy. The German minnesinger manuscript called the Manasse manuscript dating from the fourteenth century shows most of the instruments used by the minnesinger. One of these is a guitar type instrument being bowed. (23)



This instrument seems to be a descendant of the Carolingian instrument of the ninth century. If this is so then the Carolingian instrument has become shorter and the sides have given way to slight curves. The head is the same but it has two sound holes similar to those of the twelfth century instruments previously mentioned. It also has the same number of strings as the guitarra latina, i.e., four.

Another instrument basically the same shape and size but with some essential differences is shown on certain fifteenth century Italian prints called the "Tarocchi Cards". (24)



The instrument has four double strings though only six tuning pegs are shown. It does not have a tailpiece but the strings are attached to a bridge which is situated half way between the single sound hole and the end of the body as on the modern guitar. Probably the most striking feature is the use of six large movable frets (most likely wooden) which were clamped on to the neck. The more usual way of fretting an instrument at this time and before was to tie sections of gut around the neck.

From this stage in history the string instruments began to develop into definite families of instruments and the progress of the guitar can be studied more precisely along its mainstream of development.

N O T E S

1 F. Grunfeld, Art and Times of the Guitar, p. 19.
A. Bellow, Illustrated History of the Guitar, pp. 29 - 32.
G. Kinsky, History of Music in Pictures, p.

2 F. Grunfeld, Art and Times of the Guitar, p. 19.

3 G. Kinsky, History of Music in Pictures, p.

4 M. Kasha, A New Look at the History of the Classic Guitar, p. 5, Guitar Review, No. 30.
G. Reese, Music in the Middle Ages, p. 246.
T. Baines, The Lute. Musical Instruments through the Ages, pp. 157 - 8.

5 A. Sharpe, Story of the Spanish Guitar, p. 6.
F. Galpin, Crawd, Rebec and Viol: Old English Instruments of Music, p. 59.

6 A. Sharpe, Story of the Spanish Guitar, p. 7
Sharpe tells of how the church of Spain banned the rebec. The people though, not wanting to loose their instrument, did away with the bow which was one of its distinguishing features and continued to play it (by plucking).

7 G. Reese, Music in the Middle Ages, Plate, IV.

8 F. Galpin, Gittern and Citole, Old English Instruments of Music, p. 16.

9 F. Galpin, Crawd, Rebec and Viol, Old English Instruments of Music, p. 64.

10 F. Grunfeld, Art and Times of the Guitar, p. 21.

11 The two sound holes could possibly be one large on under the strings. This is not clear.

12 A. Bellow, Illustrated History of the Guitar, p. 39.

13 P. Scholes, Minstrels, Troubadours, Trouvéres, Oxford Dictionary of Music.
F. Grunfeld, Art and Times of the Guitar, p. 69.
A. Bellow, Illustrated History of the Guitar, pp. 43, 46.
G. Reese, Music in the Middle Ages, pp. 203-5.
D.J. Grout, History of Western Music, p. 59.
D. Stevens, The Middle Ages: A History of Song, pp. 18-19.

14 This is not to say that the viol was imported from the Near East as such, but that it was the result of inter-influence between European instruments and those imported via the trade routes of the Mediterranean.

15 F. Galpin, Cittern and Citole, Old English Instruments of Music, p. 16 ff.

T. Baines, The Fretted Instruments, Musical Instruments through the Ages, p. 167.

16 A. Bellow, Illustrated History of the Guitar, pp. 40-41.

F. Grunfeld, Art and Times in the Guitar, pp. 69-70.

G. Chase, Early Masters of the Guitar, Music of Spain, p. 51.

A. Sharpe, Story of the Spanish Guitar, p. 8.

G. Reese, Music in the Middle Ages, p. 326.

M. Kasha, Morisco Instruments and the Guitarra Latina, pp. 9 and 11, Guitar Review No. 30.

F. Galpin, Old English Instruments of Music, p. 16.

17 M. Kasha, Linguistic origins: A new look at the History of the Classic Guitar, p. 4, Guitar Review, No. 30.

18 G. Chase, Early Masters of the Guitar, Music of Spain, p. 52.

F. Grunfeld, Art and Times of the Guitar, p. 51.

M. Kasha Guitar and Vihuela in the Renaissance, p. 11, Guitar Review, No. 30.

19 F. Grunfeld, Art and Times of the Guitar, p. 24.

20 F. Grunfeld, Art and Times of the Guitar, p. 26.

21 A. Bellow, Illustrated History of the Guitar, p. 50.

22 G. Kinsky, A History of Music in Pictures, p. 68.

23 G. Kinsky, A History of Music in Pictures, p. 47.

24 F. Grunfeld, Art and Times of the Guitar, p. 29.

C H A P T E R I I I

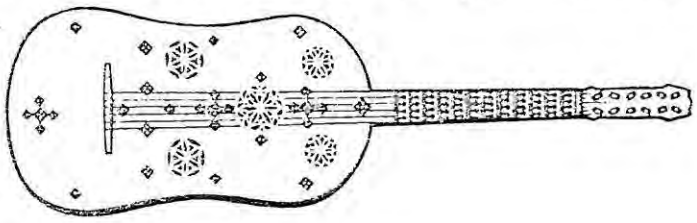
THE SIXTEENTH AND SEVENTEENTH CENTURIES

The general style of musical composition during the late Middle Ages was gradually changing from the contrapuntal to the harmonic style. This evolution of style culminated in the very harmonic writing of the eighteenth century. The natural result of this was the increased use of instruments which could play harmonically such as the vihuela, lute, four course guitar and the later five course guitar.

The early sixteenth century saw the composers taking more interest in composing for instruments instead of concentrating on vocal music as before. The vihuela and lute were composed for as serious instruments while the four course guitar was merely strummed as a folk instrument by the peasants.

The lute emerged as the most popular instrument in Europe during the Renaissance. That is except in Spain. It has been suggested that the Spanish did not take to the lute because of its Moorish origins. Spain was under Moorish oppression until about 1500.

The Spanish musicians, however, were not going to forfeit all connections with the lute music which was being composed and which they admired. The result was the development and subsequent popularity of an instrument which had the same number of strings as the lute and which were also tuned the same. The playing technique was the same as used on the lute and the music composed was in a similar style. The main difference was in the shape of the instrument which was basically the same shape as that of the guitar. This instrument was called the "vihuela de Mano" or just vihuela. (1)

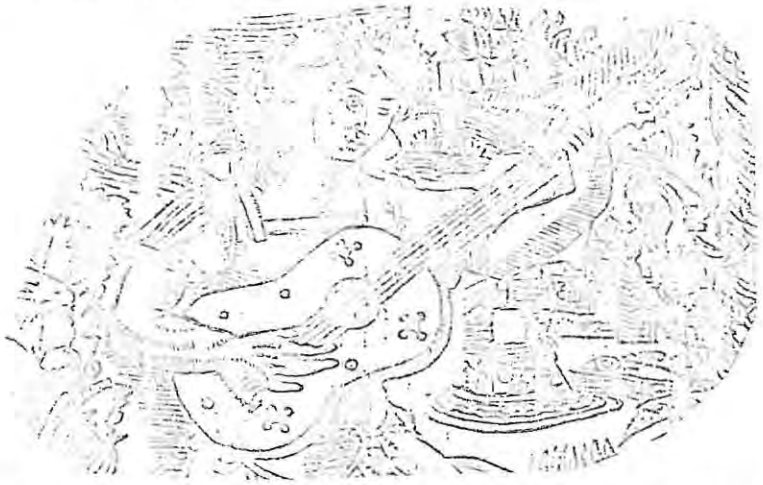


Because of the importance of the vihuela in the history of the guitar it would be worth while to give a detailed description of the instrument particularly as one such instrument is still in existence in the Museé Jacquemart-Anore in Paris. This vihuela was closely examined by Michael Prynne from whose account most of the following details are taken. (2)

This instrument has rather a shallow waist with the lower bout being only slightly bigger than the upper. The back is constructed of alternate strips of dark and light wood. This has resulted in cracks appearing due to shrinkage. These dark and light woods are used in the same way for the construction of the ribs which are narrow, giving the instrument a shallow body. The joints in the wood have been reinforced only with paper and linen and the back is reinforced with three hardwood bars. The soundboard is made of pine and is two to three millimetres thick and is reinforced with only two bars. Marks left on the soundboard indicate two previous positions of the bridge. The earlier position is further back making the string length about eighty centimeters while the more recent position gives a string length of about seventy six centimeters. The longer string length would have allowed for ten frets on the fingerboard and the shorter for nine. The frets consisted of sections of gut tied around the neck. The neck-body joint is reinforced with a substantial heel. Both the neck and head are decorated with the same combinations of strips of dark and light wood as the back. The head contains twelve holes though which passed the twelve tuning pegs which held the strings (six double courses). The rosettes which cover the five sound holes are cut from parchment and it is interesting to note that they are placed in the same position as those on the Roman period guitar.

'This instrument was obviously skilfully constructed but has a primitive design. Its unfamiliar appearance and decoration emphasises the independence of Spanish instrument makers of the sixteenth century'. - Prynne.

The cover of the work El Maestro by L. Milan (1535) shows an illustration of another vihuela with the main difference being that only the centre sound hole is used, the other four being more in the form of decorations.

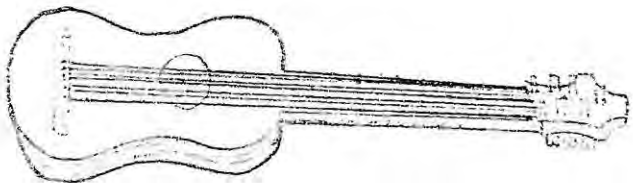


With the advent of the five course guitar during the sixteenth century, the vihuela gradually began to lose popularity. The last evidence of vihuela construction comes from about 1700. This instrument is very much closer in shape to the modern guitar. It has ten metal frets, a single oval shaped sound hole and a deeper waisting. (3)

Another instrument which emerged from the Middle Ages to become a favourite instrument of the populace was the four course guitar. It first became popular in Spain and was called "Vihuela de Cuatro Ordenes". It was a descendant of the guitarra latina and was very similar to the vihuela. Bermudo wrote during 1555 that the guitar was merely a vihuela without its two outer courses. The majority of these instruments had eight strings arranged into four courses of double strings but occasionally a four single string instrument was used.

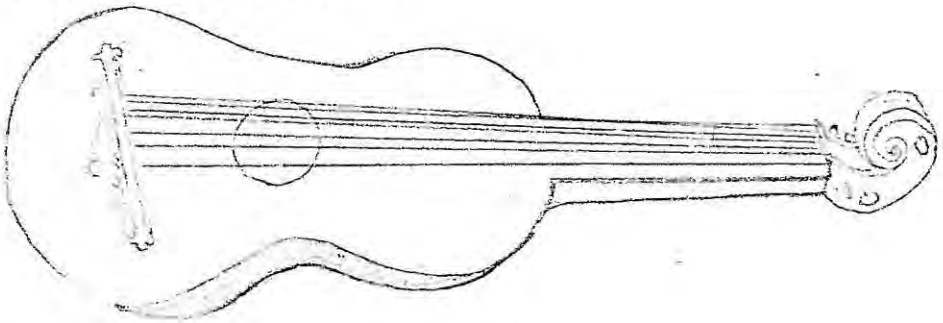
The vihuela never really crossed the border of Spain into Europe because of the popularity of the lute in Europe. But the four course guitar soon found its way into France, Italy and Germany. In Italy the number of strings was reduced by one. This gave three double courses and a single course for the top string which was called the "Chanterelle" or singing string.

The use of the chanterelle was probably adopted by the four course guitar after it had come under the influence of the lute in Europe. The lute also used a single top string, the rest being double. The idea of using the single top string was soon popular all over Europe as seen in the following illustration taken from the title page of "Le Premier Livre" by Granjon and Fezandat in Paris (about 1550). (4)



The most noticeable aspect of this instrument is how close it is to the modern guitar in shape. It has lost pointed shoulders and ornamented head of the guitarra latina. The soundboard does not have the ornamentation of the vihuela but only a single sound hole. The seven strings are attached to a bridge in the middle of the lower bout and a total of eight frets are tied around the neck.

Another four course guitar illustration is to be found in the series "Women Musicians" (1570) by the Swiss artist Tobias Stimmer. (5)

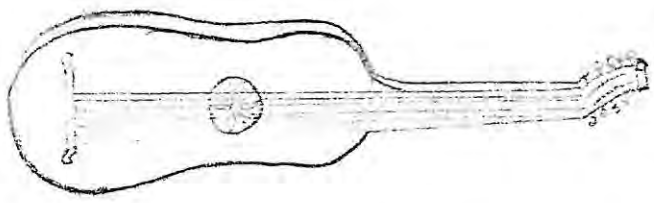


The main difference between this instrument and the "Livre" guitar is the head which in the latter instrument is in the form of a scroll similar to that of the violin. This reminds one of the similarities between guitar and violin during the later Middle Ages. Besides this, the instrument has fewer frets and a more ornamented bridge.

With the increase in popularity of the guitar in Europe there followed an increase in its status as a musical instrument. One example among many is of Filippo Carafa, a famous Italian lutenist who played both lute and guitar whereas before, a serious lutenist would hardly have stooped to the "vulgar guitar". (6)

As more serious musicians began to compose for and play the guitar they found that the range of the four course guitar was too limited for they had been used to the six course lutes and vihuelas. The result of this was the addition of an extra course making a five course instrument. In Spain a five course instrument had been used before though only occasionally so the movement can be thought of as both the increased use of the "Vihuela de Cinco Ordenes" (five course vihuela) and the addition of an extra course to the "Vihuela de Cuatro Ordenes" or the four course guitar as it was known in the rest of Europe. This addition of a course could again be thought of as the fusion of the six course vihuela with the four course guitar into the five course guitar because after the arrival of the five course instrument both the vihuela and the older guitar began to disappear.

The rise of the five course instrument was slower in Spain than in Italy probably because of the popularity of the vihuela in Spain. This could be the reason why the first evidence of the new five course guitar comes from Italy. Italy. (7)

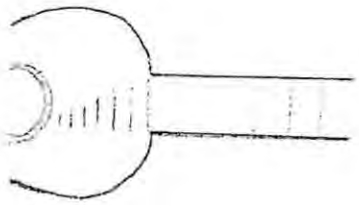


This engraving was done by M.A. Raimonoi (1480 - 1530) so we could date it at about 1500 to 1530. The body of this guitar is longer than usual and there are eleven frets on the fingerboard. The head is almost in the form of a scroll like that of the Tobias Stimmer illustration. Although the artist has not shown the number of strings accurately, it is

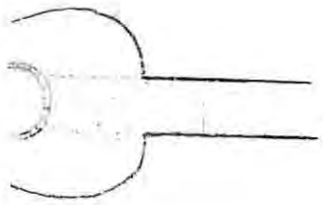
clear that the head has ten pegs allowing for five double strings. An interesting observation is the guitar case lying next to the player.

Another five course guitar, originally from Venice, is to be found in a Paris museum.(8) It is dated as coming from the late sixteenth century. It has a total of twelve strings arranged in five courses. The first two courses have three strings each and the next are double courses. The fingerboard has ten frets which seem to have been nailed into position. If this is so then we can assume that the frets were probably made of a hard wood. A particular feature of this instrument is the amount of ornamentation it has. The back and sides are striped, the head is covered with a design of marquetry in Persian style as is the fingerboard The sound hole is covered with an intricately carved rosette and it has a carved ornamental heel. The soundboard is completely covered with designs and inlays including the coat of arms of the House of Austria. This high degree of ornamentation was to become a common feature over the next few centuries. One can imagine that the ornamentation had a detrimental effect on the sound of the instrument and so they must have often been built merely as show pieces.

An Italian five course guitar dated at about 1600 shows one particular development.(9) The neck has eleven frets but thereafter another five frets are stuck on to the soundboard.



The fingerboard of the modern guitar is set slightly higher than the soundboard and it continues over the body to the sound hole and carries the extra frets.



With the instruments of the sixteenth and seventeenth centuries the fingerboard was set at the same level as the soundboard so that the continuing frets had to be stuck directly on to the soundboard.

An interesting instrument which was popular in Italy at this time was the "Chitarra Battente". (10) The Italian word "battente" means "to strike" so the name refers to the way in which the instrument was played, i.e., strummed. The body shape is characterized by a vaulted back, perhaps an attempt to copy the lute shape without losing the waisted shape of the guitar or perhaps an attempt to increase the sound of the instrument. The body is usually larger and the neck shorter than those of the then standard guitar. Another new feature was the sunken rosette. The strings usually pass over the bridge and are attached to pins in the end of the body. Besides these morphological differences, the chitarra battente was the same as the five course guitar and can be considered a slight off-shoot from the mainstream of development.

Most chitarra battente have frets made out of wood, ivory, metal or the older gut frets. A particular seventeenth century instrument now in the Boston Fine Arts museum has five courses, the top one being a single string chanterelle as used on the lute and four course guitar.

The most famous example of the French sixteenth century five course guitar is an instrument called the "Rizzio" (11) guitar. The period 1559 to 1561 saw Mary Queen of Scots as queen of France. This guitar was presented to her during her reign there. In 1561 the widowed queen returned to Scotland and in about 1565 she presented this guitar to her private secretary, David Rizzio, who was also a

musician. In 1566 Rizzio was murdered because his close relationship with the queen aroused the jealousy of her husband. Mary was later to be beheaded herself but luckily the guitar survived all this bloodshed and is still in existence today.

It is obvious from the Rizzio guitar that a very high standard of instrument making existed in France during the sixteenth century. This instrument was probably specially built for the queen and so an extra effort would have been made. At any rate this is a very elaborately and beautifully ornamented instrument. A present day luthier declared that it would take a year to construct the neck alone, let alone the rest of the instrument. The pegs are carved in the shape of the French "Fleur de Lys"

and sixteen of these emblems are inlaid around the soundhhole together with other decorations. Otherwise the soundboard does not contain any other ornamentation except for the carved bridge. The rest of the instrument is decorated with tortoise shell, ivory, mother of pearl and ebony. The neck has eleven metal frets and the instrument uses five double courses.

Unfortunately no sixteenth century Spanish five course guitars have survived through to today. But there is sufficient evidence to be found in writings and other literary sources to confirm its one time existence in Spain. The lack of instruments from this early stage is probably due to the fact that the vihuela was merely a six course guitar and held on to its popularity longer while in the rest of Europe the lute was found to be difficult to tune, difficult to play and a very delicate instrument and was therefore more easily ousted by the five course guitar which was more robust, easier to play and easier to tune.

The famous sixteenth century poet and musician Vincent Espinel (1551 - 1624) played the five course guitar and is credited as having increased its use and popularity in Spain. Some seventeenth century guitarists in their writings even attributed the invention of the fifth course to Espinel but incorrectly so. (12)

In 1596 Dr Juan Carles y Amat wrote a book called Guitarra Espanola y Vandola which was a simple method "for tuning and playing Rasgado the guitar of five courses". The instrument of which he wrote had four double courses and a single chanterelle giving a total of nine strings.

The five course guitar became the Spanish national instrument and was connected with Spain in the same way as the balalaika is associated with Russia and the bagpipes with Scotland today. This instrument, therefore, became known as the "Spanish guitar" throughout Europe.

The seventeenth century saw the guitar as an extremely popular instrument in Europe, particularly amongst the aristocracy. Even Louis XIV of France played the guitar and declared it was his favourite instrument. The result of this popularity was the increase in the number of guitar makers to meet the demand for instruments. Many of these "Baroque guitars", as they are often called today, are to be found in collections and museums.

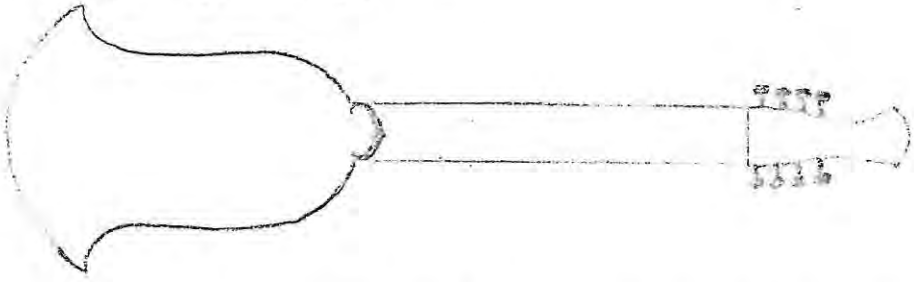
Probably the most important guitar maker during the seventeenth century was the German Joachim Tielke (1641 - 1719) who worked in Hamburg. Most of his best guitars have very elaborate designs for which he used ivory, tortoise shell, ebony, gold, silver, mother of pearl, etc. An interesting point is that he confined his ornamentation to back, sides, neck and head leaving the soundboard relatively free from extra material as the soundboard is all important in the production of the sound of the instrument. Therefore his instruments were not only beautiful to look at but also had a beautiful tone.

One of his instruments which has the inventory number 1626, shows extracts from Genesis which are carved in ivory all around the sides of the guitar's body. (13) The back consists of alternate black and white stripes. The neck, the back of which is decorated with black and white checks, is relatively short and only contains eight frets. The instrument as it stands today has six strings but a careful study of the head and bridge show that it was originally constructed as a five double course instrument. An unusual feature is the way in which the soundboard slopes down from the horizontal after the bridge.

This is a feature more commonly found in the Italian chitarra battente.

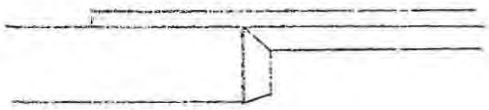
Tielke did in fact actually make battente instruments as well. One of these is in the Victoria and Albert Museum. The back of the neck of this instrument is covered with a design of flowers and as most of his guitars have designs of flowers they might be considered as one of his trade marks. (14)

In an instrument called the "Wuiterna", Tielke breaks away from the usual guitar shape giving the instrument an almost bell shaped body. (15)



This five course instrument had a total of eight strings giving three double courses and two single. It carries the date on which it was completed, viz., November 22nd, 1669 and has the inventory number 1539. Whereas most of the instru-

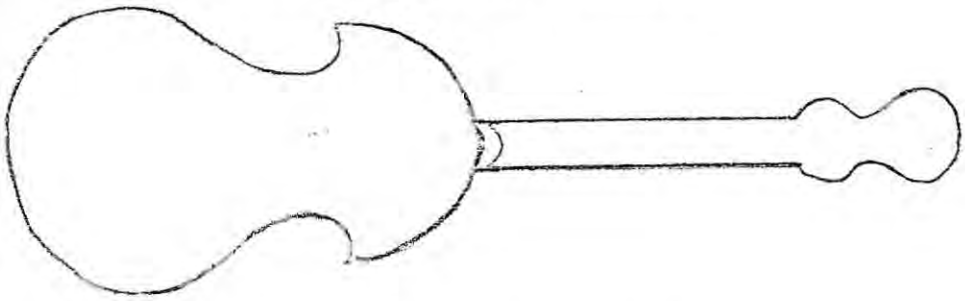
ments of this time had the fingerboard set at the same level as the soundboard, this quiterna has a raised fingerboard similar to that of the modern guitar.



To my knowledge this is the first ever use of the raised fingerboard.

Another German guitar maker who lived earlier during the seventeenth century was Jacobus Stadler. His earliest surviving guitar is dated 1624 and is of the battente type showing the amount of influence the Italian makers had on the rest of Europe.

Another variation from the conventional guitar shape comes from a Tyrolean priest, Father John of Apsam. This instrument reverts back to a certain extent to the pointed shoulders of the guitarra latina.

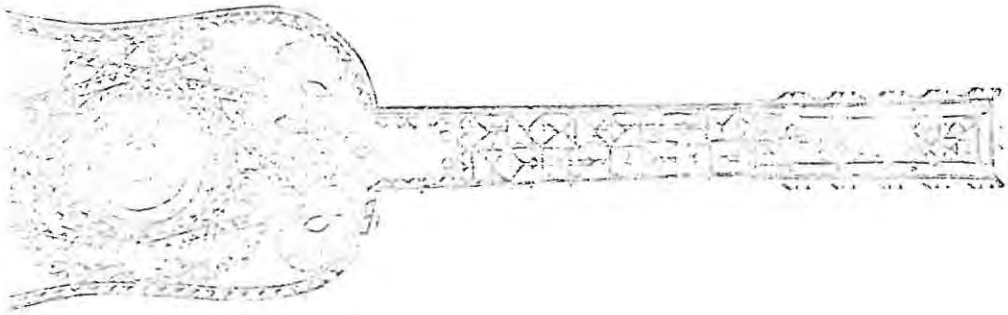


The back of this instrument is decorated with a crucifixion scene.

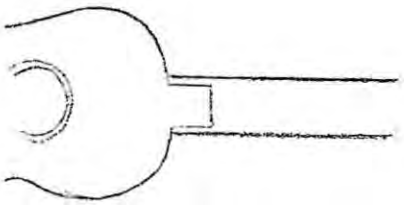
Seventeenth century Italy saw a great number of guitar makers active. One of these was Matteo Sellas who worked in Venice. He was of German origin and his instrument labels are dated between 1630 and 1641. Most of his guitars are of the battente type. One of the first (dated 1630) still has nine gut frets tied around the neck.(16) The fingerboard contains ivory plaques with engravings of Italian landscapes. His trade mark is the inscription of a small crown next to his name and sometimes he did not put his name to an instrument, just the crown.

He uses the idea of the ivory plaques on the fingerboard of another instrument as well. One of these depicts a scene of houses and trees. (17) It has a very short neck which contains only six frets, another four being stuck to the same soundboard. Yet another of his guitars has the ivory plaques on the fingerboard depicting characters from Aesop's fables. On some of his guitars the strings are attached to the bridge and on others they pass over the bridge and are tied to pins at the end of the body.

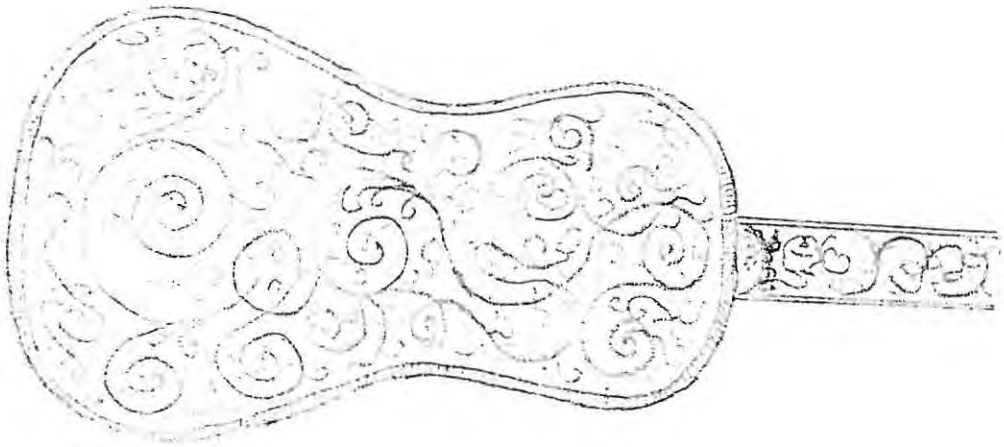
The brother of Matteo Sellas, Georgio Sellas, also worked in Venice over the same period. Georgio's guitars are a lot more elaborately decorated than those of his brother. A good example of his ornamentation is in a chitarra battente of 1641. (18)



The ornamentation is in mother of pearl and dark wood. It has an intricate rosette which is sunken into the body in tiers which was a common practice at the time especially in the more elaborate guitars. Another common practice was to extend the soundboard into the neck, flush with the fingerboard.



Georgio Sellas not only made chitarra battente instruments but also those of the standard Spanish guitar shape. One of these is now in a Prague museum and shows a very elaborately decorated back. (19)



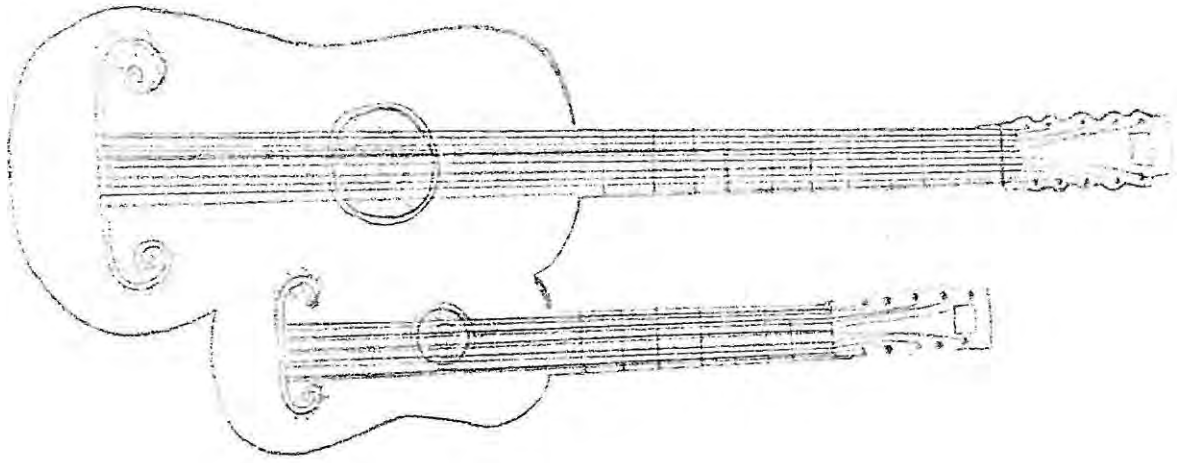
The back and sides were silvered over and then the designs painted on in black paint.

The most important instrument maker of the Italian seventeenth century was Antonio Stradivarius (1644 - 1737) who is best known for his violins, violas and 'cellos. But he also made guitars, two of which are known to us today. Both these instruments date between the years 1670 - 1690, a period during which he built very few instruments and it is believed that these twenty odd years were used by him for experimentation. (20)

That Stradivarius was particularly concerned with the tone of his instruments is evident in his guitars. He did away with all ornamentation except the small inlay around the soundhole as on the modern guitar. One of these instruments, now in the Ashmolean Museum in Oxford, England, is dated 1680. (21) It has a plain soundboard, back and sides and a carved rosette over the sound hole. This is in contrast to the elaborate ornamentation of the other seventeenth century guitars. Both his guitars are of the Spanish type with the usual five double courses. His other guitar is dated 1681. The soundboard is made of pine and the back and sides are of rosewood. Because of the quality of these guitars it is obvious that he must have made others before them, but these have not yet been discovered.

The seventeenth century French guitar makers are represented mainly by the Voboam family. The most important maker being René Voboam. An instrument of his dated 1641 is to be found in the Ashmolean museum in Oxford.(22) It is of the Spanish type and is very similar to the Stradivarius guitar in shape and the elegant plainness of the soundboard. The design on the back and the purfling around the sides, on the other hand, are very similar to those of the Rizzio guitar.

A relative of René who worked in Paris was Alexandre Voboam. One of his guitars made in the Spanish style and dated 1690 is now in a Washington museum.(23) The only noteworthy point is the instrument's simplicity and the lack of ornamentation. Another unusual instrument built by Alexandre is his "twin guitar" of 1696.(24) It consists of two five course Spanish guitars, one half the size of the other, whose bodies are built into each other.



The tradition of guitar making in the Voboam family was carried on by Alexandre's son, Jean.

In the meantime, the guitar had made its way into other East European countries. A Czech, named Andreas Ott, who worked in Prague made guitars of the Italian chitarra battente type. Other Czech guitars from unknown makers show an attempt to add a single chanterelle to the five course chitarra battente making a six course guitar with five double courses and one single.

The guitar was also introduced to Poland during the seventeenth century but the makers are not actually known. The most important Polish guitarist was Jakob Kremberg (born 1650) who worked in Warsaw mainly as a composer for the guitar.

The importance of the guitar in the social life of the seventeenth century is further illustrated by the number of paintings by famous painters of the time, e.g. Callot, Bocquet, Velazquez, Rombouts, Vermeer, Watteau, Lancret and many more who give the guitar a prominent place in their paintings. Most of the guitars depicted are of the Spanish type with the occasional battente instrument.

The paintings confirm the use of the five course instruments previously described. They further show all the uses to which the guitar was put. (25) "Balli di Sfessania" by Callot shows it being played by dancing clowns. "Dame en Habit" by Saint Jean and "Dame de Qualité" by Trouvain show ladies of the aristocracy posing with their guitars. The guitar was played in the coffee houses, e.g., "Le Caffé de Rome" by Bocquet. It was used by gentlemen to woo the ladies, e.g., "Amants Donnant une Serenade" by an anonymous Frenchman and "Scene D'Amour" by Watteau. Yet other paintings show that the lute had fallen into disuse due to the new popularity of the guitar. "Three Musicians" by Rombouts shows the guitar being played while the lute lies on the table unused and in "Musicians" by Rombouts the lute actually lies on the floor at the feet of the guitarist.

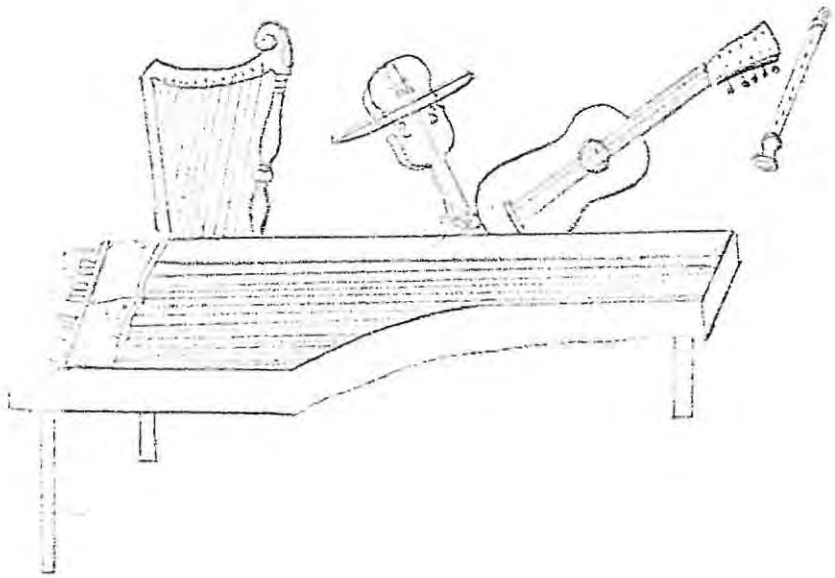
To end this chapter I will give a general description of the standard Spanish guitar which was in use in Europe by the end of the seventeenth century.

These instruments were slightly smaller than the modern guitar. They had five courses (five double or four double and one single) and the strings were tied to the bridge. The body had a longish appearance probably due to the waists not being as deep as those of the modern guitar. Generally there was a lot of ornamentation but the later

makers, realising the importance of the soundboard in the production of the tone, began to leave it relatively free of ornamentation. The head was about the same shape as that of the modern guitar except that it contained nine or ten pegs which were stuck directly through the head.

A single sound hole was used in the middle of the body but it was usually covered with a carved rosette. The method of tying gut frets around the neck gradually fell away and wood or ivory frets were used. But, as these soon wore down, metal frets were to become the most efficient way of fretting. The fingerboard was flush with the soundboard and extra frets were stuck to the soundboard. The soundboard extended into the fingerboard for a few centimeters.

This was the final form of the five course baroque guitar which proceded into the eighteenth century. Its acceptance into the circles of serious music is shown by the work Modo de Tañer Todos Los Instrumentos Mejores (method of playing all the best instruments) by Minguet of Madrid (1752).



N O T E S

1 A. Sharpe, The Story of the Spanish Guitar, p. 7.
A. Bellow, The Vihuela: Illustrated History of the Guitar, p. 56.
G. Chase, Early Masters of the Guitar, Music of Spain, p. 55.
M. Kasha, The Guitar and Vihuela of the Renaissance, p. 11, Guitar Review No. 30.

2 M. Prynne, A Surviving Vihuela de Marco, pp. 22-27. Galpin Society Journal, No. XVI.

3 A. Bellow, The Vihuela, Illustrated History of the Guitar, p. 59.

4 F. Grunfeld, Art and Times of the Guitar, p. 59.

5 F. Grunfeld, Art and Times of the Guitar, p. 60.

6 F. Carafa, among many other names of guitar players given by Scipione Cerreto in his work, Della Practica Musica Musica Vocale e Strumentale, (1601)

7 A. Bellow, Illustrated History of the Guitar, p. 72.

8 V. Bobri, A Gallery of Great Guitars, p. 15, Guitar Review, No. 30.

9 V. Bobri, A Gallery of Great Guitars, p. 17, Guitar Review, No. 30.

10 V. Bobri, A Gallery of Great Guitars, pp. 19 - 26. Guitar Review, No. 30.

11 V. Bobri, A Gallery of Great Guitars, p. 16. Guitar Review, No. 30.

12 It was claimed by dramatist, Lope de Vega, and guitarists, N.D. de Velasco (1640) and G. Sanz (1674), that Espinel invented the fifth course.

13 This inventory number is so high because Tielke would give a number to any item he made including accessories to instruments. See Illustrated History of Guitar, p. 91, A. Bellow.

14 A. Bellow, Illustrated History of Guitar, p. 94.

15 A. Bellow, Illustrated History of Guitar, p. 95.

16 V. Bobri, A Gallery of Great Guitars, p. 19, Guitar Review No. 30.

17 V. Bobri, A Gallery of Great Guitars, p. 19, Guitar Review No. 30.

18 V. Bobri, A Gallery of Great Guitars, p. 20, Guitar Review No. 30.

19 V. Bobri, A Gallery of Great Guitars, p. 21, Guitar Review No. 30.

20 A. Clarke, The Violin and Old Violin Makers, p. 66.

21 A. Bellow, Illustrated History of the Guitar, Plate LXIV.
22 A. Bellow, Illustrated History of the Guitar, Plate XLIX.
23 A. Bellow, Illustrated History of the Guitar, Plate LA.
24 F. Grunfeld, Art and Times of the Guitar, p. 305.
25 All these paintings can be seen in Art and Times of the Guitar, pp. 83-137 - Grunfeld.

CHAPTER IV.

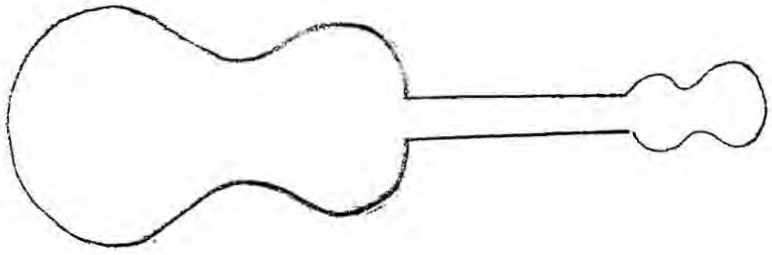
THE SIX STRING GUITAR BEFORE TORRES

No specific date can be given for the addition of the sixth course to the guitar. It was a gradual evolutionary process which took place during the eighteenth century. It could be thought of as a reverse movement, i.e., the five course guitar going back to the six course vihuela, as the new six course guitar was very similar to the old vihuela but with a slightly different tuning system.

In searching for the earliest surviving six course guitar one has to be aware of the fact that many five course instruments from the late seventeenth century and early eighteenth century were later adapted to hold six courses and, therefore, are not original six course instruments. Once again the addition of a course seems to be a first with the Italians. (They were also first with the addition of the fifth course). They built a chitarra battente with six double courses during the early eighteenth century.

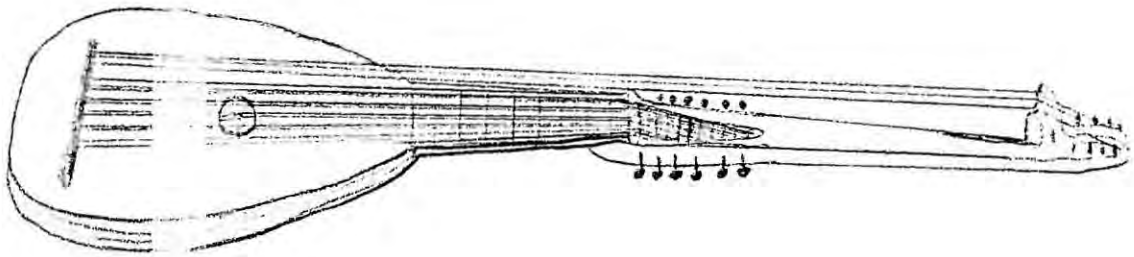
Further evidence of the six course guitar comes from Germany where in 1732 a book called Neu Eröffmeter Theoretischer und Praktischer Music-Saal by Joseph Majer was published.(1) The six course guitar is referred to in this work and an interesting point is that it is written for in Italian tablature and not German, thus inferring that it was considered as an Italian instrument during the early part of the eighteenth century.(2)

One of the earliest surviving guitars in the Spanish style with six courses is one made by the French luthier Francisco Lupot and it carries the date 1773.(3) This guitar was also in advance of its time in that it used six single strings, a practice which became more popular only decades later. The shape of the head is the same as that of the body but an inversion, which is to be found on many guitars from this period.



The body shape itself has a much deeper waist than its predecessors. This more obvious figure 8 shape was to become the standard body shape, even until today.

During the seventeenth century the lute became increasingly used as a continuo instrument. To meet the demands of this role extra bass strings (or diapasons) were fitted. They were played open only and therefore did not pass over the fingerboard. This instrument became known as a theorbo or archlute. (4)



It is not surprising that similar experiments were tried with the guitar during the eighteenth century. Such a guitar dated 1782 was made by the French luthier G. Deleplanque. (5) This guitar is shaped similarly to any other Spanish guitar except that its head and tuning pegs are similar to those of the violin. The bridge is extended to one side to accommodate the extra bass strings which are attached to the end of the longer head. It has six single strings over the fingerboard and four extra bass strings giving a total of ten strings and was, therefore, called a "decachorda".

To enable the bass strings to have a fuller tone the decachorda was built with an unusually deep body to give the extra bass resonance.

The second half of the eighteenth century saw Italian luthiers building Spanish guitars with six single strings. The earliest surviving example is a "guitarina" (small guitar) by Bergonzi in 1785 who had taken over the old Stradivarius workshop in Cremona. (6) Other standard six string guitars in the Spanish style from Italy were made by Antonio Vinaccia (in 1790) and Giovanni Fabricatore (in 1797) both of whom worked in Naples.

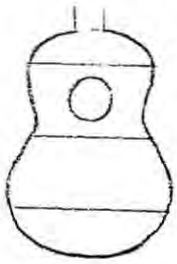
During the earlier part of the eighteenth century, when the sixth course was a new feature, the double courses of the guitar were still used. But by the end of the eighteenth century they had been done away with in favour of single strings. The disadvantages of double courses as given by Simon Molitor (1776 - 1848) were:

1. The lack in clarity of sound.
2. The technical difficulty involved in playing double strings.
3. Keeping the twelve strings in tune. The use of six single strings was adopted universally and has not changed since.

Another part of the guitar which was standardized during the eighteenth century and remains as such to this day is the sound hole. Previous to this time they had been various shapes, e.g., oval, curved elipses, triangles, "f" holes, etc. But it was the perfectly round sound hole which was to be finally adopted. This for two reasons. Firstly it weakened the soundboard the least and secondly the round shape complimented the curves of the bouts. The practice of covering the sound hole with a carved rosette was also dropped. (7)

The luthiers of the eighteenth century had not yet discovered the art of fan bracing but reinforced the soundboard of their instruments with three or four bars running

transversely across the underside of the soundboard. (8)



This sytem made no contribution to the volume or tone of the instrument but merely served to strengthen the structure. But there was a certain amount of awareness during this period that the bracing did effect the sound of the guitar and certain experiments were made setting the bars at different angles rather than at right angles to the strings in an attempt to make the treble more brilliant and the bass more resonant.

Guitars of the eighteenth century and before show a lot of variation in size and scale length. (9) Most of the earlier guitars had a scale length shorter than the standard length used today, e.g., about fifty seven centimeters whereas, during the nineteenth century, Torres standardized the scale length at sixty five centimeters. The main reason for the earlier use of the shorter scale length was that the longer the string, the greater is the tension required to tune it to a particular pitch. As the old gut strings could not stand the greater tension of the present scale length, the older scale length had to be shorter. This in turn meant that the frets were closer together and more easily played by people with small hands, i.e., women. The disadvantages of the shorter scale length were that the guitar did not give such a good tone, particularly from the bass strings and that in the higher positions the frets came too close together.

There was also a certain amount of experimentation with the sahpe and size of the fingerboard. It was realized that the strings had to be far enough apart so that if a finger was put on one string it did not affect the neighbouring strings. The fact that the guitar at first used double strings seems to have been a good point in this regard

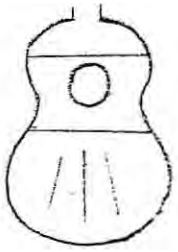
in that the fingerboard had to be wide in order to accommodate the ten to twelve strings so that when the change to single strings occurred the wide fingerboard was already established. The eighteenth century guitar, therefore, had a fingerboard of adequate width.

We have already noted that the German theorist Majer in 1732 referred to the six string guitar from Italy. Further evidence of the actual introduction of the six string guitar to Germany from Italy comes from about 1788. Amelia, Duchess of Weimar (1739 - 1807) was a performer on the five course guitar. This resulted in a certain interest being created in other members of the court. The court instrument maker Jacob Otto (1760 - 1829) made many guitars amongst other instruments to meet the demand. A well known conductor and composer at this time was Johann Naumann (1741 - 1801). He was also a guitarist and whilst on a trip through Italy he came across the new six string guitar and was apparently duly impressed. On his return to Germany he commissioned Otto to make similar six string guitars. (10)

Otto also claims in his treatise on instruments making (published in 1817) that he made some improvements to the guitar himself, viz., the winding of the fourth and third strings. On the five course guitar only the fifth course was wound, the fourth being made of thick gut which did not give a good tone as it did not have enough mass. By winding silk floss with silver or copper wire a bass string with a greater mass was then available and gave a richer bass sound. The six strings of the guitar of the nineteenth century consisted of three treble gut strings and three bass strings of silk floss wound with thin wire.

The Spanish school of guitar making did not begin to flourish till the end of the eighteenth century. The two most important makers of this time were Francisco and José Pages who worked in Cadiz from about 1794 until 1819. They had learnt their trade from two earlier Spanish luthiers, Benedict and Sanguino. Even though the Spanish had been left

somewhat behind in the guitar making world during the earlier eighteenth century one of the guitars of Francisco Pages shows some remarkably advanced ideas.(11) The date given on the label of the guitar is 1815. It has six double courses attached to twelve tuning pegs in a typically large Spanish type head. In this way it still belonged to the transition period between five double courses and six single. But a study of the underside of the soundboard shows it to have three lateral bars in the shape of an elementary fan as well as the usual two transverse bars above and below the sound hole.



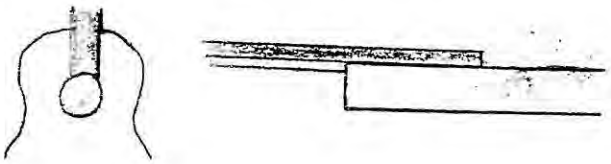
Another important aspect of this guitar is that the soundboard to side joint is reinforced with separate triangular blocks of wood

which left the soundboard freer to vibrate than did the eighteenth century practice of the join being reinforced with a continuous strip of kerfing.

One of the most important families of instrument makers was the Panormo family.(12) Vincenzo Panormo was born in Italy in 1734 and became a violin and guitar maker working mainly in Paris and London. He had four sons. The eldest, Francis, became a flautist. His next son, Joseph, is famous for his 'cellos. George Panorno made guitars but was most famous for his bows and the youngest, Louis, is most famous for his guitars. Louis was born in Paris in 1784 and worked mainly in London until he emigrated to New Zealand in 1854 where he died in 1862.

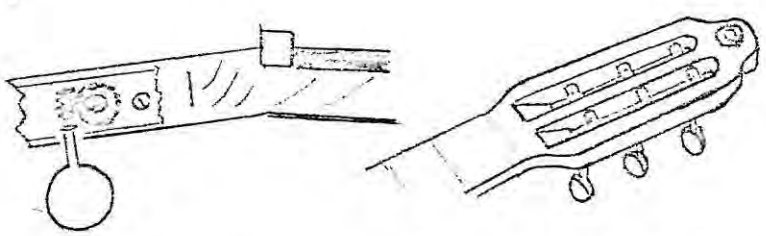
There was a great upsurge in interest in the guitar during the early nineteenth century. The famous concert guitarist, F. Sor, visited England in 1809 giving successful recitals and spending a lot of time in London. Sor and Louis Panormo became closely associated during these years and worked together to try and improve the quality of the guitars being made. One of the improvements suggested by Sor was the use of very thin and light woods for the body instead of the thick woods of the eighteenth century.

A guitar by Louis Panormo dated 1831 shows certain very important developments. (13) The fingerboard is raised above the level of the soundboard and continues over the soundboard as far as the sound hole.



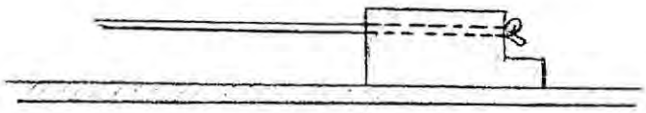
As the fingerboard was usually made of ebony and was about o one centimeter thick, this new development was a significant factor in strengthening the body to neck joint of the guitar allowing heavier strings and a longer scale length (sixty five centimeters) to be used. The fingerboard has a total of seventeen frets, the body joining the neck at the twelfth fret as on the modern guitar.

A new tuning mechanism is to be found on this guitar. It no longer uses the tuning peg system, but the new metal tuning machines, hardly any different from the ones used today .

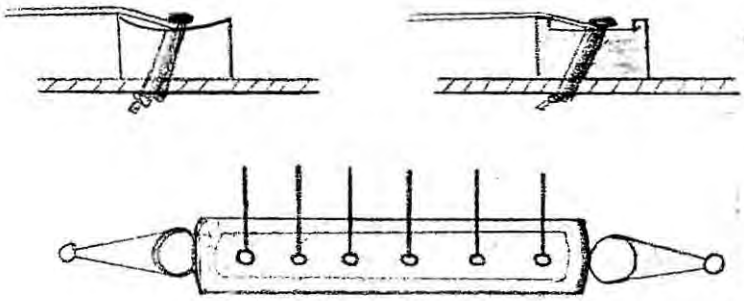


The tuning machine was universally adopted during the early nineteenth century.

The bridge of the Panormo instrument is also of interest. The older eighteenth century bridges usually consisted of a rectangular block through which six holes were drilled. The string was passed through the hole and a short knot tied.



On most of the Panormo guitars the six strings are held in position by six ebony pins..



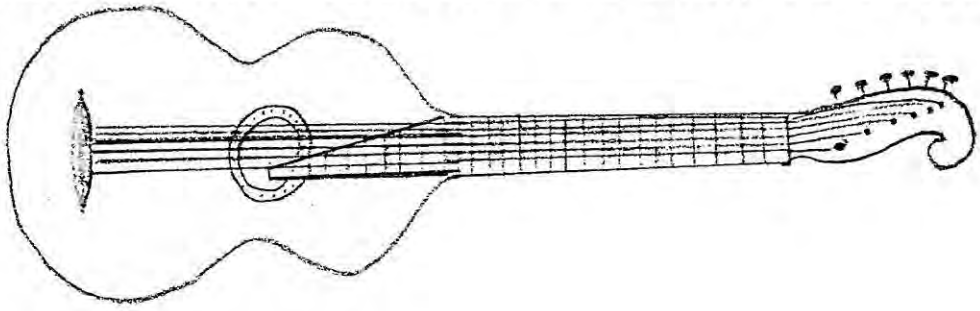
The centre of the bridge is sunken so that the edge will act as a saddle for the string to pass over.

Panormo used a slightly more advanced fan bracing system on his soundboard than that of Pages in that he used up to five fan bars as well as the two transverse bars.

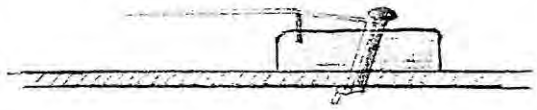
From the time that he first used the fan bracing system (about 1810) Panormo changed his labels to read "Louis Panormo, Maker of Guitars in the Spanish Style" which leads us to believe that the system originated in Spain.

Panormo's instruments were completely free of ornamentation except for the thin inlay around the sound hole.

A contemporary of Panormo was Johann Georg Staufer, an Austrian luthier, who established a workshop in Vienna from 1800. He made many fine guitars particularly those which he made in accordance with the advice given to him by the concert guitarist Legnani. All their labels read "Legnani Model". He was in constant search of new ideas in construction and an instrument dated 1830 shows some of these. these.(14) The fingerboard extends over the sound hole a little and the section over the body is cut off diagonally and contains a total of no less than twenty three frets.



The shape of the body is designed to make playing in the higher positions easier. The keys of the tuning machines are all on the one side of the head and the cogs of the tuning machines are covered over with a silver plate. The bridge of the guitar uses six pins as did the Panormo guitar but has a removable saddle as on the modern guitar.



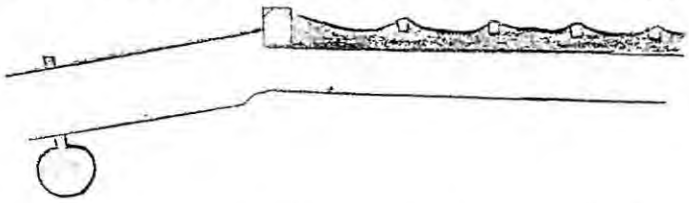
The neck is detachable from the body by means of a screw which also allows the performer to vary the angle of the neck to the body to give the best string action.

The best representative of the early nineteenth century French guitar makers was René Francois Lacôte (1785 - 1855). He was born in Mirecourt and learnt his trade from M. Poné. He set up his workshop in Paris and his later guitar labels read "Lacote et Cie" which suggests that he employed a number of craftsmen to help him.

It was common practice at this time for all the leading guitarists in Paris to gather at the guitar makers

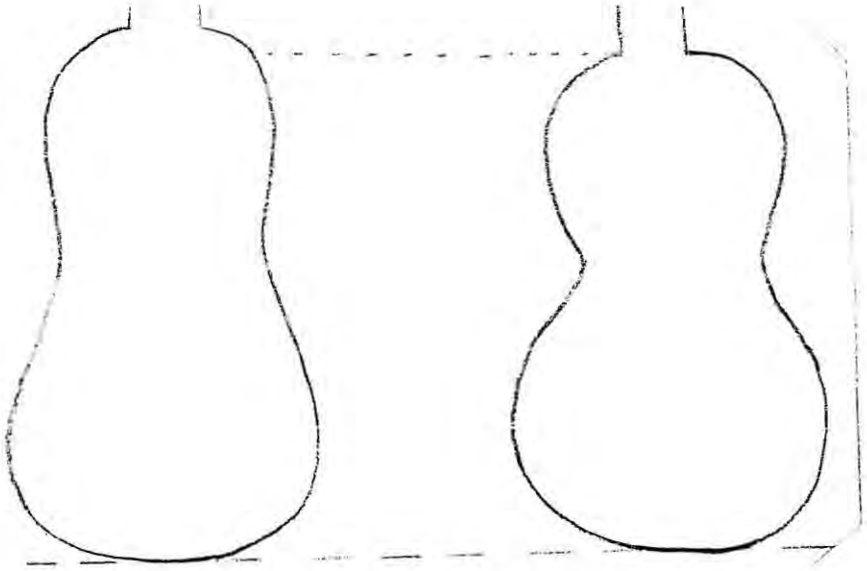
workshop to play to each other and make suggestions for improvements in construction, etc. The Lacôte workshop was a favourite meeting place for guitarists such as Sor, Carulli and Aguado who tested and signed his instruments.

His early guitars use the older peg head tuning system and have scalloped fingerboards.



The crest of each wave of the scallops acted as the fret, but to prevent the wood wearing down too quickly, ivory or metal frets were inset into the crests but did not protrude above them.

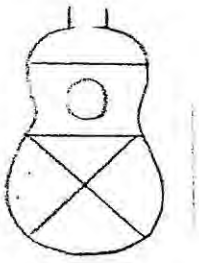
At about the same time that he changed to using tuning machines he also changed to using the standard flat fingerboard as seen on one of his guitars dated 1835. (15) Unlike the Panormo guitar, this instrument still has its fingerboard set flush with the soundboard so that the extra frets had to be inlaid on to the soundboard. The cogs of his tuning machines are set into the sides of the head and covered over giving a very neat appearance to the head. The bridge is approximately the same as the one used on the Staufer guitar, i.e., the strings are held by six pins and pass over an ivory saddle. The body of the guitar has a very pronounced figure 8 shape which was common to most early nineteenth century French and German guitars. If we compare them to earlier guitars we find that the bouts have become larger, particularly the lower bout, thus giving a deeper waist. The north European makers also tended to shorten the length of the body thereby making the figure 8 shape even more pronounced, whereas the Spanish and Italians kept the longer body giving a more elongated appearance to the body and guitar.



To make guitars of different sizes was, of course, nothing new as the centuries before had produced many different sizes. But there was a movement during the early Nineteenth Century to build guitars in four different sizes. Firstly, there was the guitar with extra bass strings called the "decachorda" which has already been noted. Then there was the standard size normal guitar. Then a smaller guitar called the "Terz Guitar" because it was tuned a minor third higher and an even smaller guitar called the "Quart Guitar" which was tuned a fourth higher than the standard guitar. This was very interesting as it could be compared to the string quartet, i.e., first violin, second violin, viola and 'cello, but it did not last after the turn of the century.

As we have seen, the main countries in which guitar building took place during the first half of the Nineteenth Century were Germany, Italy, France, Spain and England. But luthiers were also busy in Belgium, e.g., D. Lucx. Holland had Guypers and Delannoy, Batov, Krasnoschekow and Sichra were famous Russian guitar makers who built seven string guitars which were preferred in Russia at the time. And lastly, C.F. Martin who had worked with Staufer in Vienna before emigrating to the U.S.A. where he became famous for his guitars which were no different from the European instru-

ments except for his method of bracing the soundboard which consisted of two braces forming a cross under the lower bout as well as the two transverse bars on each side of the sound hole.



The following is a general account of the types of woods that were used for the various parts of the guitar by the middle of the nineteenth century.

Back	-	Rosewood, Sycamore, Maple.
Sides	-	Rosewood, Sycamore.
Soundboard	-	Pine, Spruce, Larch.
Fingerboard	-	Ebony, Pearwood.
Neck	-	Mahogany, Rosewood, Sycamore, Ebony.

Very often veneered woods were used, e.g., bird's eye maple veneered with rosewood for the back.

This brings to an end the first half of the nineteenth century and a particular era of guitar making, leaving the beginning of the establishment of the guitar as we know it today, to Torres, one of the most important guitar makers of all time.

NOTES

1 F.Grunfeld, Art and Times of the Guitar, p.308.

2 The essential difference between Italian and German tablatures was that in Italy frets were indicated by numbers and the top string was represented by the bottom line, while in Germany letter names gave the frets and the top line represented the top string.

3 A. Bellow, Illustrated History of the Guitar, Plate LB

4 D. Poulton, John Dowland, "Fretting and Tuning the Lute", p.450.
F. Galpin, Old English Instruments of Music, Mandore and Lute, Plate 10.

5 A. Bellow, Illustrated History of the Guitar, p. 133.

6 A. Bellow, Illustrated History of the Guitar,pp. 143-5.

7 H.E. Huttig, " The Guitar Maker and his Techniques",p.5.

8 T. Usher, " The Spanish Guitar in the Nineteenth and Twentieth Centuries ", p. 29.

9 Scale length is the distance from the bridge to the nut.

10 P. Bone, Guitar and Mandolin, pp. 9 and 257.

11 T. Usher,"Spanish Guitar in the Nineteenth and Twentieth Centuries ", p. 11.

12 A. Sharpe, Story of the Spanish Guitar, pp. 15 - 18.

13 A. Sharpe, op. cit. Supplement.

14 A. Sharpe, op. cit. Supplement.

15 A. Sharpe, op. cit. Supplement.

CHAPTER V

THE MODERN GUITAR

After the middle of the nineteenth century guitar making and design was more advanced in Spain than in any other country. The most important Spanish guitar maker of the late nineteenth century was Antonio Torres Jurado[1] (1817 - 1892). He later dropped Jurado and is more generally known as Antonio Torres. Originally a carpenter, he learnt the art of guitar making from José Pernas to whom he was apprenticed in Granada till 1850. From that time he was building guitars under his own name but in 1869 he had to go into other business for financial reasons. In 1880 he was able to return to guitar making until his death in 1892. He worked with the concert guitarist Julian Arcas as his adviser and did for the guitar what Stradivarius had done for the violin two hundred years before. Through his experiments and innovations he established the design of the modern Spanish guitar as we know it today. He emphasized the importance of the soundboard in the production of tone and to prove his point he went as far as to build a guitar with back and sides made from papiermâché. From all accounts this instrument had a remarkable sound. He also improved on the fan bracing system of the soundboard giving his instruments a rich mellow sound and better carrying power. This system is still used by many guitar makers today.[2] He established the scale length at sixty five centimeters and increased the body size so that it would produce the best results from the new scale length. The width of the nut was standardized at five centimeters and he employed both the Spanish bridge and heel as we know them today. His instruments are, needless to say, without elaborate ornamentation and have only the thin decorative inlay around the sound hole. All notable luthiers since Torres have adopted the principles which he laid down and design their guitars accordingly.

One of the most famous of these was Manuel Ramirez

(1869 - 1920). [3] He came from a distinguished family of instrument makers and made the guitar on which Segovia made his debut. He started as an apprentice of Francisco Gonzalez at the age of ten and established himself as a maker in 1882. The Ramirez name and reputation is still carried on today by his grandson José Ramirez III who is also training his son José IV in guitar making.

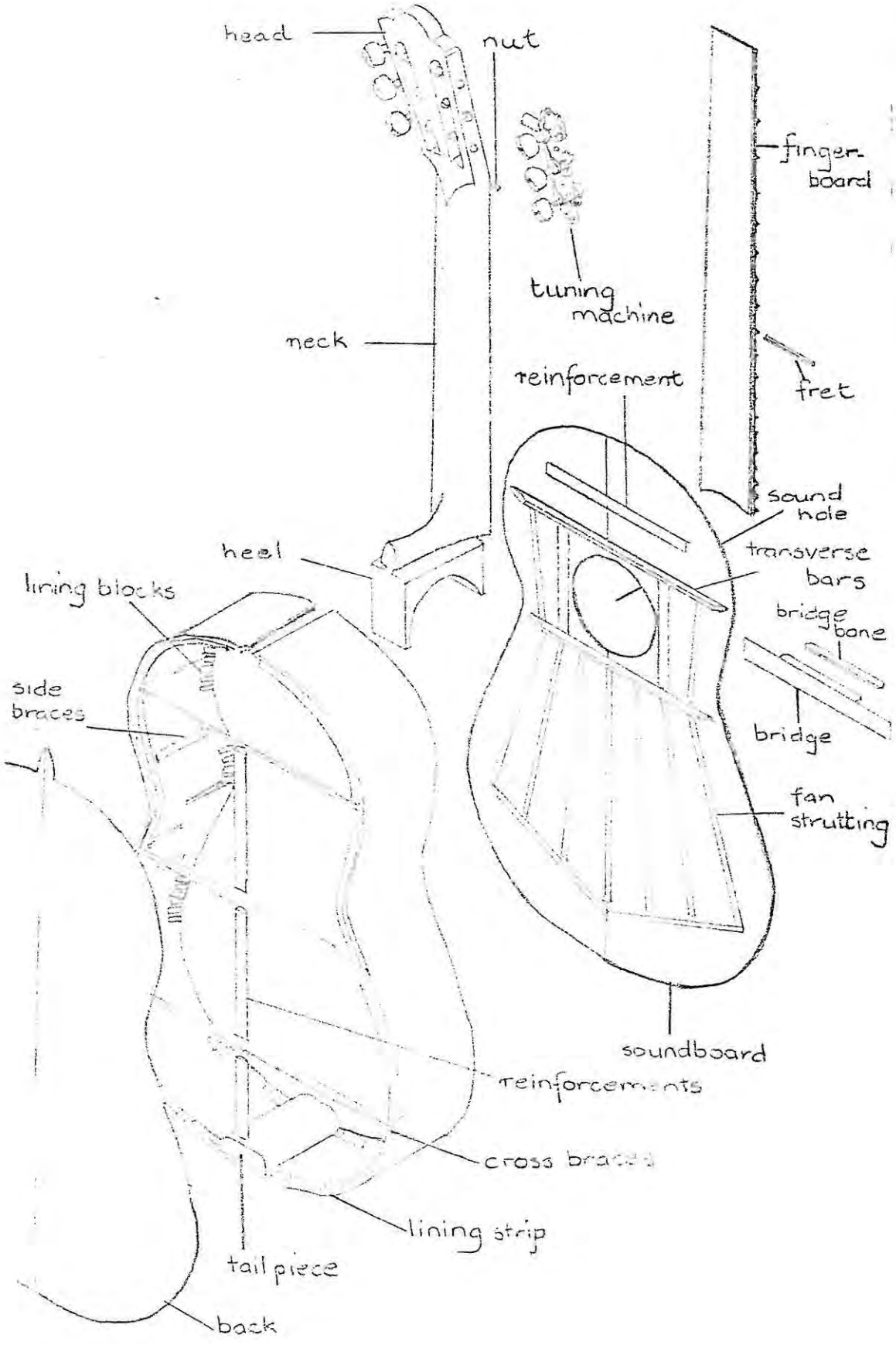
Enrique Garcia (1868 - 1922) was an outstanding pupil of Manuel Ramirez who at the age of twenty five was already building magnificent instruments. He, in turn, had a gifted pupil in Francisco Simplicio (1874 - 1932). In this way the innovations of Torres were spread by his disciples.

Further Spanish luthiers who carried on the Torres tradition were Vincente Arias (1845 - 1912), Santos Hernandez (1873 - 1951) and Domingo Esteso (1882 - 1937) whose nephews still build guitars under the Esteso label.

The most famous German guitar builder of the twentieth century was Hermann Hauser (1882 - 1952) whose instruments are used by many of today's concert artists. His son Hermann Hauser junior still carries on the tradition today. Another contemporary German luthier, Edgar Monch, is building experimental guitars with fingerboards that have complex rising and falling surfaces that correspond with the exact way in which the string vibrates thus giving the lowest possible action without detriment to the tone.

The guitar is said to have been introduced into Japan by Kimpachi Hiruma in 1901 where it became very popular. Today Japan produces an enormous amount of factory made guitars suitable for beginners.

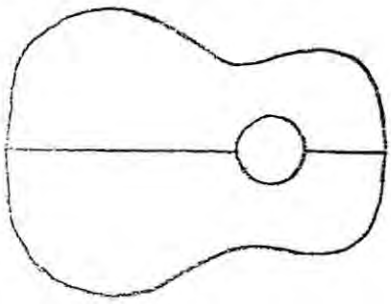
Among the most important luthiers in the world today are Fleta, Yacopi and Pasqual in Spain, Teller in Germany, Bouchet in France and Bohmann, Martin and Velazquez in the United States of America. All that is left now is to describe in some detail the guitar as it is built by the luthiers of today.


head
nut
finger-board
tuning machine
neck
reinforcement
fret
sound hole
heel
transverse bars
lining blocks
bridge bone
side braces
bridge
fan strutting
soundboard
reinforcements
cross braces
lining strip
tail piece
back

The main aim of modern luthiers is to increase the volume and carrying power of the guitar as well as to improve on the tone. The result is that we now have a guitar that is capable of holding its own in terms of aural equality with the chamber ensembles of today. No luthier has yet overcome the problem of building a guitar suitable for both chamber and concert hall work. A guitar with a simple fan bracing system and a thicker soundboard is suitable for chamber works but in the concert hall it will not give enough lower partials and will, therefore, be reduced to a very thin sound. A guitar with a thinner soundboard and more elaborate fan bracing system will carry better in the concert hall but the sound will lack clarity and be too thick for the chamber room.

Building a guitar suitable for the concert hall is the more difficult of the two as it must have enough of the lower partials to keep a good round tone. This requires a very thin soundboard which, unless it is properly controlled, produces disturbing overtones and dissonances. The guitar makers job is, therefore, to produce a guitar with a thin enough soundboard to give a good volume and tone but stable enough to preclude harmonic difficulties.

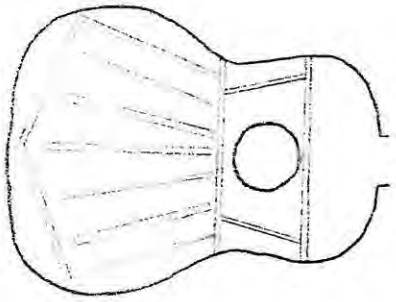
The soundboard is made of two matching halves with the joint exactly down the middle. (4)



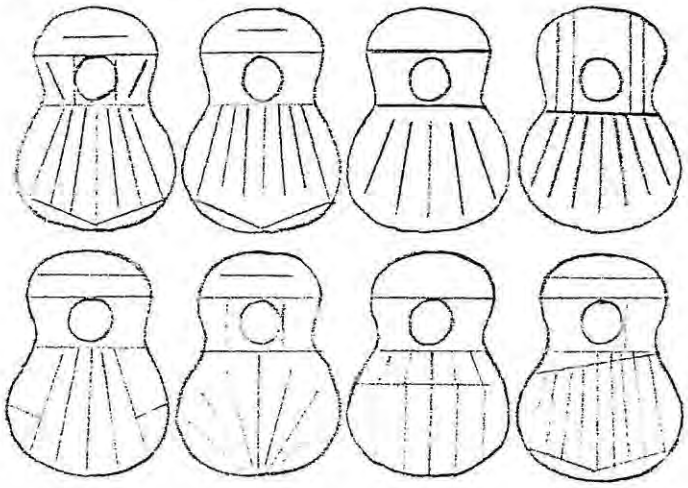
It is at its thinnest in the vicinity of the bridge and is certainly the most important part of the guitar.

The main functions of the fan barring under the soundboard are to keep the thin board from twisting under the tension of the strings, to transmit the vibrations from the bridge to the rest of the soundboard and to discipline

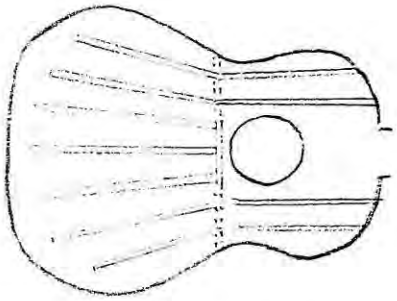
and control the vibrations of the board. (5) The number of different fan systems used today are too numerous to mention due to continual experimentation. But the Torres pattern is still the most widely accepted.



Some other systems used are:-

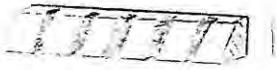


A more suitable system would be one that transmits the vibrations to every part of the soundboard, i.e., to the upper bout as well. To get the sound vibrations up to the upper bout, the two transverse bars on each side of the sound-hole would have to be removed. The problem is that the soundboard and body would collapse without these bars. Recent experiments have been made with an "extended system" where the transverse bars are arched on each side of the board to allow the fan bars to pass under them without any dampening effect. The transverse bars are, therefore, glued to the sides of the guitar and the middle of the soundboard only.



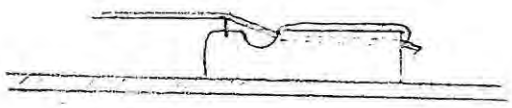
The function of the lining is to give a broader gluing surface thereby strengthening the corners inside the body where the back and top are joined to the sides. The better guitars use separate blocks of wood for the lining of the top to sides. (6)

These use less wood and therefore make for a lighter guitar and they leave the soundboard more free to vibrate. The other, less effective method used in cheaper guitars, is of a continuous strip of wood which is sawn almost through at intervals.



The better guitars again use the latter system for the back to sides joint where the vibrations are not as important while the lesser guitars use a continuous strip of wood there.

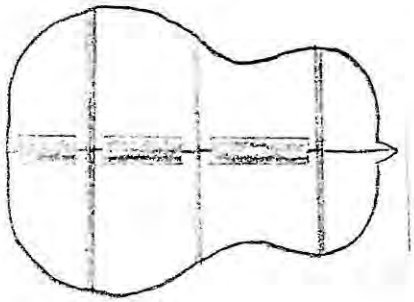
All modern Spanish guitars use a bridge on to which the strings are tied as on the eighteenth century guitars but also with a saddle over which the strings pass as on the guitars of Panormo and Lacôte. (7)



A problem with the bridge is that the strings exert a pull of several hundred kilograms on it. One of the ways in which this problem is overcome is that a broader bridge base is made giving a bigger gluing surface and new improved glues are used.

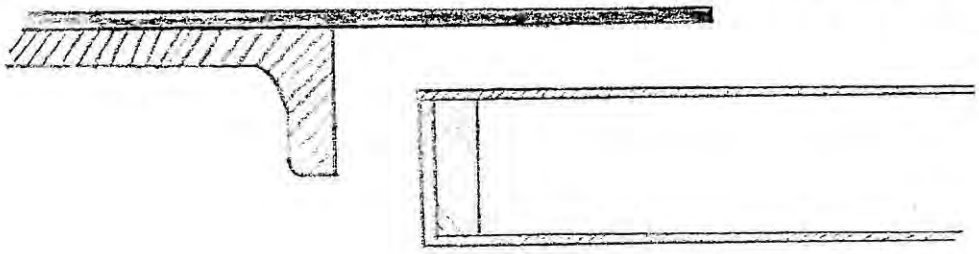
The main functions of the bridge are to hold the strings at the correct distance apart as well as at the correct height above the fingerboard as well as to transmit the vibrations of the strings to the soundboard. But it also helps to brace the soundboard across its seam.

The back of the guitar is also made of two similar halves but many modern luthiers add a thin strip of contrasting wood between them for decoration. The back is reinforced with three cross bars and reinforcements down the middle seam.

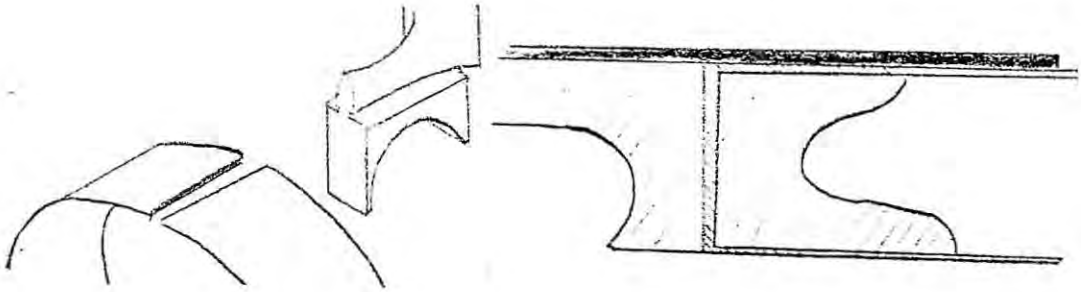


The sides of the guitar are usually made of the same type of wood as the back and also reinforced with small strips of wood.

The heel has its importance in the fact that it is at the body - neck joint and its function is that of reinforcement. (8) The less effective heel as used by the French has a separate heel and end block which are glued together.



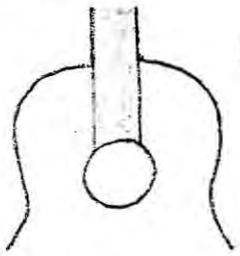
But this method is unsatisfactory as when the strings are tuned to the correct tension, too much movement occurs at the heel. The Spanish heel is almost always used today. It has the heel and end block in one piece and the end block is extended along the back in the form of a slipper as well as along the top to a lesser extent.



The Spanish heel is effective in that it only allows a minimum of movement in the neck - body joint.

The greatest problem with the neck is that the tension of the strings may bend or warp it over a period. The solid wood neck is still the most common but laminated necks are used. To give the best playing action the neck should not be too thick and the back of the neck should be a flattened oval shape.

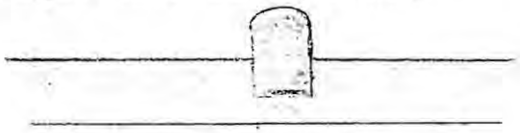
The fingerboard is superimposed on the neck and extends over the soundboard to the sound hole where it is shaped with the curve of the hole.



As the fingerboard is made of a very hard wood it also helps to prevent warping of the neck and as it goes over the soundboard to a certain extent, it helps reinforce the neck-body joint. A fingerboard with a slightly curved surface was often used in the past and only very occasionally today.

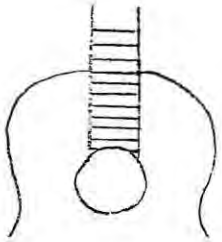
The flat fingerboard has been found to be by far the better.

The older type of fret used consisted of oblong sections of ivory, wood or metal inlaid into the fingerboard and the sharp edges then filed down.



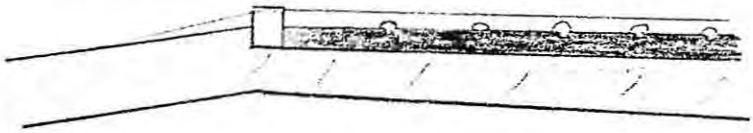
All modern metal frets are of the semi-circular tongued type.

The tongued part is inlaid into the fingerboard. There is still a good deal of controversy about whether the fret should be narrow or wide. (9) The narrow frets give a more precise intonation but are inclined to wear the strings down much more quickly. Wider frets give more volume and are more popularly used. The frets are correctly positioned by the "rule of eighteen" method which is, that if a string is shortened by one eighteenth of its original length, the pitch will rise by one semitone provided the tension remains constant. As the frets are set one semitone apart, this is method used to place them. The twelfth fret is always exactly in the middle of the open vibrating string length which is also where the body is joined to the neck. Mathematical formulae have also been worked out to give the precise positions of the frets. The standard Spanish guitar contains a total, of nineteen frets, the nineteenth having its middle section missing due to the curve of the soundboard.

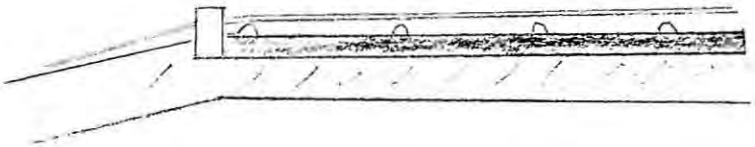


Position marks are to be found on the top edge of the fingerboard and are usually inlays of mother of pearl or ivory. They are on the third, fifth, seventh and ninth frets but the fewer that are used the better as they detract from the purity of the design and eventually prove to be a hindrance rather than a help to the advanced player.

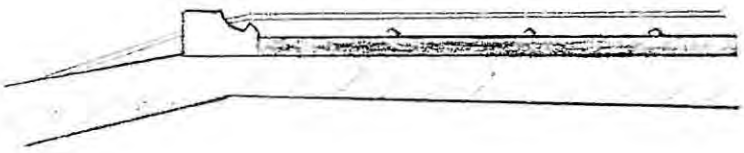
The standard nut as used on the Spanish guitar is an oblong section of ivory or bone in which six grooves are cut to hold the strings in position. (10)



Some luthiers have contested this method saying that the nut has two functions. Firstly to hold the strings at the correct distance apart and, secondly, to place them at the correct height above the first fret. They claim that no single nut can perform both functions satisfactorily and have, therefore, made guitars with a nut to hold the strings in position and an extra fret to hold them at the correct height.



The luthier, Marco Roccia, has built a double nut in one piece.



But the standard nut is still the most popular.

A very important change took place on the guitar less than thirty years ago. This was the change from the use of gut strings to the modern nylon strings. (11) The older gut strings suffered from brittleness, bad intonation

and an inability to sustain or give contrasting tone colours. They also soon frayed where they were struck with the nails. The bass strings were of silk floss wound with wire and had to be relatively thick to stand the tension of concert pitch. The result was that clarity and sustain were adversely affected. Despite the effort of both Hauser and Pirastro who carried the gut strings to the highest peak of perfection, they still suffered from the old weaknesses.

The advent of nylon strings has changed this. The treble strings are now able to be produced with a constant diameter throughout, thus giving a true intonation. They stay in tune and do not wear or break easily. They give a good tone and contrasting tone colours. The bass strings are made of nylon floss wound with thin wire. Nylon floss has a greater breaking strain than the silk floss and the bass strings can, therefore, be made thinner, thereby giving a greater sustain and clearer tone. The first ever use of nylon strings on stage is said to have taken place in New York in 1944 and Segovia first used them in 1946.

The following is a list of the types of wood most frequently used for the various parts of the guitar.

Soundboard	:	Spruce
Sides	:	Rosewood, Maple, Walnut
Back	:	Rosewood, Maple, Walnut
Neck	:	Honduras Mahogany
Fingerboard	:	Ebony, Rosewood
Bridge	:	Rosewood
Lining	:	Basswood, Spruce, Pine
Braces	:	Sitka Spruce, Pine
Back Bars	:	Honduras Mahogany, Spruce, Maple
Nut	:	Bone, Ivory
Saddle	:	Bone, Ivory

Palisander (South American rosewood) has been universally adopted as the best wood for the back and sides, but the world's supply of fine woods is rapidly diminishing and it is, therefore, only found on the most expensive guitars.

This also applies to ebony. The cheaper guitars use plywood but certainly to the detriment of the tone.

In the past, animal or hide glue, in different grades, was used by most luthiers. (12) But animal glue absorbs moisture and with the cycles of drying and dampening the glue weakens and the joints eventually split. For example, Stradivarius used animal glue on his guitars but had to include three or four nails for the heel joint and, therefore, would have preferred a superior glue. Today we have far better plastic glues being used, e.g.,

1 Plastic resin glue
2 Polyvinyl resin glue
3 Liquid resin glue
4 Transparent Epoxy cement.

Some luthiers still use animal glue for the sake of tradition and because it makes repair work easier in that the joints can be separated more easily.

One of the great enemies of the guitar is humidity, or variations in humidity. (13) Dampness results in the wood swelling and dryness in it shrinking. Most guitars can take these changes provided thay are gradual. Shrinkage is more likely to cause damage to the instrument than is swelling, and it is for this reason that the guitar should be assembled in an atmosphere with less moisture than that in which it will be used. The easiest point of entry and exit of moisture in the top and back is the end grain of the wood which is, therefore, sealed off with purfling.

The varnish also helps to protect the wood from the atmosphere. (14) But only a very thin layer of polish or lacquer should be applied for this purpose as too thick a coating will hurt the tone. Before the varnish is applied, the surfaces are throughly sanded with papers in several degrees of fineness. Then a wood filler is applied to all surfaces except the spruce top, which has a closed grain and, therefore, does not require a filler. The best polish used on the finest guitars is French polish which consists of

white flake shellac dissolved in alcohol applied with a cotton pad. The ebony fingerboard is waxed with bee's wax to give it a dull finish.

NOTES

1 T. Hofmeister, Torres - The Creator of the Modern Guitar, Guitar Review No. 16.

2 Some authorities claim that Torres may have invented the fan bracing system but, as noted in Chaper IV, a guitar by F. Pages, dated 1815 (two years before Torres was born), already used an elementary fan bracing system.

3 Alice Gilbert, Spain's Luthiers, pp. 22 and 23, Guitar Player Magazine, v. 7, No.3.

4 I. Sloane, Classical Guitar Construction, pp. 16 and 20.

5 T. Usher, The Spanish Guitar in the Nineteenth and Twentieth Centuries, pp. 28 - 32.

6 H. Huttig II, The Guitar Maker and his Techniques, p. 5.

7 T. Usher, The Spanish Guitar in the Nineteenth and Twentieth Centuries, pp. 23 and 24.

8 T. Usher, The Spanish Guitar in the Nineteenth and Twentieth Centuries, pp. 20 - 22.

9 Britannica Extension Service, The Guitar, p. 3.

10 T. Usher, The Spanish Guitar in the Nineteenth and Twentieth Centuries, p. 19.

11 A. Segovia, Guitar Strings before Albert Augustine, Guitar Review, No. 17.

12 I. Sloane, Classic Guitar Construction, p. 34.

13 I. Sloane, Classic Guitar Construction, p. 18.

14 H. Huttig, The Guitar Maker and his Techniques, p. 14.

PART II

THE DEVELOPMENT OF GUITAR TECHNIQUE AND NOTATION

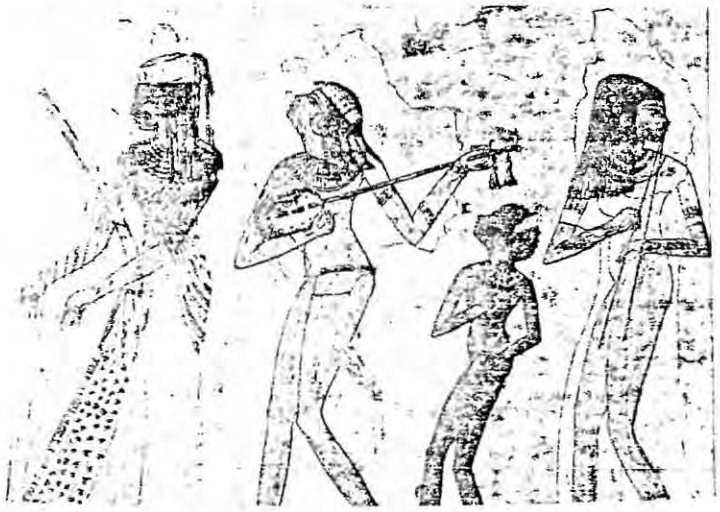
I N T R O D U C T I O N

Since little has been written on early guitar technique and notation, it has been necessary to refer to paintings and other literary sources for information. As with other instruments there are various and opposing schools of thought. In this discussion the generally accepted technique has been put forward.

C H A P T E R I

A BRIEF LOOK AT THE CENTURIES BEFORE 1500 A.D.

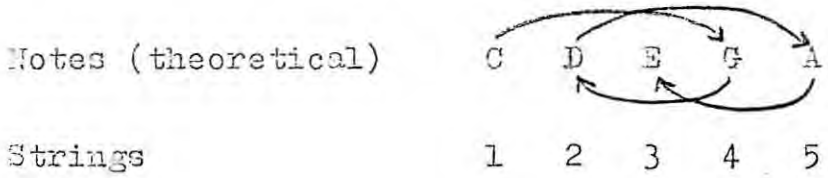
The earliest technique applied to string instruments involved the right hand only, as these instruments were primitive harps. With the invention of necked instruments in Egypt and Babylon before 1900 B.C., the function of the left hand changed from just supporting the instrument to stopping the strings against the neck. The tanburs were held in the same position to the body as the guitar is today but was supported by having the body resting on the right forearm and the left hand supporting the neck as well as stopping the strings.



As the instrument's body was very small and very little technical virtuosity was required, this position was satisfactory. The supporting of the instruments on the right forearm can be found in Europe as late as 1300 A.D. The right hand, therefore, plucked the strings from below and usually used a plectrum for this purpose.

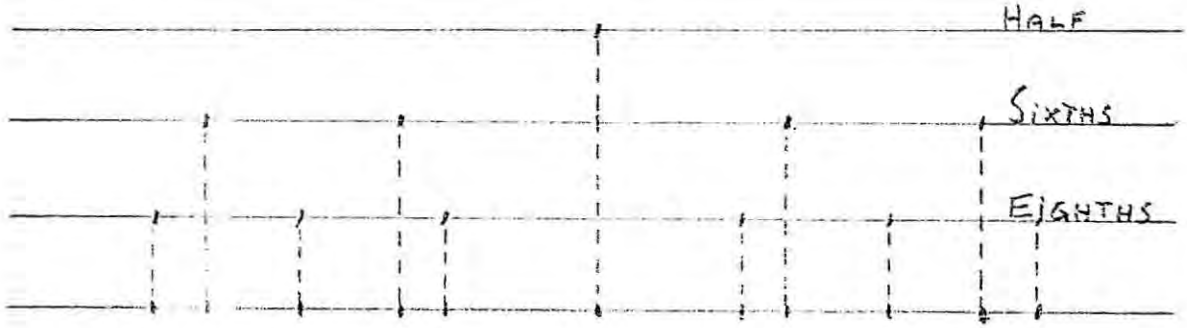
For the method of positioning the frets on to the neck of the instrument, we must first look at the tuning methods of the harpists and lyre players of the ancient Near East. They were able to tune their instruments to the pentatonic scale from their innate ability to hear the intervals of the perfect fourth and fifth and octave. They started by

tuning their lowest string to a note from the middle range of the singer's voice which we will call c. They would then tune the fourth string a fifth higher (g). The second string was tuned a fourth below the g (d). The fifth string was tuned a fifth above the d (a) and finally the third string was tuned a fourth below the fifth string (e).

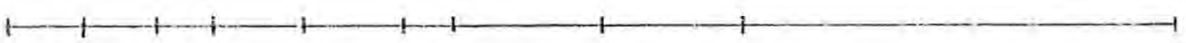


This aural method was satisfactory for instruments which only used "open" strings but an arithmetical system was worked out to give the positions of the frets for instruments which obtained different notes from stopped strings. This system, known as the equipartation principle was also used for the positioning of holes in pipes. (1)

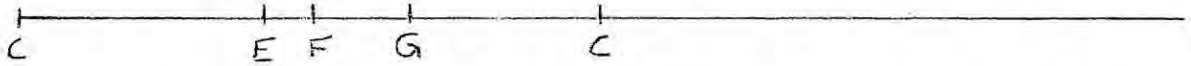
Basically equipartation was the division of the vibrating length of the string into eighths, sixths and a half and then those being superimposed.



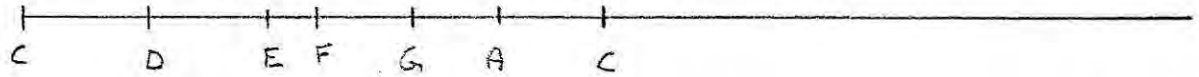
Of course only the left hand side of the string was used, but the first eighth fret position to the right of the half marks was still used and the first eighth interval was again divided into two equal parts.



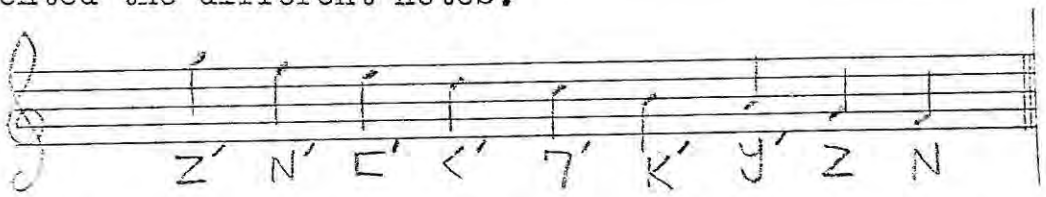
The resulting scale was not altogether satisfactory as it did not give the "natural" scale of the "up and down" system used by the harpists. But from this equipartation system came a very important realization. The octave, fifth and fourth intervals of both the equipartation and the up and down systems were exactly the same. Furthermore, the octave was produced by stopping the string at half its vibrating length and the fourth at a quarter of its length. From this they took the "divisive" system one step further and divided the length by a fifth to obtain the major third.



By now applying the up and down system they could find the correct position for the d by going a fourth down from the g and the a by going a fifth up from d.



Music, like the other languages, went through many centuries before successful attempts were made to write it down. The beginnings of the European notation system are to be found in Greece during the first few centuries of the A.D. era. It consisted of letters from ancient alphabets which represented the different notes.



The lyre was the chief instrument of the Greeks and the letters indicated which strings on the lyre were to be plucked. If we translate the Greek "note names" we find that they give the string positions, e.g.,

Nete - Lowest
Paranete - Next to Lowest
Trite - Third
Lichnos - Index Finger
Hypate - Highest
etc.

Then reference to the "highest" or "lowest" was taken from the relative positions of the strings on the lyre. So their highest note actually had the lowest pitch as it was the upper

most string on the instruments (as on the modern guitar) This means that the Greek notation system was a tablature and not an actual pitch notation. We will find that the guitar and related instruments continued to be written for in tablature for about the next 1 500 years until the eighteenth century by which time the Greek notation system had followed another course and developed into our modern notation system.(2)

By the thirteenth century in Europe, two different playing techniques had evolved. The one involved the strumming of chords and the other, the playing of single notes melodically. The guitarra latina was strummed and this technique is called "rasgueado" and is still very much a part of Spanish flamenco music today. The melodic style called "punteado" came from the Moors and was played on the guitarra morisco. Most surviving illustrations show both these instruments being played with a plectrum.

The use of the right hand fingers in plucking and strumming the strings is to be found with the vihuela of the late Middle Ages. There were three types of vihela in use in Spain. They were categorized according to the manner in which they were played. The vihuela de arco was played with a bow, the vihuela de pendola with a plectrum and the vihuela de mano with the hand (fingers). Eventually the plectrum and bow fell into disuse and so we can say that the right hand technique of the modern guitarist began with the vihuela de mano.

NOTES

1 Curt Sachs, The Rise of Music in the Ancient World, pp. 73-76.

2 J. Wolf, Handbuch der Notationskunde I, pp. 11-23.

CHAPTER II

THE RENAISSANCE AND BAROQUE PERIOD

It will be necessary to study four different instruments from this period. They are the four course guitar, five course guitar, lute and vihuela.

Whereas the lute and vihuela were composed for more seriously, the four course guitar was the favourite instrument of the populace, who were not concerned with contrapuntal technique. All they required was "a basis of tonality for their songs and dances" - E. Pujol. It is obvious then that the four course guitar was merely strummed. The accordatura was G d g b, giving the G major chord which was suitable for chord strumming. (1) According to Juan Bermudo in his Declaracion de Instrumentos (1555), this tuning was "a los viejos" (in the old style). There was, however, a movement towards playing more contrapuntal music on the four course guitar which required a tuning more suitable for contrapuntal playing "a los nuevos" (in the new style). It was the same as the old tuning except that the lowest course was raised by a tone giving A d g b. This gave a tuning of two perfect fourths and a major third which is the same as the inner four strings of the modern guitar. (2) Of course there was no standard concert pitch as we know it today and so the tuning pitch varied considerably. The actual naming of the notes could be no more than theoretical, but it resulted in the correct intervals between the courses.

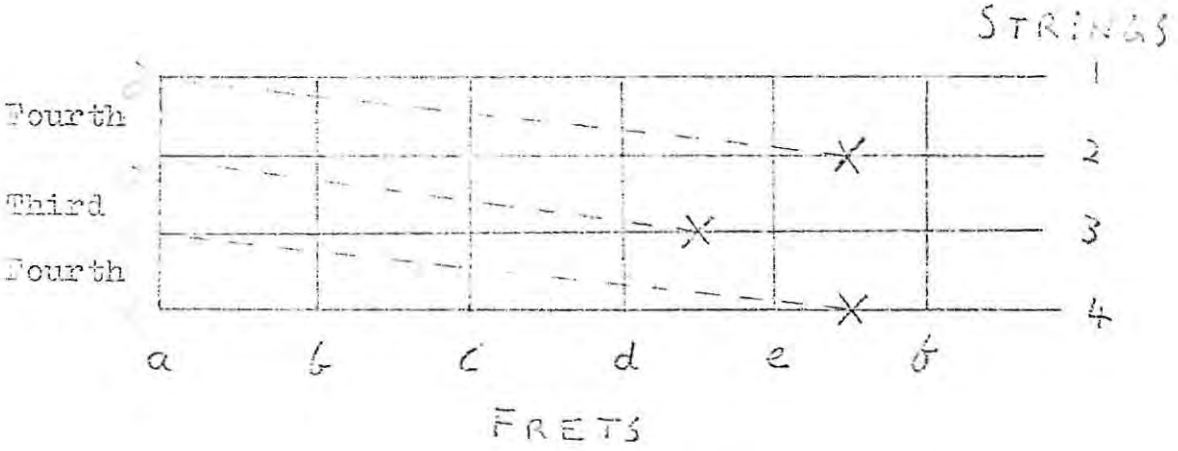
An important point worth noting here, is that the tablature system used to notate the music indicated on which fret and string the finger should press and not the actual pitch of the note. This meant that if a composer so wished, he could change the tuning of the guitar to suit the particular piece without making it any more difficult for the performer to read. The natural result of this was that various tuning systems were in use as well as those already mentioned.

Another popular tuning which was used in Spain was c f a d which had the major third between the two perfect fourths, the same interval relationship as that of the top four strings of the modern guitar.

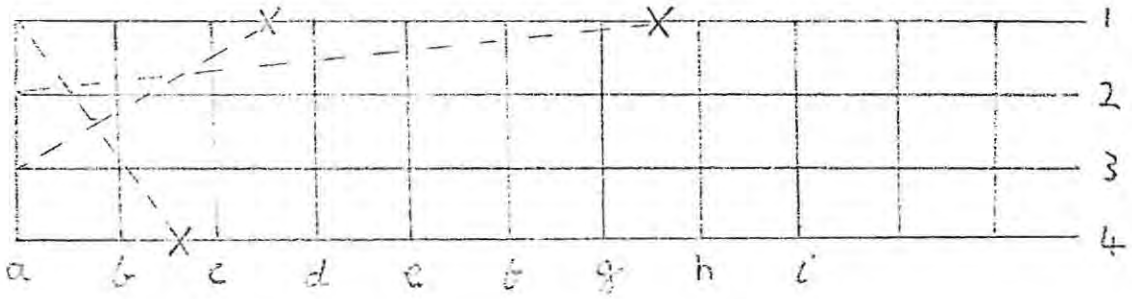
An important event in the music publishing field was the invention of the new movable type press for music printing by Ottavio Petrucci (1466-1593) in Italy. Publishing houses were soon flourishing in France where Adrian le Roy and Robert Ballard published books of guitar music which show a certain amount of sophistication. Because of this, a more advanced playing technique was required and a study of the music shows that the thumb, index and middle fingers of the right hand were used to pluck the strings.

As the quality of music written for the guitar improved there became an increased need for an extra course. A fifth course was, therefore, added during the sixteenth century. The most frequently used tuning for the five course guitar was A d g b e' This seems to originate from the c f a d' But because the extra course had been added as a bass course, a better tonal balance was obtained by tuning the strings higher than with the four course guitar. The whole system was, therefore, raised a tone theoretically as well to give the A d g b e' tuning which remains unchanged even today.

The method used to tune the strings is explained in an Elizabethan four course guitar tutor called Most Select and Elegant French, Italian and Latin Songs to Play on the Guitar.(3) According to the text of this tutor the lowest string should be tuned to a "comfortable" pitch. To tune the third string a perfect fourth higher, the fourth string was pressed on the f (fifth) fret and this note should be the same as the third string open. Then to get the second string a major third higher, the third string should be pressed in the e (fourth) fret and the open second string tuned to this note. Finally the f fret of the second string was used to tune the first string a perfect fourth higher again.



An alternative method of tuning in octaves is also given. Once again the fourth string is tuned to a "comfortable" pitch. Then the first string open was tuned an octave above the c fret of the fourth string. The third string was tuned an octave below the d fret of the first string and the second string an octave below the h fret of the first string.



The increase in concern with the playing technique of the guitar is obvious from the writings of the Baroque guitarists. A book called Poema Harmonico Compuesto de Varias Cifras por el Temple de la Guitarra Espanola written by D.F. Guerau in 1694, gives a series of instructions on technique.(4) Guerau emphasises the necessity for a good left hand position. The hand should not have to hold the guitar but always be free to move up and down the fingerboard. The guitar should be held between the right arm and the leg. The left arm should not come into contact with the player's body. The left hand thumb should be kept behind the neck of the guitar opposite the finger tips and not show over the top of the neck. He also stresses the importance of the alter-

nation of the right hand fingers for faster and cleaner playing. The left hand should be curved into an arch so that the fingers play on their tips and the guitarist should get used to using the bar of different sizes.

All these points are still essential in modern guitar technique. But the use of the right hand fingers in playing scales was different. Guerau states that when playing a descending scale passage from the first to the fifth string, the fingers should play on the first, second and third strings and then the thumb alone on the fourth and fifth strings. In an ascending scale the thumb should play all the notes on the fifth, fourth and third strings and the fingers take over for the second and first strings (only the index and middle were used).

By the middle of the seventeenth century in Spain, two different techniques were used side by side. They were:

(1) The strumming of chord shapes (taner de rasgueado).

(2) Melodic and contrapuntal playing (taner de punteado).

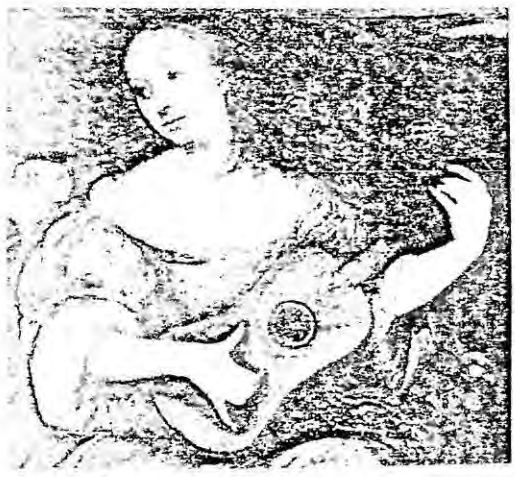
These are particularly evident in the notation of the works.

Meanwhile, in Italy, the strumming of the chitarra battente was still dominant, the contrapuntal playing being left to the lute. But with the introduction of the punteado technique from Spain, the strumming technuqie soon lost popularity. This new technique applied to the guitar was known by the Italians as "alla Spagnuola" and was an important factor which led to the popularity of the guitar in Italy.

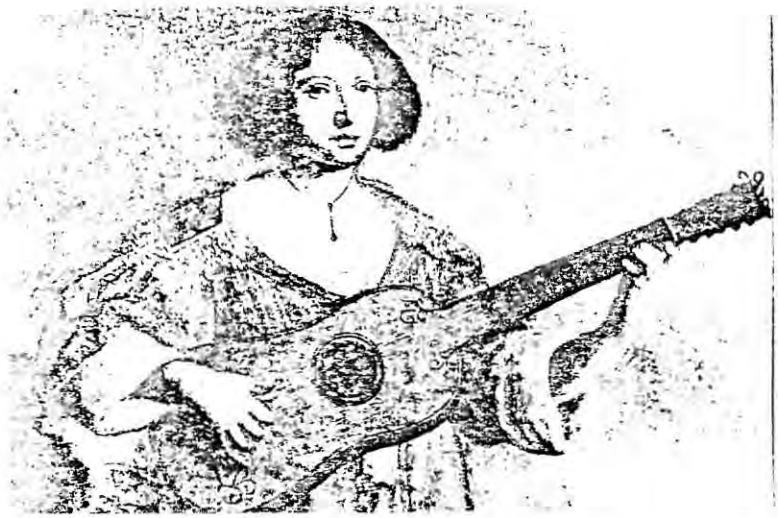
Most composers of the seventeenth century wrote pieces which incorporated both rasgueado and punteado technique. But there was the occasional exception, e.g., Carlo Calvi published a work in 1646, the first half of which had pieces to be played solely rasgueado and the second half solely punteado.

Another source of information regarding guitar technique during the Baroque comes from the artists of the time who used the performing guitarist as the subject in some of their works. (5) The correct position of the left hand and arm as described by Guerau is to found in the engraving "Dame de Qualite" by Trouvain in 1694.

There seem to have been two popular playing positions for the right hand and arm. The first one is where the arm passes over the end of the lower bout and the hand is placed very close to the bridge. The little finger then rests rests either on the bridge or the soundboard to stabilize the right hand. This is clearly shown in the painting "Lady Playing a Guitar" by Netscher (1680),



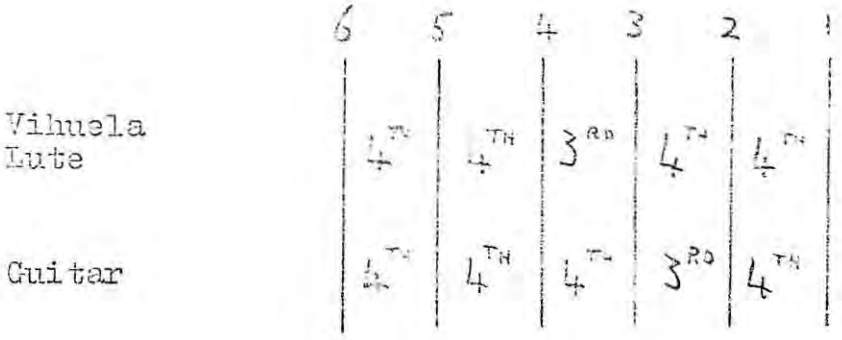
and "Young Woman Playing Guitar" by Quesnel (1681).



The other position is where the right arm passes over the edge of the guitar within the upper waist, thereby positioning the hand much closer to the fingerboard. When this position was used, the little finger was not placed on the soundboard as a rule. An example of this position comes from the title page of I Quartri Libri della Chitarra Spagnola by Foscarino.

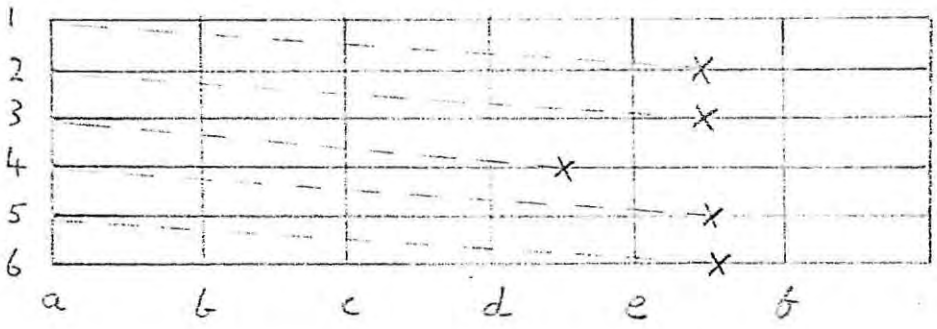
The main difference between the lute and vihuela was in their shape. The accordatura, fretting system and playing technique were basically the same. For this reason they will be discussed together as what applies to one instrument will also apply to the other.

The accordatura of both lute and vihuela was in perfect fourths, except for the major third between the middle two courses. This was written theoretically as G c f a d′ g′. This was known as the G tuning. It was also sometimes written as A d g b e′ a′ called the A tuning. This accordatura is very close to that of the modern guitar and, in fact, only differs by a single semitone.

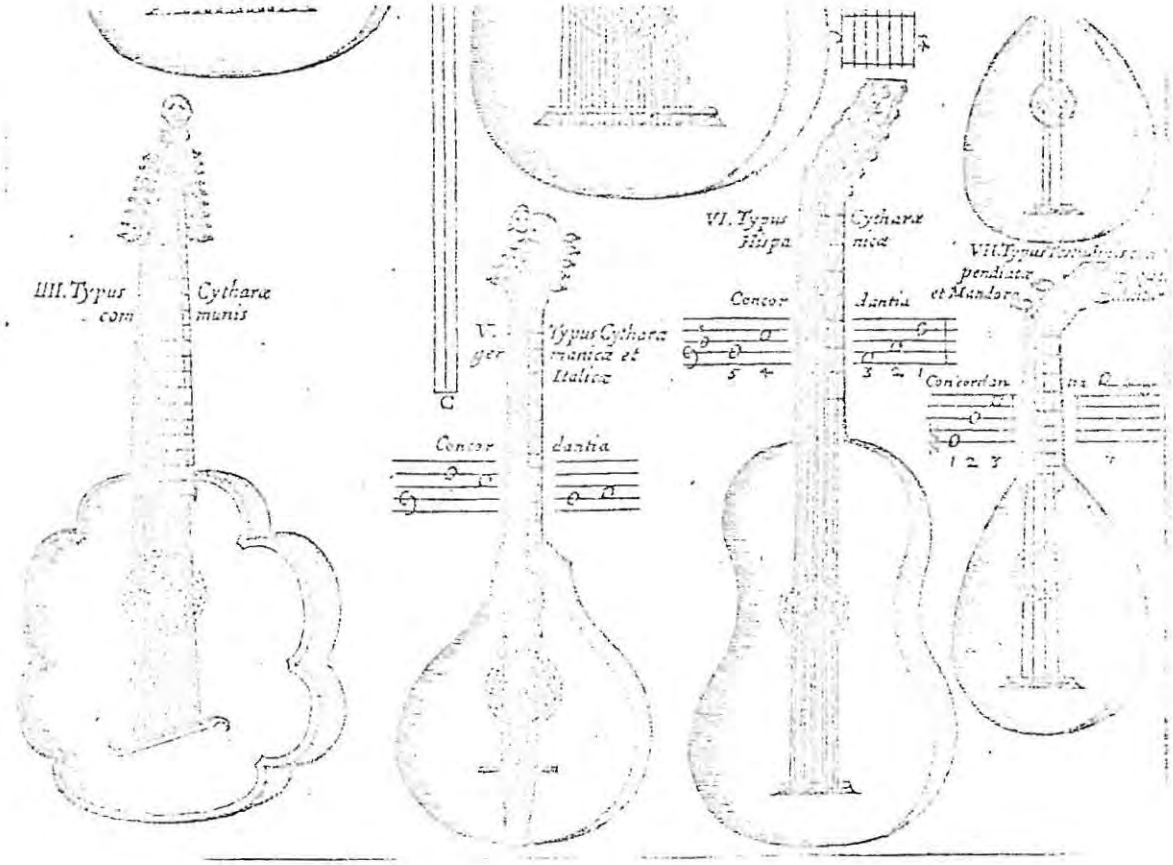


If the third string of the guitar is lowered by a semitone, the interval between the second and third strings becomes a perfect fourth and the interval between the third and fourth strings becomes a major third, making the accordatura the same as that of the lute and vihuela (although a minor third lower). For this reason many modern transcriptions of lute and vihuela music require the third string of the guitar to be tuned down a semitone to give the original tuning of the instrument concerned.

In the work El Maestro by the vihuelista Luis Milan (published in 1535), he gives instructions on how to tune the vihuela. (6) He caters for different sizes of vihuela saying "if the vihuela is big, use the first string that is thicker than the thin. And if the vihuela is small, use the first string that is thinner than thick". He goes on to say that the first course should be tuned "as high as it will go" and then the other courses should be tuned at the correct intervals in relation to the first. The same instructions were usually given for the tuning of the lute but in Varietie of Lute-Lessons by John Dowland in 1610 he advises tuning in the reverse order, i.e., starting from the sixth course. (7) The method given for tuning the six courses of the lute or vihuela was the same as was given for the four and five course guitar, viz., that the interval of the fourth was obtained by tuning the open course to the note obtained from the f fret of the lower course, and a major third from the e fret of the lower course.



The following is a page from Musurgia Universalis by A. Kircher written in 1650, which shows the tunings of the different string instruments commonly in use at the time.



There were certain problems in tuning that we are better able to understand today due to improved scientific explanations and understanding and the system of "cents" which was thought out by A.J. Ellis in 1899, where each semitone of an equal tempered piano is divided into one hundred cents.

The distance of two octaves (sixth course open to the first course open) is twenty four semitones or 2 400 cents. But scientific calculations have shown that the true interval of a fourth is 498 cents, and that of the third is 386 cents. Thus four fourths and one third add up to 2 378 cents and not 2 400. Therefore allowances have to be made in the intervals to get the tuning which is closest to being correct, in the same way as the equal tempered piano is tuned slightly out of the naturally correct pitches so that it may be played in any key. The Pythagorean method of solving the problem on the lute was to augment the interval of the major third to 408 cents to make up the difference of 22 cents. The Meantone method was to augment the interval of the fourth to 503.5 cents. The equal tempered system used today has the major third as 400 cents and the perfect fourth has 500 cents.

Further turning problems arose from the fact that the gut strings did not always have an equal diameter throughout. This affected the intonation of the string, e.g., if the string was thicker at the bridge end it would produce slgihtly flat notes on the higher frets as the thicker the string is the slower it vibrates and, therefore, the lower the pitch of the note it produces. In his work, El Maestro, Milan gives advice to his readers on how to find out if the string is "false" or not before putting it on to the instrument. He states that the string should be stretched between the fingers of each hand and then plucked by one of the fingers. If it vibrates as if it were two strings then it is false and should not be used. In other words, if the string does not have a constant diameter, the increased mass of the thicker parts will cause the string to vibrate in more segments than a string with an equal mass and diameter.

All these problems, coupled with the fact that the gut strings frayed and broke easily and that the lute and vihuela had a total of eleven strings, must have made tuning a bit of a headache to the players even to the extent that most artists when portraying a lute player usually show him tuning his instrument rather than playing it.

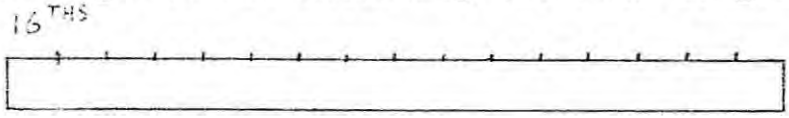
In 1532 Hans Gerle published his Musica Teusch in Nuremberg in which he gives instructions on how to find the positions for the frets on the lute.(8) One must remember that the lute player also had to have some knowledge of how to do this as the frets were only tied on and were movable. His instructions are somewhat similar to the equipartation system of Egypt in that they require the division of a particular length into equal sections, e.g., the fret should be half way between the bridge and the nut. Fret h should be a third from fret n to the nut. Fret b should be two elevenths from the nut to the fret h, and so on.

The fretting system given by John Dowland in his Varietie of Lute-Lessons of 1610 uses the same method and in fact it would seem that Dowland adopted the Gerle system in the first place.

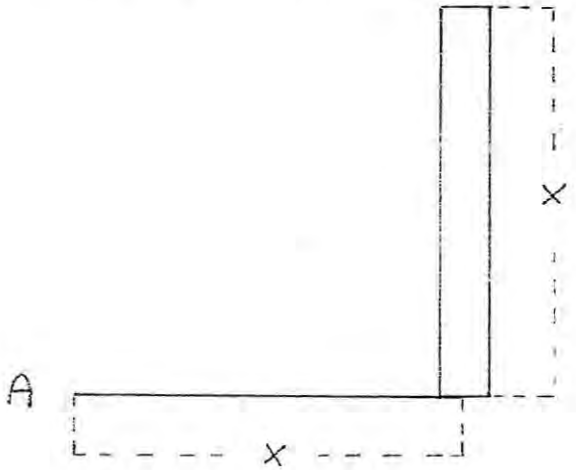
In 1581 Vincenzo Galilei published a book called In Fronimo Dialogo in which he discussed theoretical problems on the lute including that of positioning the frets. He advocated the so called "rule of eighteen" whereby the open string is divided into eighteen equal parts and the first fret tied one part from the nut. Then the string length from the first fret to the bridge is again divided into eighteen equal parts and the second fret tied one part from the first fret. This was continued until the required number of frets had been positioned. This method has been commonly used since, even until today.

Another fretting system was worked out by Baroque Spanish musician Garcia Hidalgos and is described in his work Principios.(9) This method is based on geometric calculations

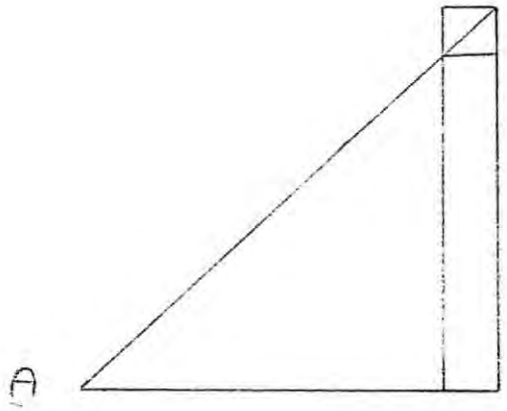
and can be summarized as follows. The vibrating length of the string is divided into sixteen equal parts. The fingerboard is then drawn as having a width equal to the length of one of these parts and extending the full length of the string.



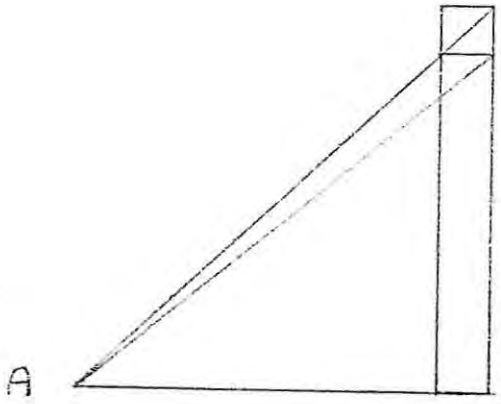
Another line is then drawn at right angles to the bottom of the string and having the same length as the string but is drawn from the middle of the fingerboard width. The end point of this line is called "A".



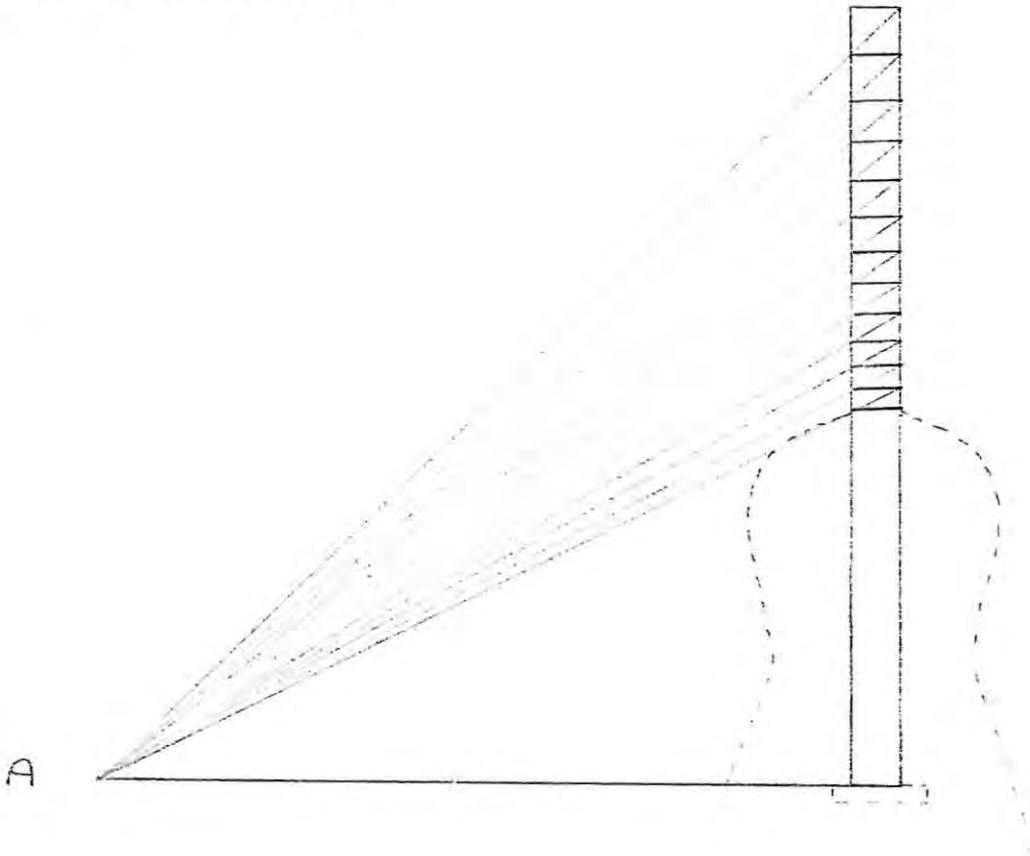
A line is drawn from point A to the upper right hand corner of the fingerboard and the first fret is placed where this line crosses the left vertical line of the fingerboard.



Another line is drawn from point A, this time to the right end of the first fret and the second fret is placed where this line crosses the left vertical line of the fingerboard.



This method is continued until the required number of frets have been positioned.



All music for the lute, vihuela and guitar was notated in tablature form up until the end of the Barogue era.

In 1570 Le Roy of Paris published a work called Most Select and Elegant and French, Italian and Latin Songs to Play on the Guitar for the four course guitar.(10) It begins with eight rules which explain the tablature system. They may be summarized as follows.

The First Rule

The four course guitar has the lower three courses as double strings tuned in unison and, therefore, played as if each course were one string. The top string, called the quinta is a single string. This gives the instrument a total of seven strings.

The Second Rule

The four courses of the guitar are represented on paper by four straight lines. The top line represents the first string. The second line represents the second course, the third line, the third course (also known and the "second bass") and the bottom line the fourth course (or "first bass").

The Third Rule

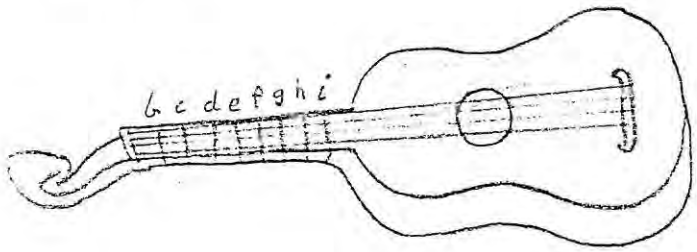
This only gives four notes. To obtain more notes the frets are used and are pressed with the left hand fingers while the right hand fingers pluck the strings.

The Fourth Rule

The frets are represented by eight letters of the alphabet, b c d e f g h i.

The Fifth Rule

Letter b represents the first fret, letter c the second and so on.

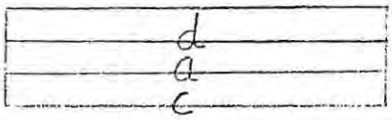


The Sixth Rule

The open string is represented by the letter a.

The Seventh Rule

If a number of letters are put directly over each other then they should all be played together, e.g.,

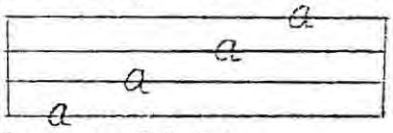


should be played as a chord.

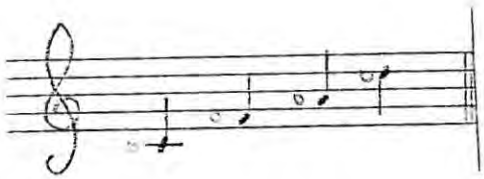
The Eighth Rule

Some pieces require that you should play above the last fret (i) and are so indicated by the use of further letters from the alphabet, e.g., k l m n etc. For these the string should be pressed against the wood of the guitar as if the frets were there.

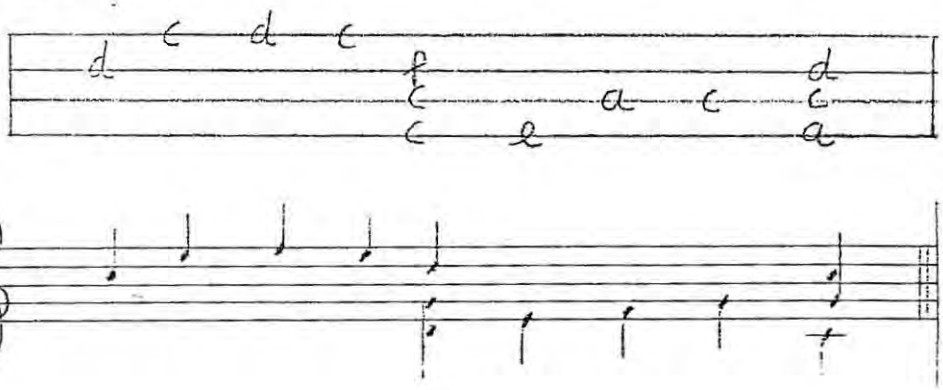
The accordatura given in the tutor for the guitar is for two perfect fourths with a major third between the two middle strings. From this we can assume that the theoretical tuning was probably c f a d′ so that



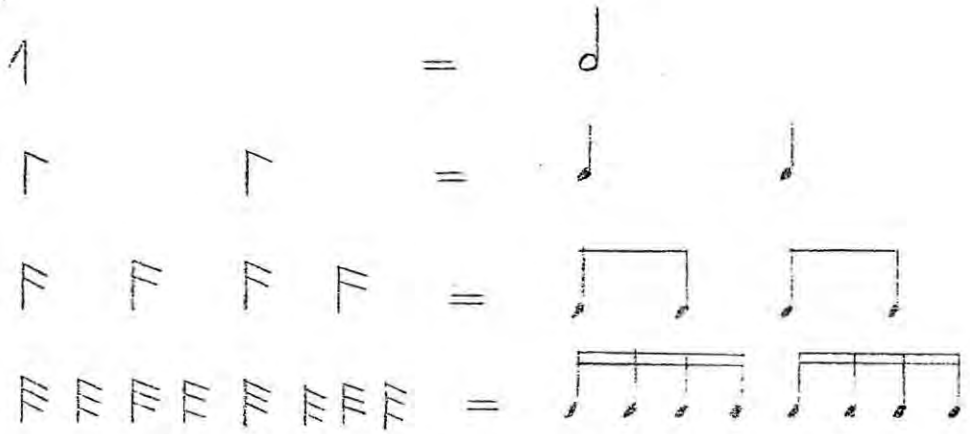
in our modern notation would be



The following is an example of the indication of the frets.

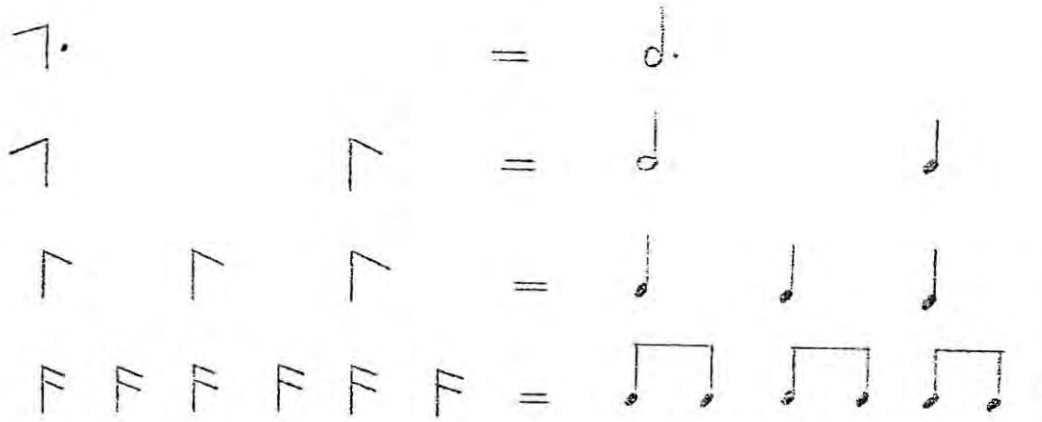


The tutor then goes on to explain time and how the rhythm of the piece is indicated. Seeing that the guitar was not able to sustain a note for very long after it had been played, the longer notes used in vocal music such as maxims, longs and breves were not used. The longest value written for the guitar was the semibreve (equal to about the time value of our minim) and this was, therefore, called the primary tempus and was indicated as 1. All note values thereafter were sub-divisions of the tempus.

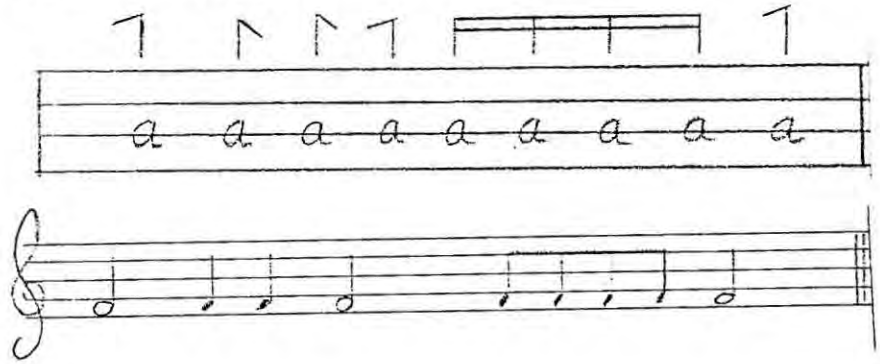


This was known as imperfect time as the tempus was sub-divided into two. Imperfect time was indicated by the sign ¢ at the beginning of the piece.

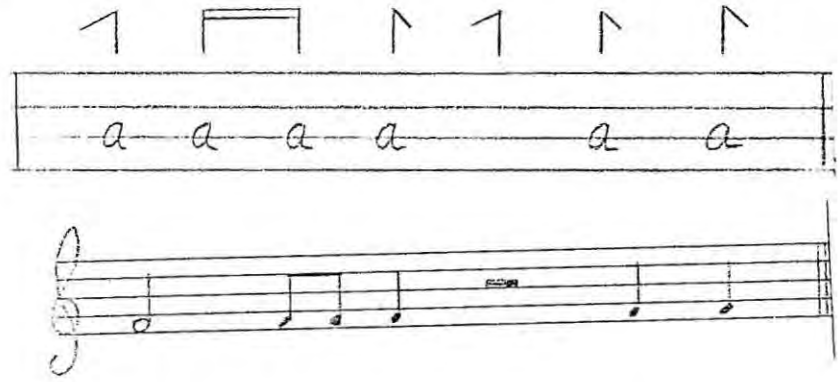
If the tempus was sub-divided into three parts, this was known as perfect time and indicated as such with a 3.



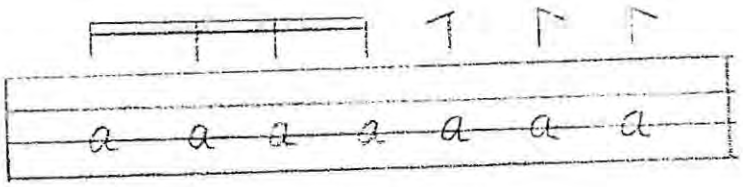
These rhythm indications were written above the fret indications of the tablature.



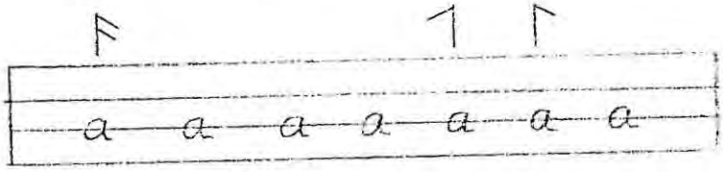
If a rhythm is indicated but does not have a letter under itself, this indicates that a rest is to be played for the time value indicated.



Although this particular tutor indicated the rhythm above every note, most tablatures gave fewer indications. Instead of :

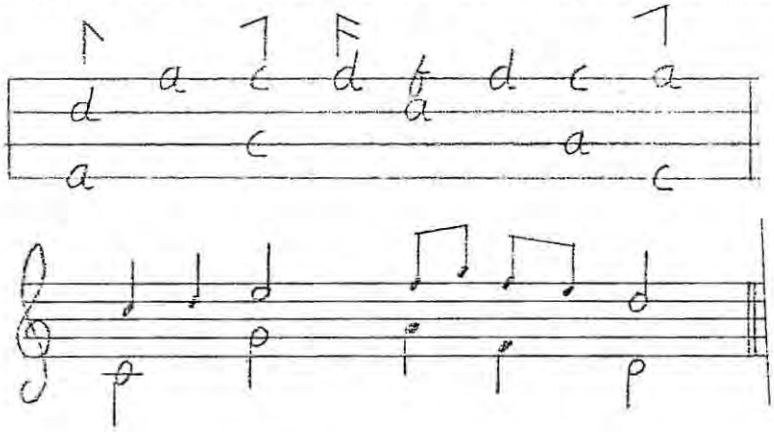


they would only give:



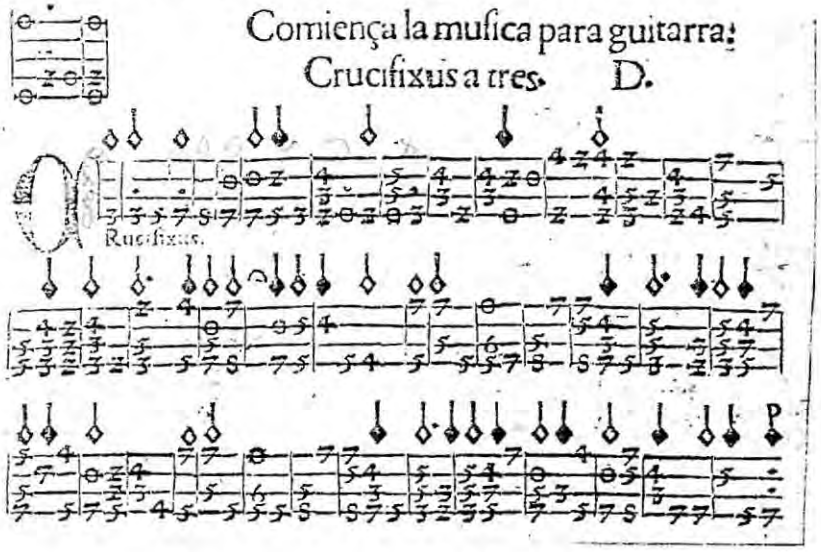
Thus a note without a rhythm indication would have the same time value as the last indicated note before it.

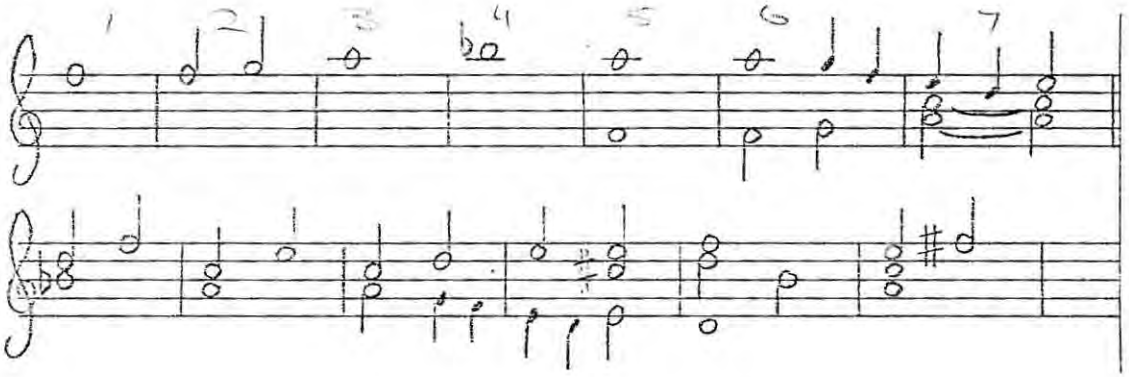
One of the obvious limitations of the tablature system is that in the case of contrapuntal writings, it is only able to indicate the rhythm of the top line and the note values of any other part have to be guessed by the performer.



Not all tablature systems were the same but there were two main systems. The one used by the North European countries such as England, France and Germany had the top line representing the top string and the frets indicated by letters (as in the Elizabethan tutor previously discussed). But the South European countries such as Spain and Italy, used a tablature with a few essential differences. The bottom line of the tablature represented the first string and the frets were indicated with numbers, i.e., "o" indicated the open string, "i" the first fret, "2" the second fret, etc. There were always a few exceptions to the rule, of course, e.g e.g., the Spanish vihuelista L. Milan used the North European method, having the top line of the tablature represent the top string.

The following is a copy of a page from Orphenica Lyra by M. de Fuenllana, followed by a direct transcription into modern notation of the same. (11)

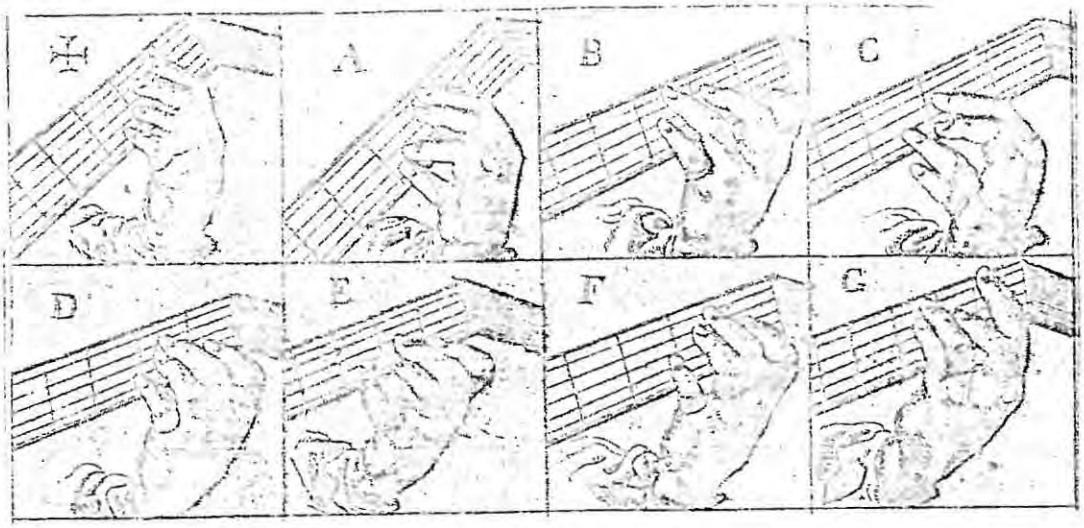




Notice that he has divided the tablature into sections, each section containing the same number of beats. These sections do not look as if they all have the same number of beats at first glance as all the sections are made as small as possible. The simple reason for this was that paper was expensive and difficult to come by in those days and the composers, therefore, made sure that they wasted no space. Notice, also, that Fuenllana uses the note shapes from vocal notation to indicate the rhythm as against the "grid iron" method of "stems" and "flags".

A new method of indicating chords in the tablature system was introduced during the Seventeenth Century particularly for works written for the five course guitar. At the beginning of his book of works, the composer would give all the chord "shapes" in picture form, i.e., a drawing of the

hand actually playing the chord on the fingerboard. Each chord "shape" was given a letter name from the alphabet and so this system became known as the "alphabeto" method. In the book, Instruccion de Musica Sobre la Guitarra Espanola of 1675, Gaspar Sanz gives the following chord shapes. (12)

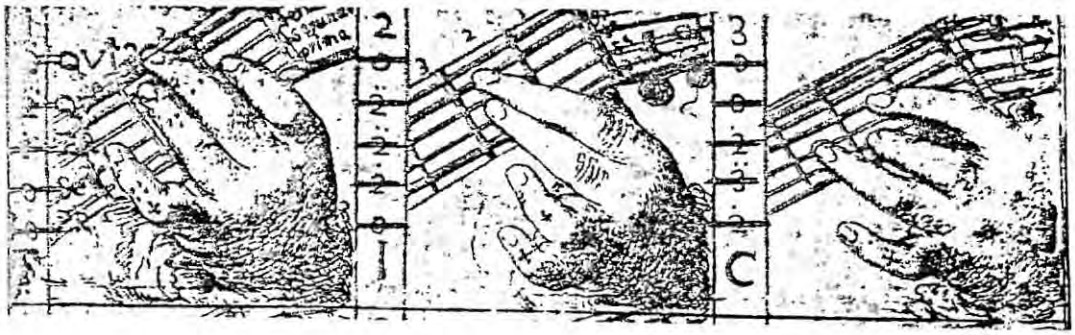


A ring on any particular finger indicates that that finger does not press any string.

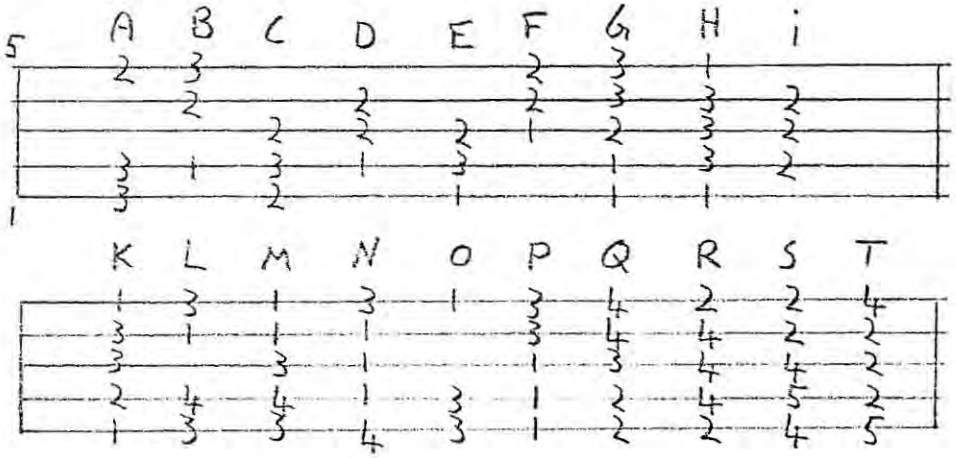
As we know the tuning system of the five course guitar to be A d g b e′, it is possible to analyse the chord shapes to obtain their true function, viz:

H	= E MIN	F	= E MAJ	M	= $E^{\flat}$ MAJ		= $C^{\#}$ MAJ
A	= G MAJ	G	= F MAJ	M^{+}	= $E^{\flat}$ MIN		= $C^{\#}$ MIN
B	= C MAJ	H	= $B^{\flat}$ MAJ	N	= $A^{\flat}$ MAJ		
C	= D MAJ	I	= A MAJ	N^{+}	= $A^{\flat}$ MIN		
D	= A MIN	K	= $B^{\flat}$ MIN	O	= G MIN		
E	= D MIN	L	= C MIN	P	= F MIN		

In the book, Principios by Hidalgo, use is made of the same method of pictures, except that he adds to each c chord shape a small indication in tablature form showing which frets of each string were to be pressed.



Domenico Pellegrini, on the other hand, in a 1650 publication, gave his alphabeto chord shapes in tablature form only without the use of pictures.

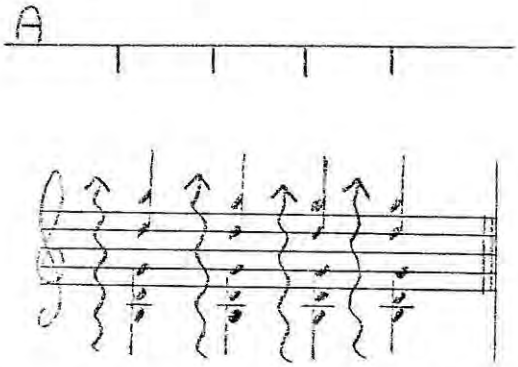


These give the following chords:

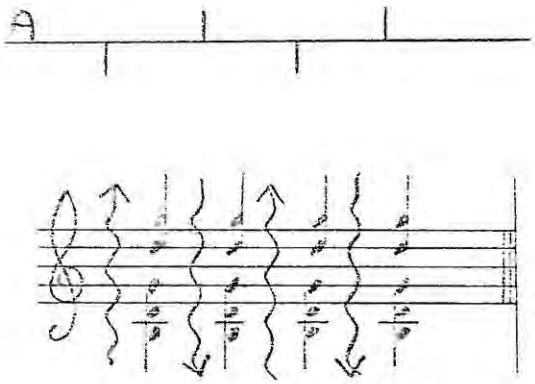
A = G MAJ	G = F MAJ	N = A♭ MAJ	T = A MAJ
B = C MAJ	H = B♭ MAJ	O = G MIN	
C = D MAJ	I = A MAJ	P = F MIN	
D = A MIN	K = B♭ MIN	Q = F♯ MAJ	
E = D MIN	L = C MIN	R = B MAJ	
F = E MAJ	M = E♭ MAJ	S = E MAJ	

A comparison between the alphabeto of Pellegrini and that of Sanz shows a certain correlation. All the letter symbols from A to P indicate the same chord functions. As the Hidalgo alphabeto also correlates with this, we can assume that this system was adopted by most composers so as to avoid confusion. The composer would also add extra chords according to his needs.

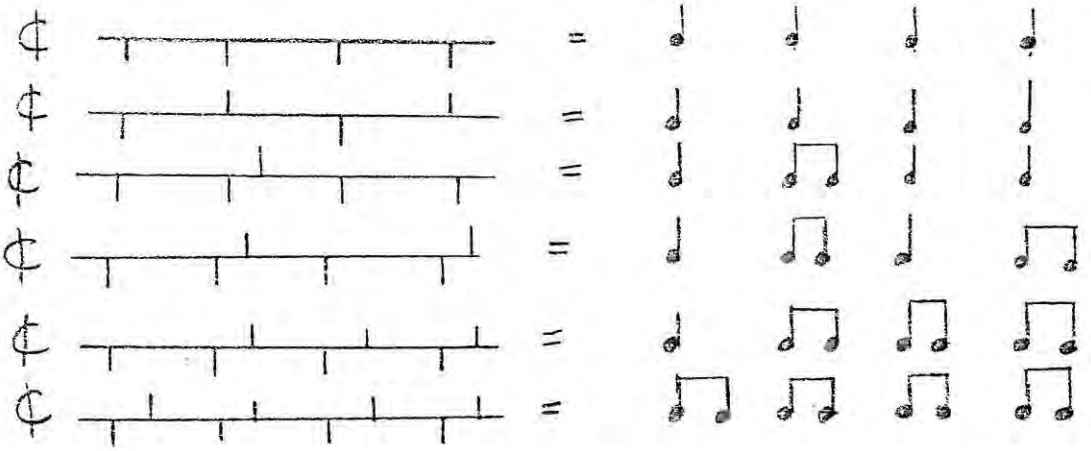
The rhythmic indications for these chords was given by short vertical lines on a long horizontal line. (13) If the vertical line was below the horizontal line then the chord was to be strummed downward (towards the ground) which resulted in the notes of the chord being played from the lower to the upper in actual pitch.

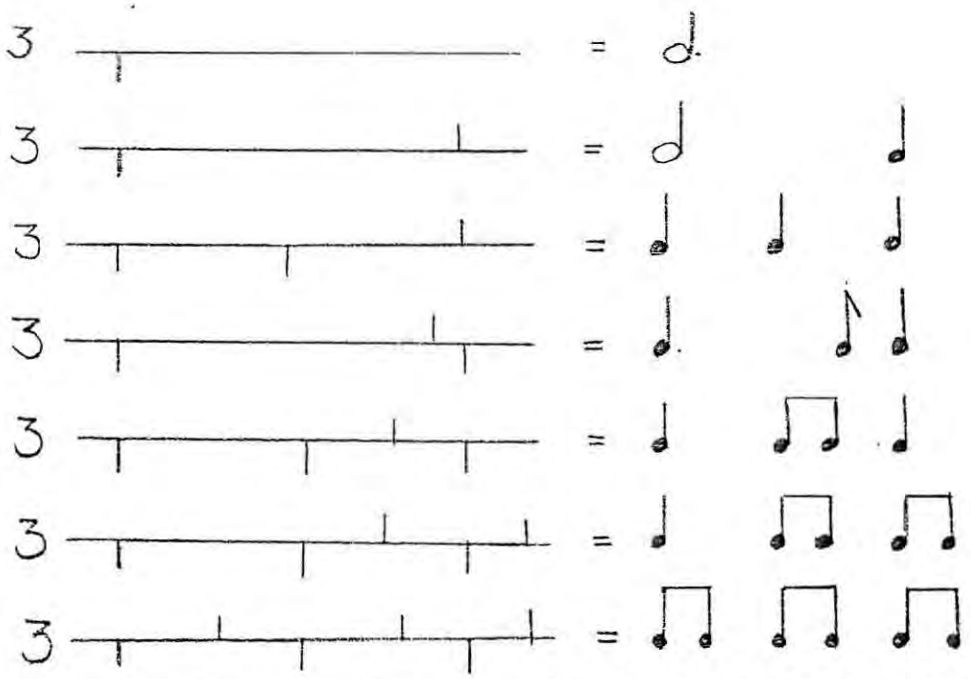


Any vertical lines above the horizontal required the chord to be strummed in the opposite direction.

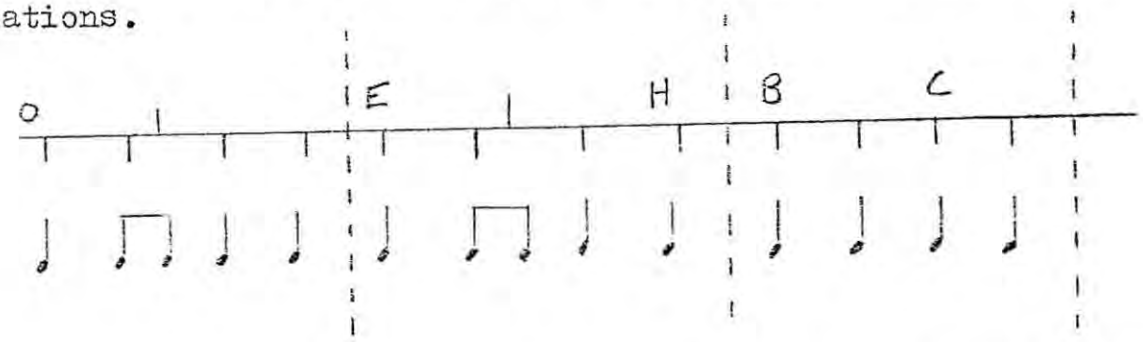


The up and down strums were usually given to quavers which were recognizable from their relative spacing.

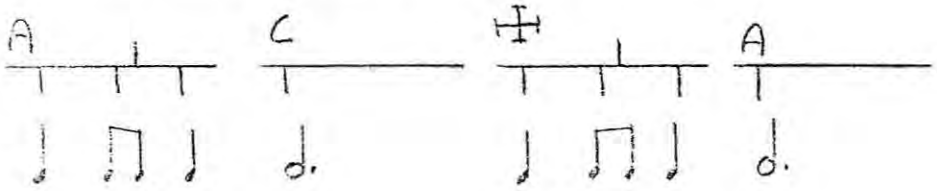




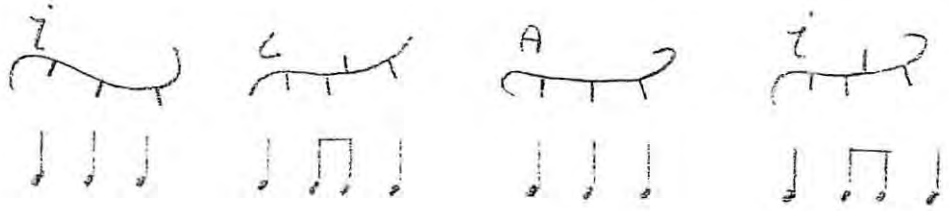
The following is part of a typical piece of music which uses only alphabeto chords with their rhythmic incications.



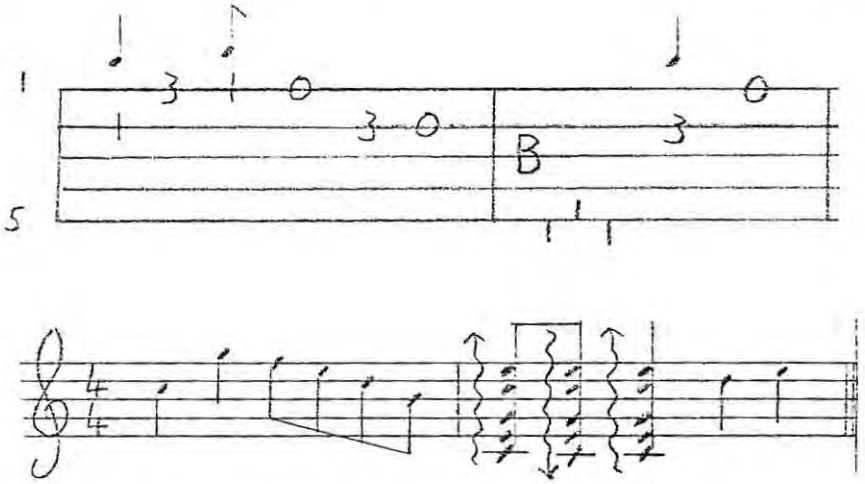
As we can see, the grouping of the notes is not particularly obvious and so the composers began to break off the horizontal line at the end of every "bar".



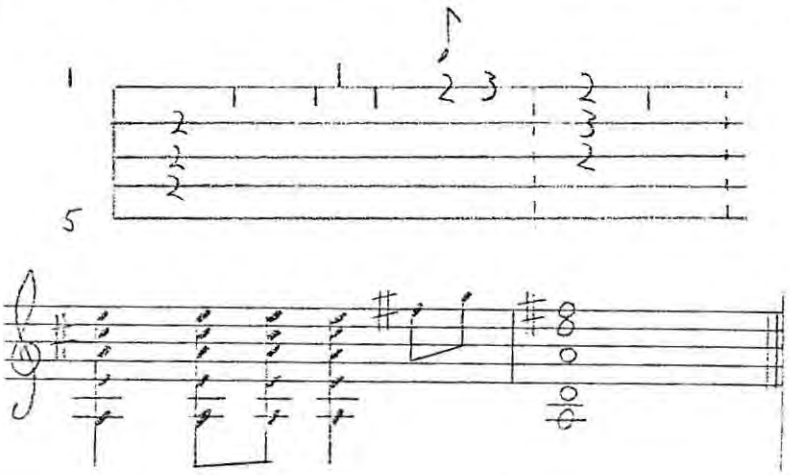
The horizontal lines became more "fancy" after a while and in the end a typical manuscript showing the alphabeto notation would look something like this:



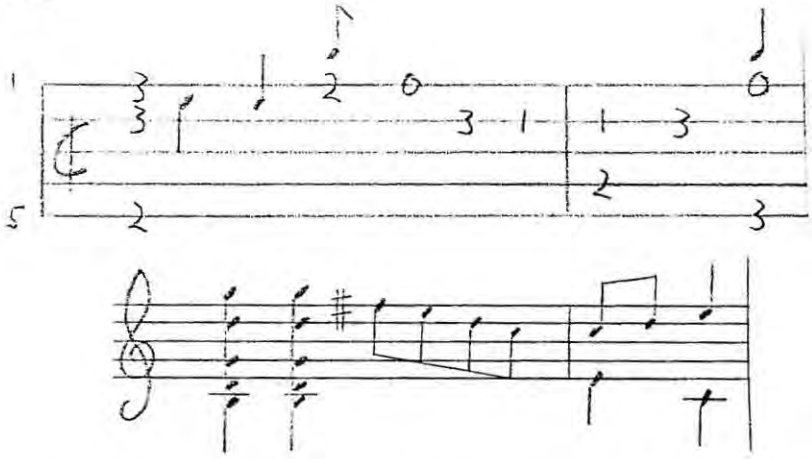
The alphabeto chord system was combined with the tablature system so that the pieces consisted of a combination of strummed chords (rasgueado) and single notes (punteado). The tablature remained unchanged but the bottom line now took on the extra function of being the horizontal line from which the rhythm of the alphabeto chords could be indicated.



Some manuscripts show the use of alphabeto rhythm indications for the repetition of chords in tablature form.

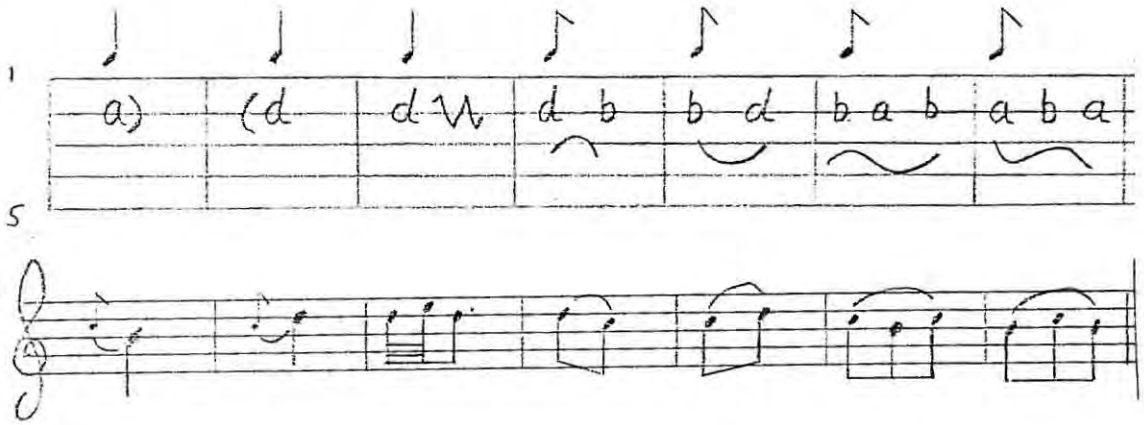


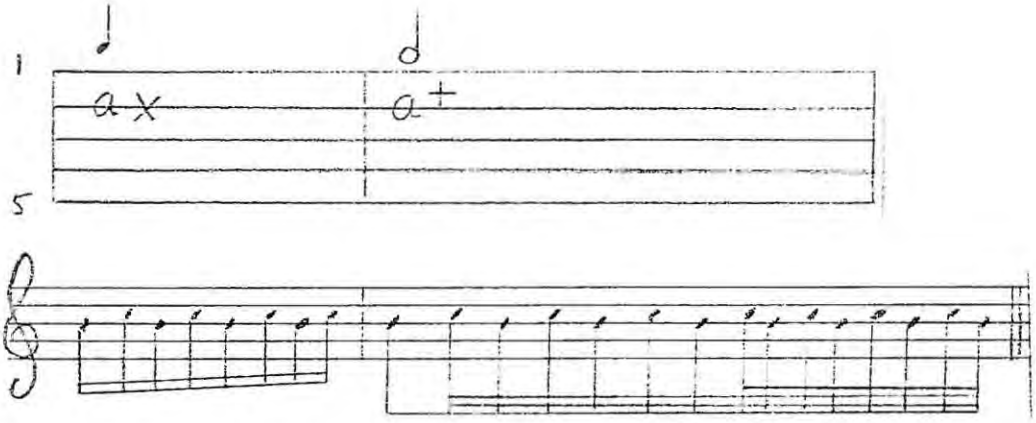
Compositions by the baroque guitarist, F. Corbetta show the use of mensural notation between the top two tablature lines to give the rhythm of the chords. The usual rhythm indications above the top line are still used for the single notes.



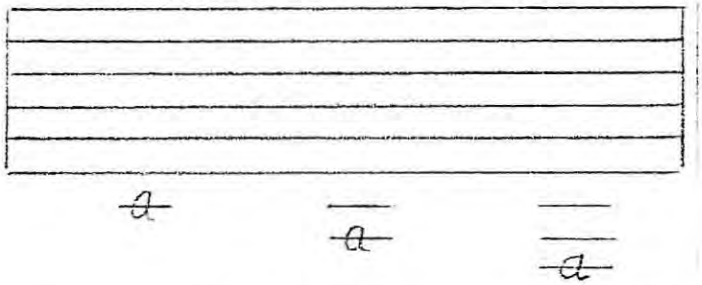
This was a primitive attempt at more accurate part writing and the final stage of tablature before the change to actual pitch indication during the Eighteenth Century.

Because of the inability of the guitar to sustain notes for any length of time, a large number of ornaments were used. A lot of these were not indicated in the tablature but were added by the performer at his own discretion. The following were some of the ornament and slur indications used by composers, particularly for the lute. (14)



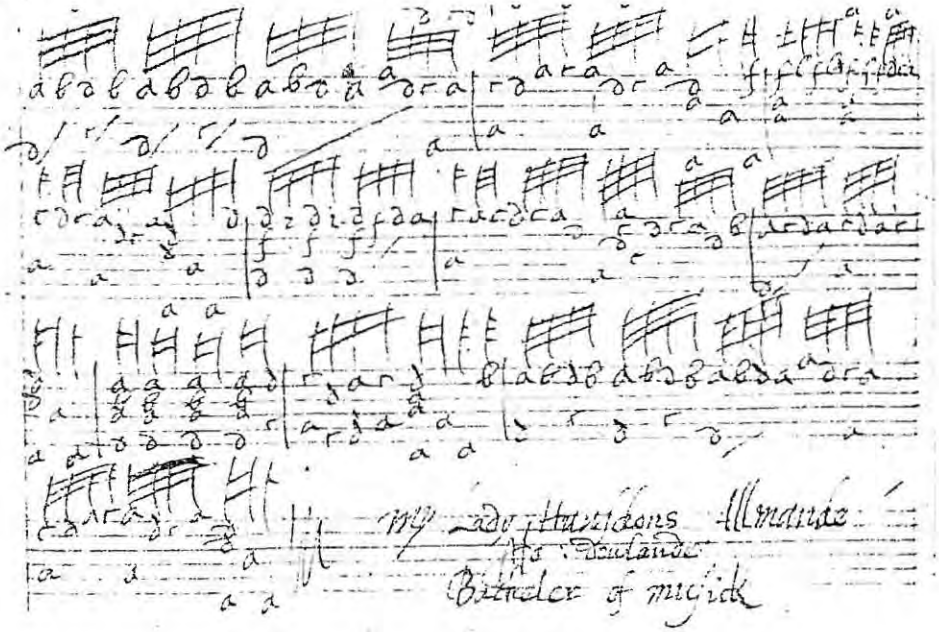


During its later years the lute had diapasons (extra bass strings) added to it. These strings did not pass over the fingerboard and were, therefore, only meant to be played open. They were indicated below the tablature on what looked like ledger lines.



The diapasons were usually tuned to F D C′ but were often tuned to suit the key of the piece.

To conclude this section on tablature, here is an extract of lute tablature by John Dowland written in his own hand. (15)



NOTES

1 G. Chase, The Music of Spain, pp. 53-55.

2 The double strings were tuned in unison or, sometimes, an octave apart on the lower strings, e.g.,

GG dd gg bb

or

bg dd′ gg bb

3 D. Heartz, An Elizabethan Tutor for the Guitar, p. 12.

4 A. Bellow, Illustrated History of the Guitar, p. 102.

5 F. Grunfeld, Art and Times of the Guitar, pp. 83-122.

6 A. Bellow, Illustrated History of the Guitar, p. 57.

7 D. Poulton, John Dowland, Appendix II.

8 D. Poulton, John Dowland, Appendix II.

9 F. Grunfeld, Art and Times of the Guitar, p. 79.

10 D. Heartz, An Elizabethan Tutor for the Guitar, pp. 9-12.

11 A. Bellow, Illustrated History of the Guitar, Plate XXXVIII.

12 F. Grunfeld, Art and Times of the Guitar, pp. 74, 76 & 77.

13 J. Wolf, Handbuch de Notationskunde II, pp. 177-188.

14 Hofmeister, Lautenmusik - J.S. Bach, p.7.

15 D. Poulton, John Dowland, p. 344.

C H A P T E R I I I

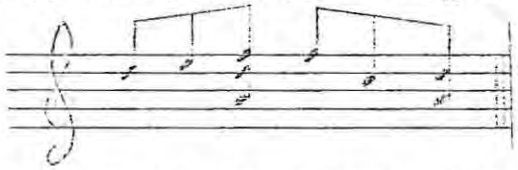
THE CLASSICAL GUITAR BEFORE TARREGA

The eighteenth century saw two major events take place in the guitar world which resulted in a sudden increase in the number of composers and performers. These were the addition of the sixth string to the guitar and the change over from writing in tablature to mensural notation.

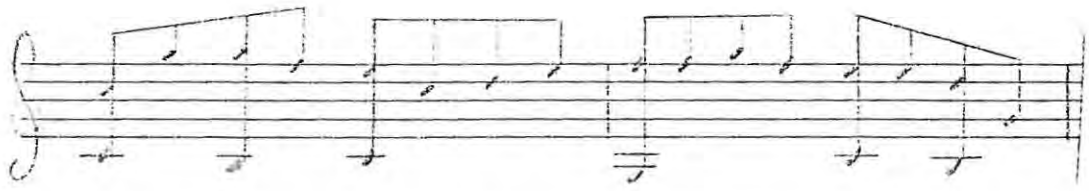
The change to mensural notation took place first in Italy where the first thoughts were that the guitar should use the same notation as the violin. The violin clef (treble clef) was, therefore, used with the guitar sounding an octave lower than written. (1) The earliest examples of works written for guitar in mensural notation are very "violinistic" and primitive. They also made use of the violin position indication, e.g.

VIOLIN POSITION	ACTUAL GUITAR POSITION
I	I or II
II	III or IV
III	V
IV	VII

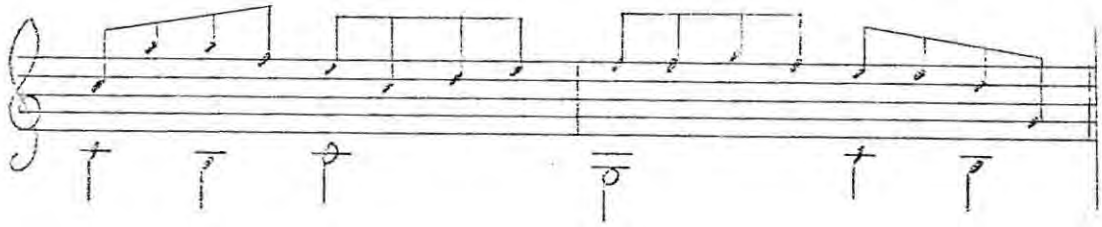
Violin music did not make any attempt to denote different voice parts of different time values, e.g., multiple stops would be indicated on a single stem.



But the guitarists of the time were used to not having the different voice parts accurately indicated as tablature did not cater for it either. Despite the notation, the better guitarists would use their musicianship as a guide as to how long to sustain the notes of the different parts so that a passage such as:

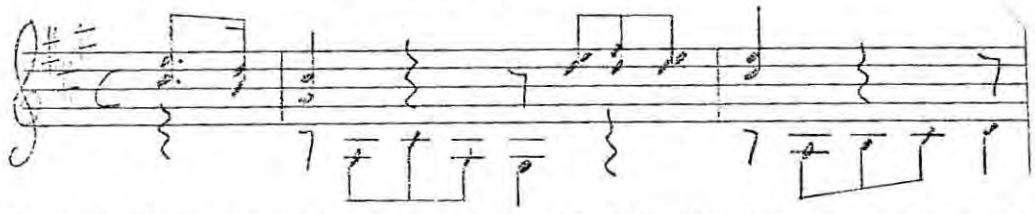


would have been interpreted as:

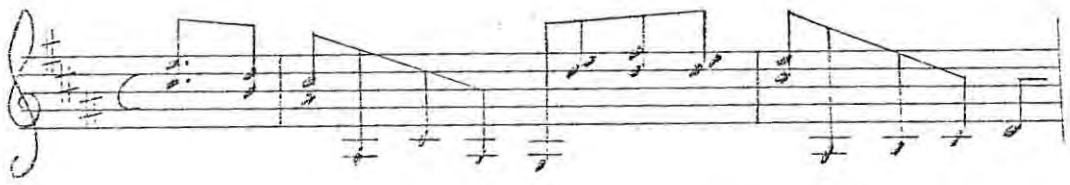


The change over from primitive notation to that which indicated the voice parts more accurately took place at the end of the Eighteenth Century and during the early part of the Nineteenth. Both the Spanish guitarists, F. Sor (1780-1839) and D. Aguado (1784-1849), claimed that it was F. Moretti (1785?-1839) who made them aware of the possibility of accurately indicating the sustaining of two different parts on the guitar.

A good example of the transition from the primitive to the more accurate notation comes from M. Giuliani (1781-1829). The following example shows the first few bars of one of his pieces as notated by him.

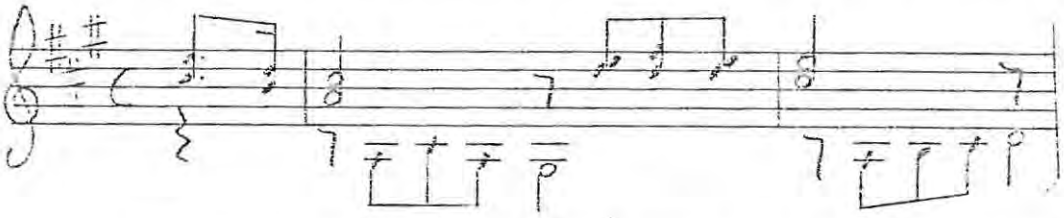


Another guitarist and friend of Giuliani, by the name of Giuseppe Ricca, used to copy from Giuliani's music for his own use. The next example shows how he wrote the same extract back into primitive notation.



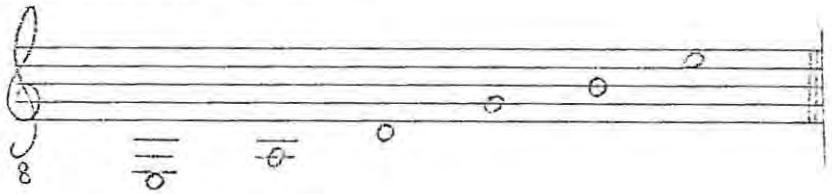
Because the guitar was not able to sustain a note

for very long, Giuliani and his contemporaries adopted a "black note" approach to composition, i.e., the compositions abound in the use of crotchets and quavers, etc., but with very few minims. This was to indicate as accurately as possible, the duration of each note. But modern editions of their music give longer durations to a lot of the notes. For example, the above Giuliani extract would be printed as:



It was only during the middle of the Nineteenth Century that guitar notation reached an advanced stage of accuracy with respect to duration, because improvements in guitar construction gave the instrument better sustain. But even today the written music and what is played is not exactly the same and depends to some extent on interpretation.

The addition of the sixth string, a perfect fourth below the fifth string, gave the instrument its final tuning which has not changed since.

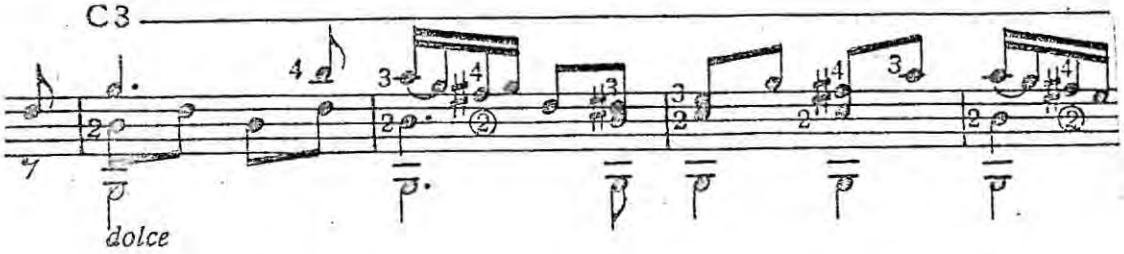


The methods used for tuning the strings were the same as those used on the renaissance and baroque guitars, i.e., by relative tuning and octaves, but the instruments were now tuned to an absolute pitch with the help of a tuning fork.

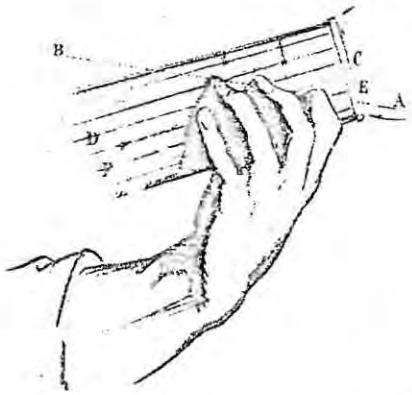
Every instrument has its favourite keys, i.e., those in which it is easiest to play. On the guitar these keys are the ones which use the open strings the most, particularly the bass strings, i.e., E maj, E min, A maj, A min, D maj, D min, G maj and C maj. The flat keys are the most difficult as the order of flats in the key signatures is B E A D G, etc., which are all the open strings of the guitar.

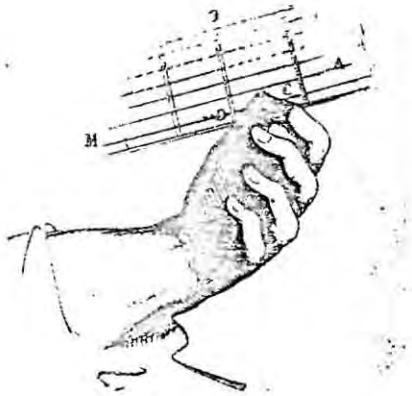
To find out more about the playing technique used by the early classical guitarists, we can look to the methods and music of the composers and performers of the time and in particular those of Sor, Carcassi and Giuliani. Most of our information comes from the method by Sor. In his Methode pour la Guitare of 1830, he goes into great detail of the technique and it represents the fruit of his forty years of experience.

The method is in three parts. (2) Part one begins with a description of the correct position of the instrument. The pupil must sit in a normal chair and rest the left foot on a foot stool about twelve centimeters high. The guitar must then rest on the left leg but should not touch the body. The guitar should be at such an angle so that the tuning keys are level with the shoulders. He recommends that the left hand be placed against the underside of the neck and that the thumb be in the same line as the frets but behind the neck and opposite the first two fingers. The left hand fingers should form an arch over the fingerboard so that the fingers can fall directly on to the strings and be stretched far enough apart so that they can reach over four frets. It must be remembered that the scale length of the guitar of this period was shorter than our present scale length and so the stretches written in their music were actually easier to play than they are now, e.g., in the following extract from the Sonata Opus 22 by Sor.



The illustrations below are taken from his original method and were used to help with the explanations of the left hand and guitar positions.





Carcassi, in his method, states that the left hand thumb is occasionally used to stop the sixth string over the top of the neck. (3)

For the right hand Sor explains that the right forearm should rest on the edge of the lower bout. The little finger should position itself on the soundboard just forward of the bridge and below the strings. It should apply only the slightest pressure on the board except when playing arpeggios or staccato. The first and second fingers should be a right angles to the strings.

The guitars played by Sor and his contemporaries did not have raised fingerboards and so the strings were closer to the soundboard. So the above technique was possible on the older guitars but is very awkward on the modern guitar.

"The thumb when playing a string should move in a short rotary movement so that it describes a circle whose tangent is the string". Sor also states that, as the ring finger is very weak, it is better to avoid using it except where it is absolutely indispensable.

Giuliani advocated that the little finger should not be rested on the soundboard as it affected the resonance of the instrument and hampered the movement of the right hand. (4) He also used the index and middle fingers only for the playing of scale passages using the thumb only for bass lines. It was common practice with other players to alternate between the thumb and index in single line runs.

No mention is made of the use of the rest stroke in any of these methods so it was most likely not used. But the Carcassi method does advise the use of the rest stroke with the thumb only.

Sor gives instructions to the pupil on how to choose the best strings, saying, that if they are too thick, they will "paralyse" the soundboard by making the tension too great. He also gives the same method for testing the intonation of a string before putting it on the guitar as did Sanz during the Baroque.

Barring with the first finger was, of course, common and the Carcassi method gives two types;

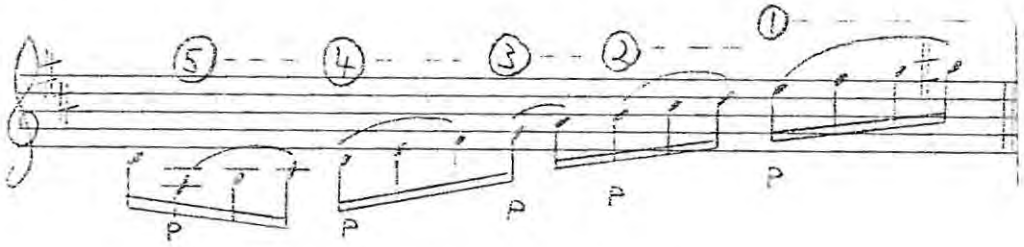
1 Grand Bar (Grand Barre)
2 Little Bar (Petit Barre).

The position system used was the same as it is today

i.e., the number of the fret in which the first finger is, is also the number of the position which covers four frets.

Sor used a type of ligature called portamento or porta voz which was achieved by running the finger from one note to the other on the same string always keeping it depressed to make a rapid chromatic scale sound. Giuliani also wrote glissando passages.

The use of the slur or ligado was common and Sor even demonstrates the playing of long ascending scale passages where the right hand thumb only plays once on each string, the rest of the notes being slurred.



In his Opus 16, theme and variations, the eighth variation is played by the left hand alone.

One of Giuliani's unusual techniques was the use of the violinistic vibrato called ondeggiomento which, when played on the guitar, sounded more like a trill. He indicated it with a ~~~ and it was played by rapidly moving back and forth over the fret. It is obvious that he did not mean the ondeggiamento as a trill because, in the same work, a trill would be indicated with the standard "tr".

The main difference between the Carcassi and Giuliani method of chord playing was that Carcassi always played his chords "a little broken" while Giuliani always played his chords strictly "unisimo", except on certain rare occasions where he used the strummed chord for emphasis, e.g., the last movement of the Opus 15 Sonata.

In Part Two of his method, Sor explains how the guitar may be made to imitate the sound of other instruments. This he did by:

(1) Varying the tone colour, i.e., the closer the right hand plays to the bridge, the more brilliant and sharp the tone.

(2) Scoring the music using the peculiar characteristics of the instrument to be imitated.

Therefore, to imitate the sound of the horn, its characteristic intervals will be used and played with a full and forced tone, e.g.,

To imitate the oboe the right hand should play with the nails very close to the bridge to get the nasal sound.

However, what is of more interest to this study is that Sor had full realization of the contrasting tone colours that were available on the guitar and he no doubt used them in his playing. Giuliani showed interest in using different tone colours even in his early works, e.g., in Opus 6 he indicates that "the right hand above the fifteenth fret then slowly returning to its place". He co-ordinates this slowing ease in sharpness in the timbre with a crescendo. Giuliani called the soft tones obtained by playing near the fingerboard suoni flautati (fluted tones).

The dilemma of whether to play with nails or finger tips existed then as it does today, although , with the improved techniques and understandings of today, the nail method is generally preferred. Sor in his method stated: "I have never heard in my life any guitarist whose method of playing was barable if he played with his nails". On the other hand, another virtuoso guitarist and friend of Sor, D. Aguado declared, in his method: "I prefer to play with nails because, if properly used, the resulting sound is clear, metallic and

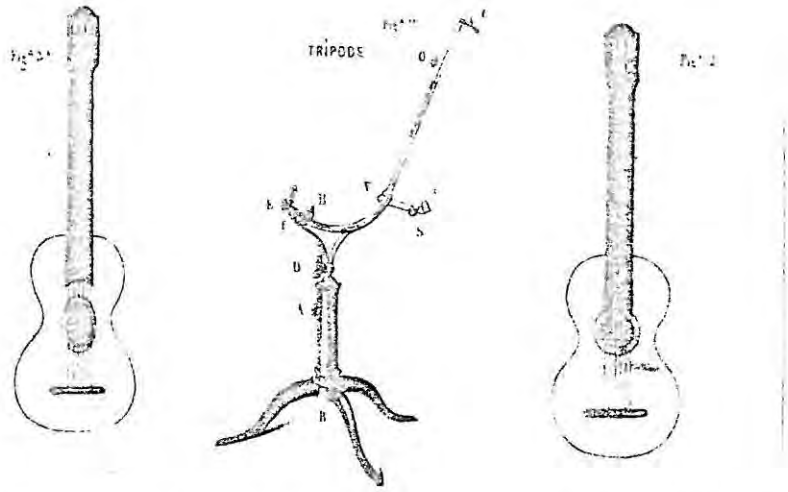
sweet, and used in the right way they enable very fast runs to be executed with great clarity". (5)

Both Giuliani and Sor used natural and artificial harmonies. Giuliani, realizing the difficulty of playing artificial harmonies, indicated that they could be substituted with suoni flautati.

Giuliani was always very concerned with the dynamics in his compositions. Not only the crescendos, decrescendos, pianos, fortes, etc., but also that the melody line should be brought out above the accompaniment. In a few cases he would indicate that a certain part should be played out above the rest, e.g., in Opus III, Part 2, No. 2, he writes "marcate le note di sopra".

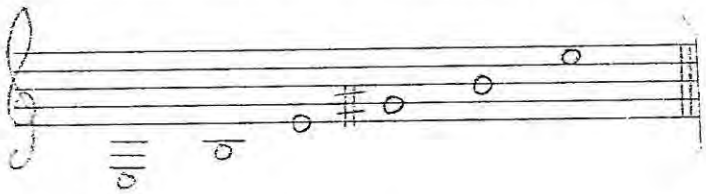
The technique of scordatura, which was so frequently used in connection with the tablature system for reasons already given, now becomes much less frequently used due to the added difficulties it creates with the pitch notation. The composers, particularly Sor, sometimes changed the tuning of the sixth string to suit the key of the piece, e.g., in his Andante Largo, Opus 5, No. 5, he indicates that the sixth string is to be tuned down a tone to D. The piece is in D major. The Minuet, Opus 24, nO. 6, requires the sixth string to be tuned up a semitone to F. The piece is in F major. Sometimes the fifth string has also to be retuned as in his Minuet, Opus 11, No. 1, in G major which has both the sixth and fifth strings tuned down a tone, giving D and G respectively.

Dionisio Aguado came up with an invention which, although it did not last long, is rather interesting and worth a mention. He was concerned with the fact that the holding of the guitar against the body resulted in the vibrations in the woods being dampened which, in turn, affected the sonority of the guitar. So he invented a guitar support stand which held the instrument for the player, thereby eliminating the dampening effects. It was known as a tripodion or Aguado machine. (6)



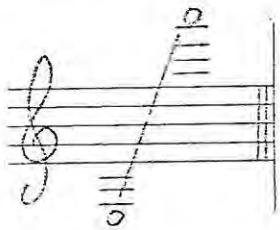
A last look at guitar technique during the Nineteenth Century, before Tarrega, comes from Hector Berlioz (1803-1869). He wrote a famous treatise on instrumentation which contains a section in which he gives some advice on how to write for the guitar, although he also makes it clear that "it is almost impossible to write well for the guitar without being able to play the instrument." (7)

He describes the guitar as being suitable for accompanying the voice and for solo work of an intimate character. He also states that sometimes the following tuning is used on the guitar:



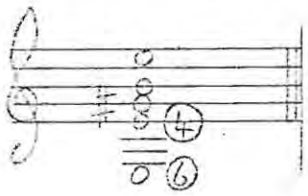
but one cannot help thinking that this must have been for simple accompaniment in the key of E major and no more.

He describes the guitar as having a range of three octaves and a fifth.

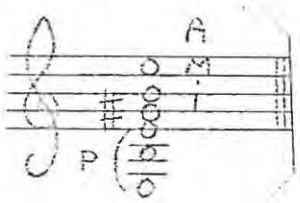


The modern guitar goes one tone higher.

As far as right hand fingering is concerned, he says "the thumb is used for plucking the three lower strings, the forefinger plays on the third string, the middle finger on the second string and the third finger on the first string. Consequently, for chords of more than four notes, the thumb has to slide across the lower strings while the three other fingers strike the three highest strings directly". This meant that to play the following chord was impossible:

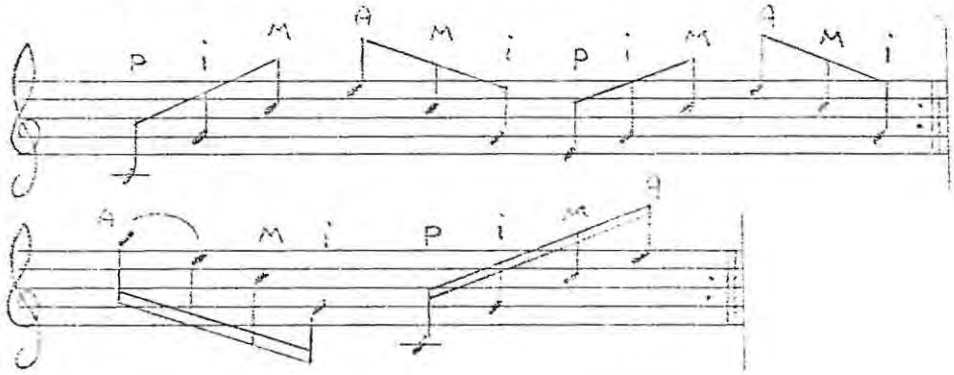


as the thumb could not slide from the sixth string to the fourth string without striking the fifth string. To solve the problem the fifth string would have to be included.

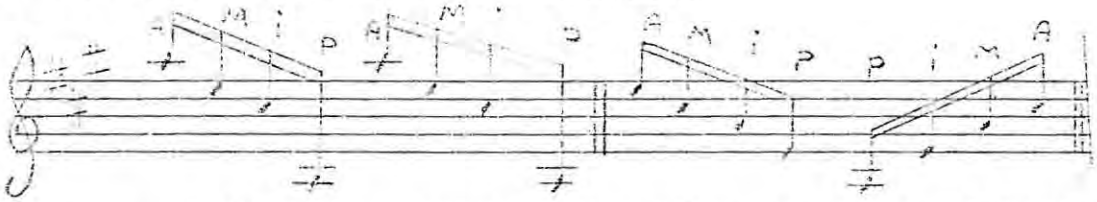


For chords using only lower notes the fingers could play on other strings than only the first, second and third.

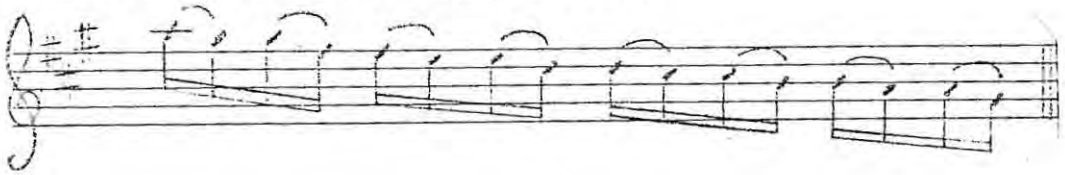
Berlioz also gives examples of which arpeggiated chord patterns are of good effect and which are awkward, e.g., the following are of excellent effect:



But the following are rather awkward:

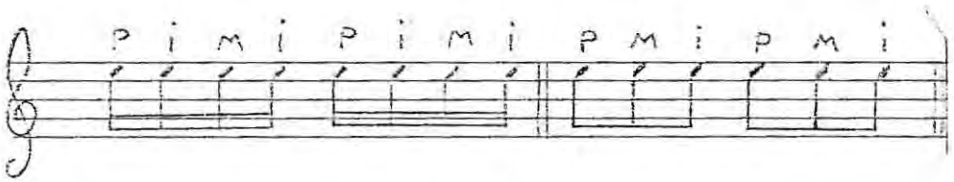


"Scales in groups of two slurred notes with the repetition of one note sound well".



"Scales in thirds, sixths and octaves are more difficult but can be executed at a moderate speed".

For playing tremeloes he uses the thumb and fingers.



Berlioz concludes his chapter on the guitar by stating that since the introduction of the piano into all the homes where was any interest in music, the guitar had been gradually disappearing. This was, of course, quite true. With all the virtuoso pianists and violinists, etc., of the nineteenth century rising to fame on the concert stage, the guitar, with its then inadequate technique, had no chance. But the situation was to be saved towards the end of the Nineteenth Century by the improved techniques of Tarrega, the founder of the modern school of guitar playing, and the improvements in guitar construction by Torres.

N O T E S

1 T. Heck, The Birth of the Classic Guitar and its Cultivation in Vienna reflected in the Works of M. Giuliani, pp. 149-170.

2 F. Coste, Metodo Completo Para Guitarra, pp. 1-45.

3 M. Carcassi, Complete Guitar Method, Part I, pp. 9-15.

4 T. Heck, The Birth of the Classic Guitar, p. 175.

5 E. Pujol, The Dilemma of Timbre on the Guitar, pp. 43 and 44.

6 F. Grunfeld, The Art and Times of the Guitar, p. 197.

7 H. Berlioz, Treatise on Instrumentation, pp. 145-147.

C H A P T E R I V

THE MODERN SCHOOL OF GUITAR PLAYING

Tarrega left no written method of rules concerning his establishment of the basics of modern guitar technique.(1) His ideas on technique were, however, handed down to his pupils and pupils of pupils. Many aspects of Tarrega's technique had been in use before, but he gets the credit for firmly establishing them as being an essential part of correct performance.

He showed that the use of a foot stool was important in the holding of the guitar in a position which would give both left and right hands their most natural position. Both Sor and Carcassi had used the footstool before.

The Tarrega method was particularly directed at the position and use of the right hand fingers. They should be at right angles to the strings and the little finger should not touch the soundboard or bridge. He made a special study of the ring finger and recommended that it be developed and used as much as the index and middle fingers. He also showed the advantages of using the nails of the right hand. These were that they gave greater clarity, a greater variety of tone colours and a more precise technique.

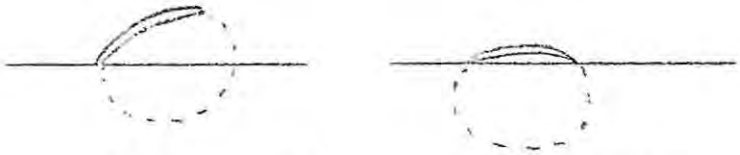
The manner in which the string was struck was also important in that it affected the tone of the instrument. He therefore adopted a technique which, according to Tarrega, had been previously used by Julian Arcas. This was the rest stroke or apoyando which consisted of striking the string more towards the soundboard and then resting the finger on the lower string, rather than plucking it upwards in a "free stroke". The rest stroke is quite natural on plucked string instruments and was known and used by harpists during the Nineteenth Century, but no written method before Tarrega uses it.

Because Tarrega was particularly concerned with tone,

he also used to experiment by trying a note on different strings to find where it would sound best, resulting in the greater use of the upper frets.

The revision of guitar technique and the revival of interest in the guitar as a concert instrument was carried on by Pujol, Llobet, Segovia and many others. They have modified and improved on the Tarrega method but still retain his basic ideas.

An important, although slight change in the right hand position of Tarrega, is in popular use today. This is the turning of the hand so that the palm more or less faces the elbow but still keeping the fingers at right angles to the strings. This results in the string being struck by the rounded side of the nail giving a better tone. (2)



'round tone' 'sharp tone'

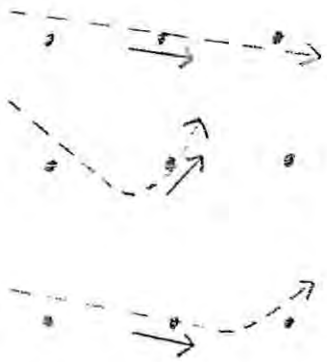
As the actual tone produced on the guitar depends largely on the nails of the right hand, the importance of their condition and shape has become fully realized. (3) They are best shaped to the same contour as the finger tip and long enough to extend slightly past the tip, but, if allowed to grow too long, they will hamper speed and give a thinner sound.

A closer look at the Segovia technique will give further examples of improvements on the Tarrega method. (4)

Segovia only places the front half of his foot on the foot stool, leaving the heel in the air.

This allows for more flexibility in both foot and leg. His left arm hangs vertically from the shoulder. This eliminates effort to support the upper arm and adds to the general relaxation. The right hand should hang in a natural manner at right angles to the strings. Segovia complains that students tend to tense up while playing and so lose this position. The right hand thumb should be kept well forward of the index finger so they do not get in each other's way.

Segovia plays the rest stroke with an almost straight finger which moves mainly from the knuckles and not the joints. For the free stroke he has a more curved finger. There have, however, been more recent improvements and ideas on the correct method of playing the free stroke.(5) The present thought is that the free stroke should, as close as possible, resemble the rest stroke. The string should still be struck more towards the soundboard than away from it. This requires a straightish finger and greater control and precision.

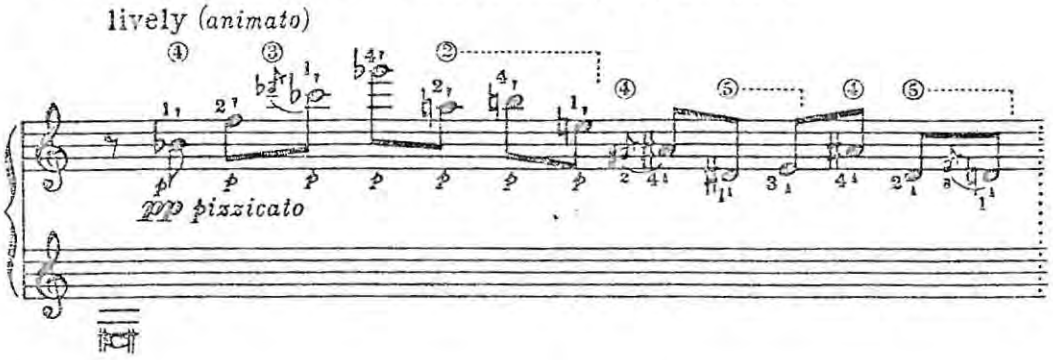


Segovia has his thumb nail shaped in such a way that he can change from playing with the nail to the flesh with only a slight hand position change. This gives him a greater tonal variety in his bass line allowing for more interesting interpretations.

He also teaches the importance of a steady right hand and minimum movement in both hands saying that the left hand fingers should be at a minimum elevation above the strings and should only stop a string with enough pressure to get a

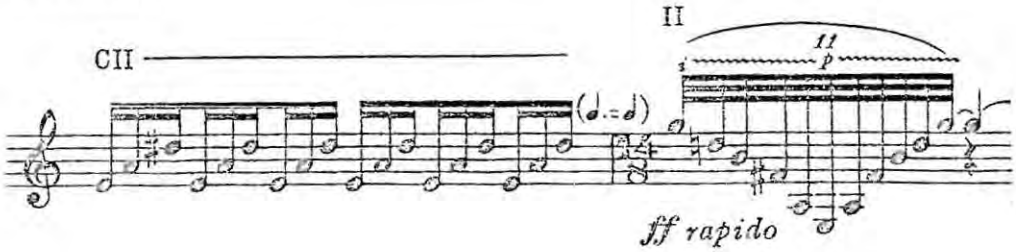
a good tone and no more.

Modern composers demand a greater number of effects from the guitar. The following extract is a pizzicato passage from the B. Britten Nocturnal, Opus 70.

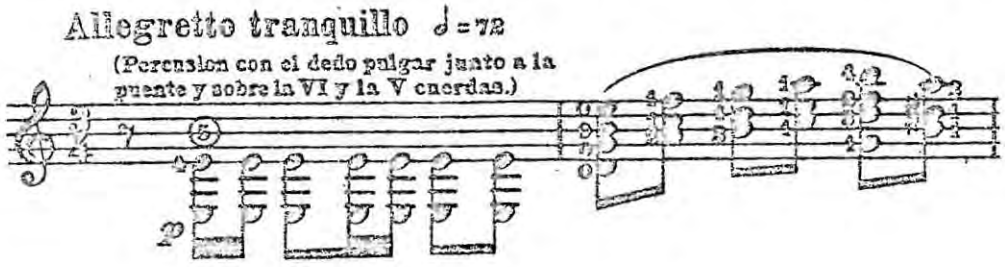


Pizzicato is played by using the side of the right hand to dampen the strings next to the bridge and then plucking the strings with the thumb.

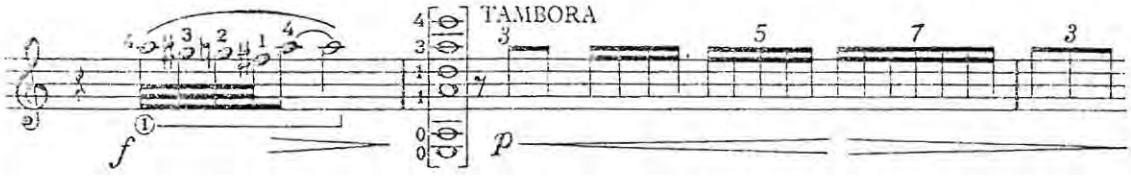
Another common technique is the rapidly played arpeggio, strummed in the style of a harp using the thumb in the upward direction and the index or middle fingers in the downward direction as in this extract from Paseo by P.R. P.R. Fricker.



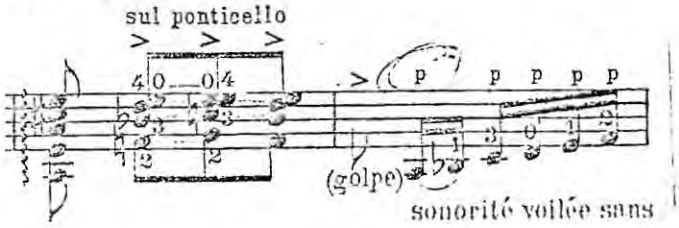
In the opening bars of the Fandanguillo, Turina writes for an effect called tambora where, instead of right hand plucking the strings indicated, the thumb strikes them sharply near the bridge, thus giving a more percussive effect.



Another example of this is to be found in the Study No. 8 by Dodgson and Quine.

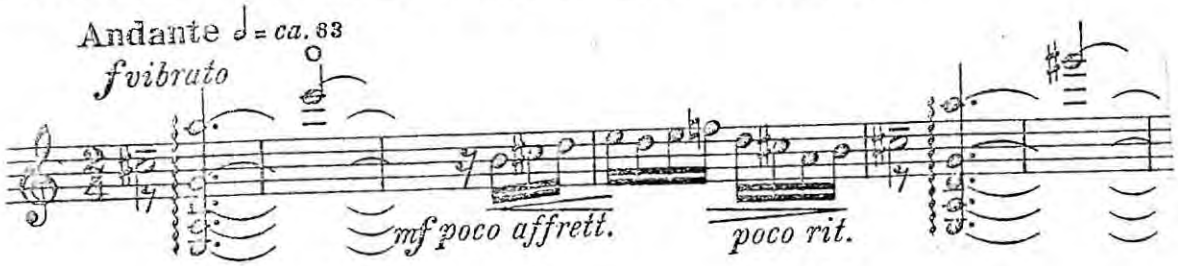


A completely percussive effect which has been borrowed from the flamenco guitar is the glope. Turina uses the glope in his Hommage to Tarrega.



The glope is played by tapping the bridge of the guitar with the right hand fingers in the rhythm indicated.

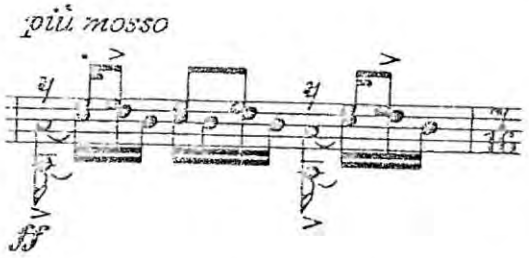
Modern notation allows for much more accurate indicating of correct durations of the notes. But there is still a problem in the fact that it is not always possible to stop the vibrations on some strings at the end of the note's duration as this would require too complicated a technique. Many modern composers have used the "let ring" or "let vibrate" sign to show that the string should sound on till it fades away or the string is again used for some other note. The indication consists of a tie mark as follows:



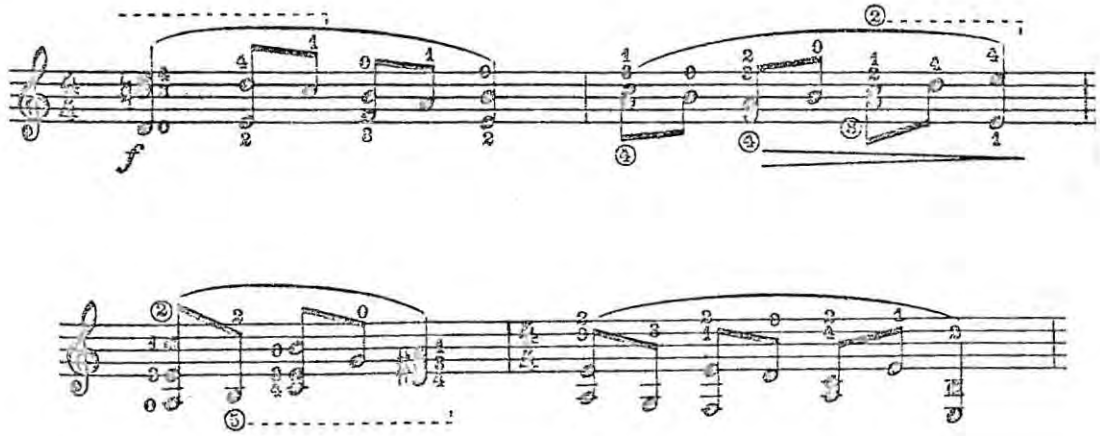
This is an extract from the Fantasia by Gerhard.

In his work Drei Tentos, Henze goes back to the "black note" approach where he uses a semiquaver, but with a

"let ring" sign attached to give it the duration of a minim.



Francis Poulenc, in his Sarabande for guitar, goes right back to primitive notation and leaves the sustain of the different parts to be interpreted by the performer.



N O T E S

1 T. Hofmeester, Is there a School of Tarrega? Guitar Review No. 1.

2 T. Usher, Humour your Guitar, Guitar Review No. 17.

3 T. Usher, The Elements of Technical Proficiency, Guitar Review No. 15.

4 V. Bobri, The Segovia Technique.

5 T. Usher, Tone and Tonal Variety, Guitar Review No. 16.

PART III

THE EVOLUTION OF MUSICAL STYLE AS REFLECTED IN THE LITERATURE OF THE GUITAR

I N T R O D U C T I O N

This section of the thesis is not a discussion of the literature as such, but a study of the general development of musical style within the guitar literature. For this reason certain works have been chosen which best exemplify this development. Only original guitar compositions have been included, except for the vihuela and lute music which the guitar has naturally inherited. However, much of this latter music has not as yet been transcribed and published for guitar and, therefore, does not come into this discussion.

C H A P T E R I

THE MUSIC OF THE RENAISSANCE

The late Middle Ages and early Renaissance was primarily an era of vocal polyphony. But this same period saw a rise in the interest in instrumental music by serious composers. At first this instrumental music consisted of arrangements and imitations of vocal music but, because of the limitations of the instruments upon which it was performed, it did not reach the high levels attained by vocal music. It was, therefore, realized that instrumental music had to be composed in a style independent of that of vocal music.

The earliest instrumental music which shows the most originality and independence of style is that of the Spanish vihuelistas. The first collections of vihuela music come from the early Sixteenth Century when composers began to write their compositions down in full for the first time. Previous to this the vihuelista would have either improvised or played from memory. The sixteenth century vihuela music forms an important part of the guitar's repertoire today as well as playing its part in the general history of music.

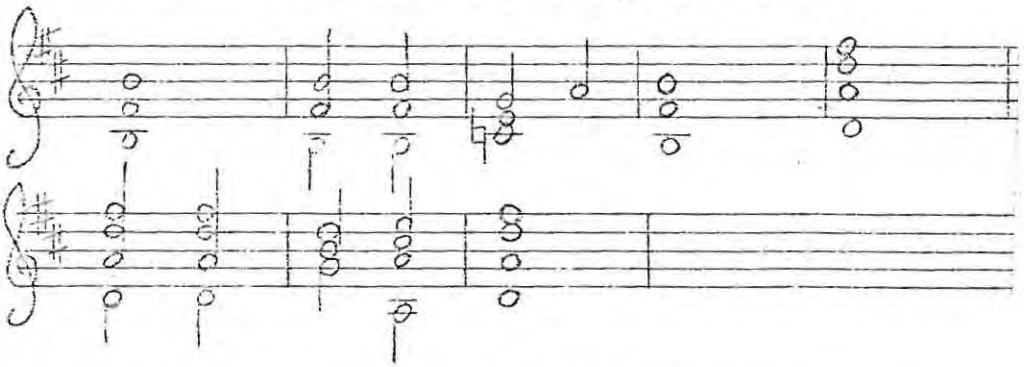
Unfortunately many of the original tablatures fell into disuse during the following centuries and were lost. But thanks to the work of such musicologists as Conde de Morphy, Oscar Chilesotti and Felipe Pedrell, many vihuela tablatures have been saved from oblivion and at the International Congress of Musicology held in Vienna in 1909, certain principles were set down so that the transcription of this music from the tablature to notation would be in such a manner that the resulting sound would be identical to the original.

The first of the great vihuelistas was Luis (Luys) Milan (1500-1561). He was born in Valencia of a noble family and became a famous musician, poet and courtier at the court of Queen Germaine de Foix. In 1535 he published the very

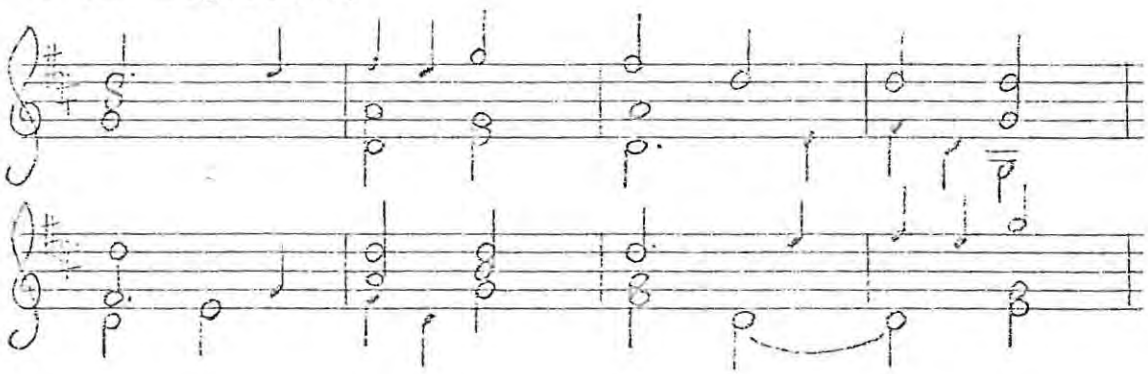
first book of vihuela music titled Libro de Musica de Vihuela de Mano Intitulado el Maestro, which he dedicated to his admirer and benefactor, King John III of Portugal.

El Maestro was not just a collection of music. Milan designed it as a tutor containing instructions on tuning and playing and having the pieces graded in difficulty from from very easy to very difficult. The pieces are in the form of fantasias, tientos, pavans and solo songs with vihuela accompaniment.

The bulk of Milan's compositions were fantasias. They showed best the resources of the vihuela and gave the composer free reign to his imaginations. In the collection Hispanae Citharae Ars Viva by Pujol are two fantasias by Milan. The first is the "Fantasia del Quarto Tono" (Fantasia in the Fourth Mode). As seen in this fantasia, Milan was one of the first composers to put tempo indications to his pieces. The indication in this case is "Compas Apresurado" (hurried time). It has a free form and is characterized by motifs being repeated in different registers, e.g., it opens with the first four bars being repeated at a higher level.

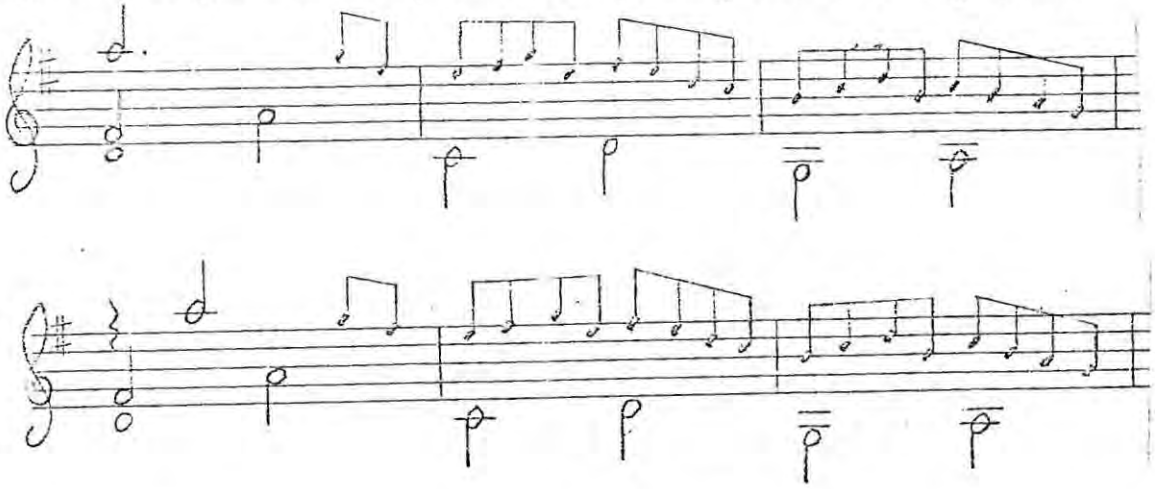


From bar 17 to 25, a two bar motif is repeated four times in different registers.



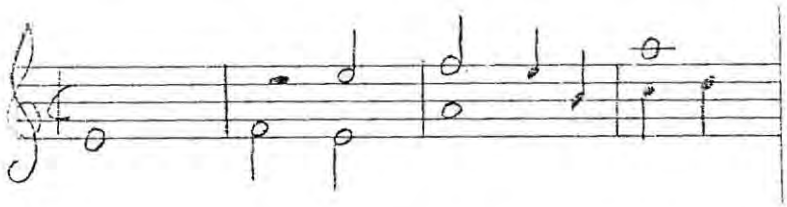
He uses this technique again in the piece, thereby achieving some unity and to the end of the piece he has bars 96 - 107 as an exact repeat of bars 84 - 95. We also notice from this fantasia how the initial themes of the work are not used again but new thematic material is constantly introduced which is typical of the style of the period.

The second fantasia given by Pujol is the "Fantasia de Consonancias y Redobles" (fantasia of chords and scales). This work belongs to the special type which Milan called tentar de vihuela or fantasias de tentos. He instructs that they are to be played in a flexible tempo, the scale passages fast and the harmonies slower. To add to the rubato feeling of the piece he has punctuated the work with pause marks thereby dividing the work into seven sections of slow: fast: slow: pause. This fantasia also shows considerable imitation and repetition particularly in the opening and closing bars.



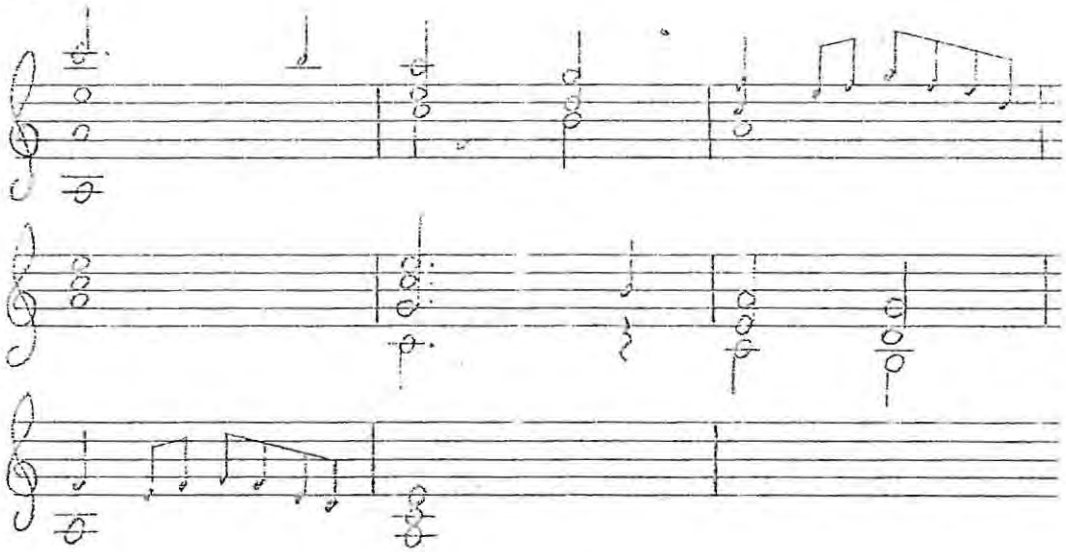
Once again new thematic material is introduced throughout the work and old material abandoned.

Another fantasia by Milan is the No. 26 in the collection International Anthology for Guitar by A. Bellow.



It is of the fantasias de tentos type with alternating scale and chord passages. It is longer than the other fantasias

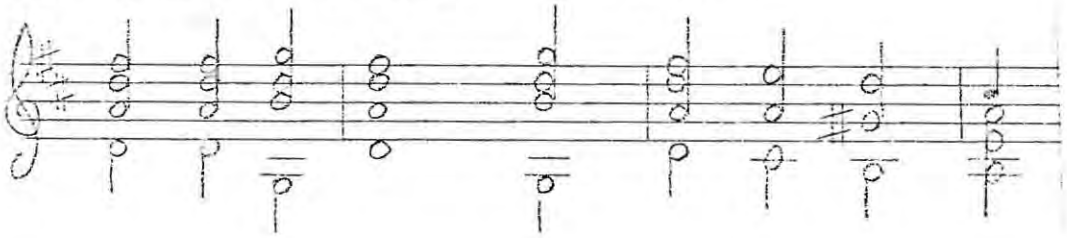
(138 bars) but shows the familiar style of Milan, i.e., free in form and achieving unity through the tonality rather than motific unity in the classical sense and having repetition of phrases and motifs in different registers, e.g., from bars 27 - 34.



New material is continually introduced and, as in his other fantasias, he ends with an exact repetition of a phrase.

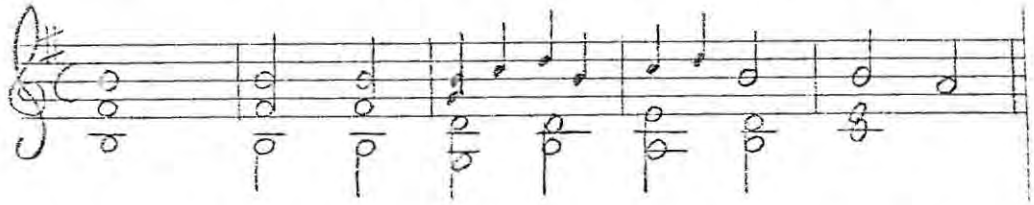
Generally his fantasias show an improvisatory style (stemming from the fact that a lot of improvising had been done on the vihuela during the previous centuries) that brings about a fusion between harmony and polyphony. This results in a distinctly instrumental idiom which skilfully uses figurations and faster moving lines to make up for the lack of sustain which is available in vocal music.

El Maestro also contains six pavanes. The pavan is usually thought of as a slow, stately dance, but Milan indicated that his pavanes were to be played at a faster tempo. He wrote each pavan in a different mode and stated that this was to help the performer become accustomed to the different modes. His pavans are shorter than his fantasias. The No. III is on 24 bars long. This pavan:



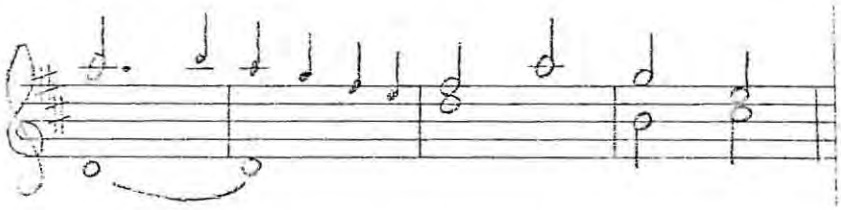
is clearly divided into three periods with two four bar phrases each. This form makes it more immediately appealing to the listener today. The form of the pavan is more closely knit due to the clear phrasing and certain repetition within each period. Each period, however, uses new thematic material. The more regular form also stems from the fact that the pavan was established as a conventional dance form. Milan also admits that he copied the Italian pavan and that two of his pavans use Italian themes.

His other most popular pavan is the No. VI.



This pavan is longer (70 bars) and although there is clear phrasing, it is not as regular in the classic sense as the No. III. New thematic material is introduced throughout the piece with a lot of phrase repetition but further unity of the whole is achieved by Milan by repeating old material in another part of the piece, i.e., the opening bars as shown above are given in an exact repeat at bar 60.

The pavan No. I:



is similar to the No. VI but without the more distant repetition of old material.

The vihuela was ideal for the accompaniment of solo songs and Milan was a master at writing these. In the actual tablature the line to be sung was written in red letters and it is not quite clear whether the vihuelista was to play this line while accompanying a singer thereby doubling the part. Certain of his songs are characterised by very florid interjections by the vihuela after every few bars as in the

romances "Durandarte" and "Con Pavor Recordo el Moro". In the song "Toda mi Vida os Ame" the singer has a more florid part, particularly in the second half.

One of the problems that faces the modern interpreter is how these songs were originally performed. Documents dating from the time state that the singer would often improvise embellishments at will. Milan, in fact, wrote two versions of some of his songs. The one had a slow chordal accompaniment and the other a more florid accompaniment. He explained that the former was to allow the singer to embellish the vocal part. In his song "Perdida Tengo" there is a section marked "variante" in which the accompaniment moves in semiquavers. This would seem to be Milan's use of the double version technique in a single song. Other famous songs of his include "Agora Viniese un Viento" and "Levaynme Amor".

Only three years after the publication of El Maestro came another important publication of vihuela music. This was the Los Seis Libros Del Delphin De Musica by Luys de Narvaez. He was born in Granada and became vihuelista at the count of King Philip II. The Delphin is interesting and important in that it contains the earliest examples of variations. There is no doubt that the variation form was cultivated in Spain long before. These works seem to be a first culmination instead of a beginning.

His most famous variations are on the theme "Guardame Las Valas". This theme has an advanced phrase structure as found in the pavans of Milan, i.e., two phrases of four bars each. The theme is, therefore, eight bars long and Narvaez then goes straight into the variations without a break thus forming the basis of continuous variations. The work begins with three variations, each with a different character but following the harmonic progression of the theme. He then gives three more variations but in a different key, each variation being ten bars in length and with a new harmonic progression. According to the musicologist, Pujol, each variation is meant to be played at a different speed. Narvaez, like Milan, also indicated the tempo of his pieces.

He used two different signs to indicate the tempo, viz., ϕ for fast and ϕ for slow.

On the famous "Conde Claros" theme he wrote twenty two brief variations which again keep to the harmonic progression rather than the melody.

Unlike Milan, Narvaez includes transcriptions of vocal works by famous composers, a practice still common amongst the vihuelistas. Perhaps his best example of this is his arrangement of "Mille Regretz" by Josquin. He arranged the four part chanson for solo voice with vihuela accompaniment and called it "Cancion del Emperador" as it was a favourite of King Charles V. This is also a good example of the melody line being doubled in the accompaniment which enables the piece to be played as a vihuela solo as well.

One of the problems facing the modern musicologist in his understanding of the music from the late Middle Ages and early Renaissance is that the composers or scribes did not always write down the chromatic alteration in the music but left it to the performers to add these according to the rules. For example, in the original version of "Mille Regretz" the chromatic alteration is not indicated. But in the arrangement by Narvaez, it is written out in tablature form which indicates each note exactly according to the practice of the time thereby showing how the original version was actually performed.

Of the six books published by Narvaez, it is the fifth that contains all his songs. He usually printed only the first few lines of the text in his songs, saying that they were so well known that the singers could add the rest of the words from memory. The best known songs from his book are "Ya Se Asienta El Rey Ramira", "Pasea El Rey Moro", "Si Tantos Halcones" and "Con Que La Lavare".

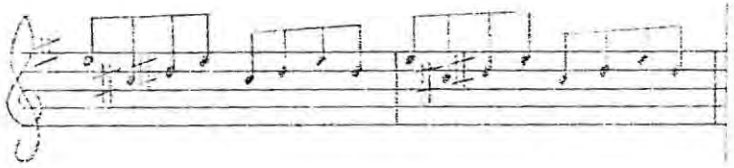
The fantasias of Narvaez are more clearly and purely contrapuntal than Milan's (except for his "Fantasia De

Consonancia") and they are free from the combination of homophonic elements and scale passages so frequently found in Milan. Imitative treatment of two or three themes takes up the major part of the piece while the closing section is usually in free counterpoint.

The most popular of his dance movements is his "Baxa De Contrapunto" (dance in counterpoint).

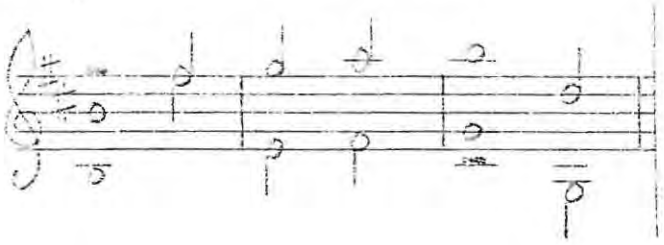
The next important vihuela publication to appear in Spain was the "Tres Libros De Musica En Cifra Para Vihuela" by Alonso de Mudarra which was published in Seville in 1546 while he was canon at the Seville church. He taught the art of the vihuela to the nobility of Spain and also worked in Italy for a time. His publication contains some of the finest instrumental music of the Renaissance. It also contains music for the old four course guitar and it was the first time that this instrument had been treated seriously in any publication.

The most well known of all Mudarra's works is his "Fantasia En La Manera De Luduvico" in which he imitates the harp playing of the virtuoso harpist Luduvico. At the beginning of the composition the composer writes that, 'it is difficult until it is properly understood'. After bar 62 he adds a footnote 'from here on to the end there are some false notes: when played well they do not sound bad'. He imitates the harp sound by cleverly arranging a short scale passage so that each note is on a different string (as on the harp) and this is repeated at speed giving a very harp-like effect.

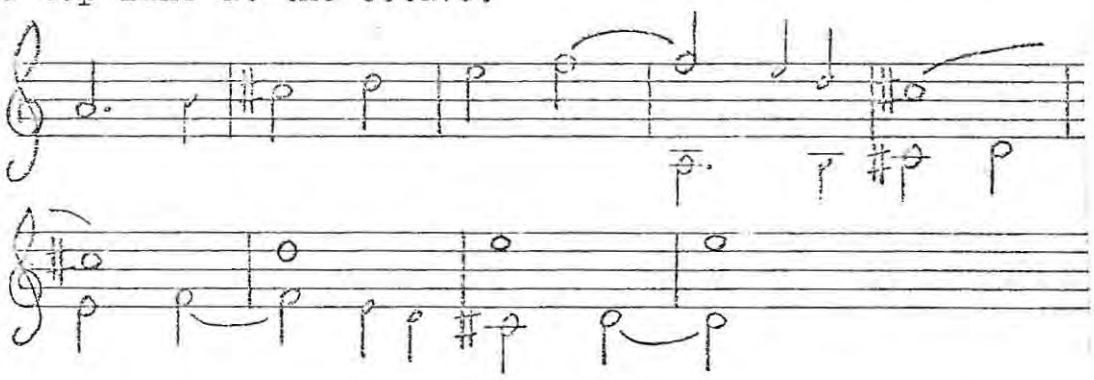


His fantasia:

shows a very flowing style but with a contrasting middle section which moves in slow double notes.



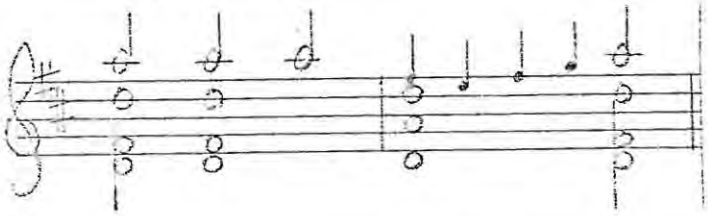
Another fantasia begins with an almost fugue-like entry of the bass line which repeats the first five bars of the top line at the octave.



The opening rhythmic motif is often repeated in different forms during the work giving a subtle unity to the piece. The range is restricted to two octaves as it was originally written for the four course guitar.

On the whole the fantasias of Mudarra are less contrapuntal and imitative than those of Milan or Narvaez.

His dance movements include pavans, gallardas and a romanesca. His gallarda;

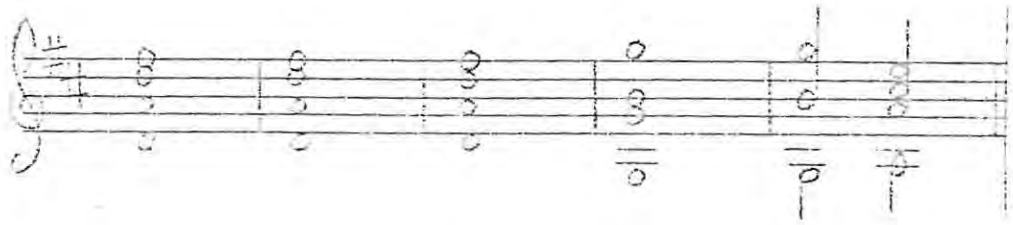


shows clear four bar phrasing as in the pavans of Milan. It has two sections each containing three four bar phrases. Each section is repeated exactly giving the form:

A A B B

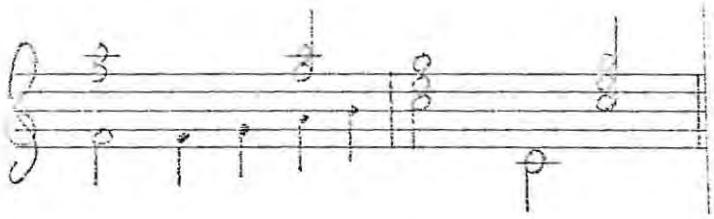
Mudarra's variation form is best represented by his

"Diferencias Sobre El Conde Claros".



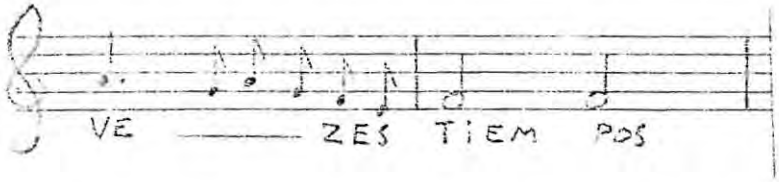
He wrote a total of twelve variations on the theme, each variation being a little character piece following the harmonic progression of the theme rather than merely embellishing the melody. In the last two variations, however, he changes the harmonies slightly. The eighth and ninth variations run in continuous quavers and, according to Pujol, they are meant to be played with an increased tempo as in the fantasie de tentos of Milan.

Another beautiful example of his composition skill is the "Romanesca" which consists of five variations on a ground bass. The whole work is characterized by ascending lines in crotchets as in the opening bar.



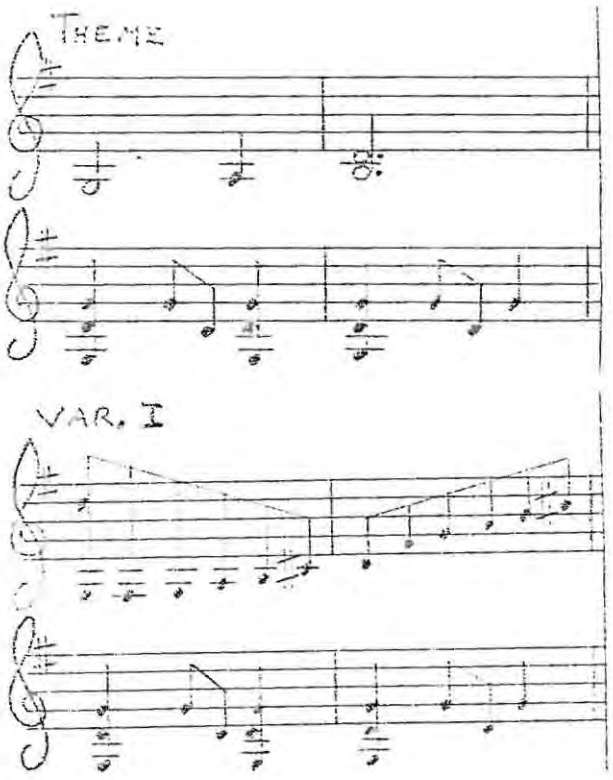
In his solo songs, with vihuela accompaniment, Mudarra follows the lines of Milan and Narvaez, except for two innovations. Firstly, he wrote the vocal part on a separate stave, whereas the previous practice had been to indicate the vocal line in the vihuela tablature with red letters. The second was that he included biblical texts in his repertoire, e.g., "Durmiendo Iba El Senor" and "Triste Estaba El Rey David".

Some other of his songs show a trace of written out ornamentation in the vocal part, e.g., in the song "Claros Y Frescos Rios".



Another song arrangement by Mudarra is the "Isabel, Perdiste Latu Fara" which has a florid eighteen bar vihuela introduction with the first six bars hinting at the melody line to come.

Enriques de Valderrabano was born in Peneranda De Duero in Spain. In 1547 he published seven volumes under the title Libro De Musica De Vihuela Intitulado Silva De Sirenas . They contain mostly his arrangements of the music of other composers. One of his arrangements is for two vihuelas where the second vihuela repeats the G major chord bar after bar in a rather oriental accompaniment style. Against his monotanous background the first vihuela plays a very western type theme and variations.



An interesting point about this duet is that it was written so that the two players could both read it from the same page

while sitting opposite each other.

But Valderrabano's most beautiful work is his "Pavana con Diferencias" which is over two hundred and eighty bars long. For the theme he used the "Folia" theme that was to become so very popular during the seventeenth century. The form of this theme and variations is rather more complicated than any others yet found. He states the theme in $\frac{3}{4}$ and immediately does a variation (A A'). He then restates the theme but with certain changes and in $\frac{2}{4}$ and then immediately varies the (B B'). These two groups are then again varied alternately six times, each giving another twenty four variations. After twelve of these variations, he changes the key by starting a tone lower and stays at that level to the end.

Valderrabano also used the "Conde Claros" theme is two sets of variations, one with forty six and the other with seventy two variations and no less than one hundred and twenty variations on the "Guardame Las Vacas" theme.

He also indicated the degree of difficulty of his works as either "easy", "less easy" or "difficult". Among his easier pieces are his Sonetos which are short three part pieces.

The Silva Sirenos also includes songs such as "Ay De Mi", "Ya Cabalga" and "Donde Son Estas Serranas?" which is a strophic song with each of the three verses to be sung at a different dynamic level.

In 1552 Libro De Musica De Vihuela by Diego Pisador was published in Salamanca. Like the Silva de Sirenas, this work consisted mainly of arrangements of vocal music but with a few of his own compositions. His most popular works are the "Pavana Muy Llana Para Tañer" (pavan, quite easy to play) which uses the same "Folia" theme as the Valderrabano pavan and his "La Cortesia" (courtliness) which is completely homophonic and was actually a parody on the pavans of the nobles.

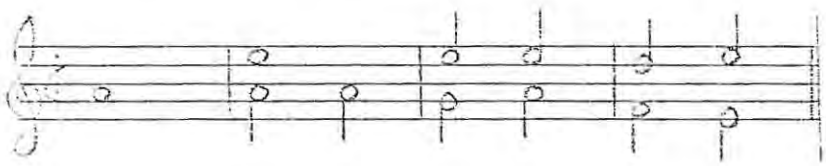
He also wrote thirty seven variations on "Conde Claros" and twelve on "Las Vacas" and several fantasias.

Amongst his songs with vihuela accompaniment, Pisador includes an elegy "Endecha". Other popular songs include "Si Te Vas A Banar, Juanic", "De Los Alamos Vengo", "En La Fuente Del Rosel" and "Guarte, Guarte El Rey Don Sancho", all of which have very easy accompaniments.

The last important publication of vihuela music came from Miguel de Fuenllana. His book Orphenica Lyra was published in Seville in 1554. Fuenllana, blind from birth, was at first chamber musician to Marquesa de Tarifa and later, like Pisador, entered the service of Philip II. After 1563, he was chamber musician to Isabel of Valios. He was, by all accounts, a remarkable player and could even play on an instrument that was not tuned. Particularly clever was his idea of plucking one string of each pair of double strings for sustained notes and plucking the other for passing notes. He composed for the vihuela and for the four and five course guitars.

One of his innovations was the composing of pieces in groups of two, the first being a vocal setting and the second being an instrumental fantasia which was an imitation of the vocal movement.

His fantasia;



was written for the four course guitar and, therefore, has a range of less than two octaves. It is largely homophonic.

In contrast, his "Fantasia de Redobles";

is similar to the fantasia de tentos of Milan with its alternating homophonic and scalic passages.

In his " Fantasia Solve Una Passado Porcado " he introduced the theme twenty nine times in different forms.

His arrangements of songs for solo voice and vihuela include many which had previously been set by other vihuelistas. These include "Paseabase El Rey Moro " (Narvaez and Pisador), "A Las Armas" (Pisador) and "De Antequera Sale El Moro " which is based on the same story as Pisador's "La Manana ".

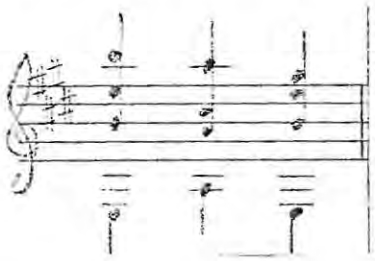
Today the vihuela music forms a very important part of the guitar's repertoire because of its historic value and the high quality of the music.

The other instrument from which the guitar derives most of its early literature is the lute, and the most important Renaissance lutenist as regards this literature is, undoubtedly, John Dowland (1563-1626). He was probably born in London and by 1580 was in the service of the English ambassador in Paris, at which time he became a Catholic. He returned to England and, in 1588, received the degree of Batchelor of Music at Oxford. In 1594, having been unable to obtain a post in England because of his religion, he went to Germany where he was well received and later journeyed to Italy, only to return to Nuremburg. Having given up the Catholic faith to become a Protestant, he returned to England in 1597 and in the following year became lutenist to Christian IV of Denmark. In 1612 he finally obtained the post he most desired, that of lutenist to the King of England, Charles I.

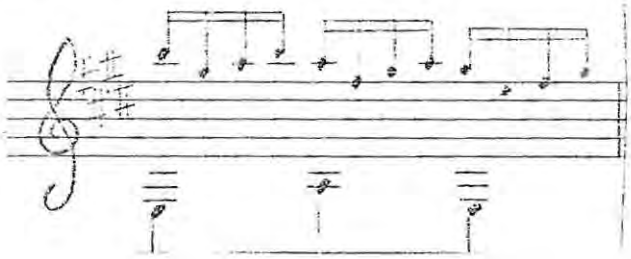
Dowland never compiled or published any of his solo lute music except for the nine pieces in his Varietie of

Lute Lessons and the few that appear in his song books. The result is that we have too little information about the various manuscripts as far as authenticity, chronology and originality are concerned. Further complications are added by the fact that Dowland would often rewrite one of his earlier pieces making a few changes, giving it a new name and present it for some special occasion. Of the more than two hundred surviving manuscripts of Dowland's pieces to be found in England and the rest of Europe only three can be definitely said to be in his handwriting and six others have his signature. It has only been through close examination of the manuscripts and their comparison to the style of the known works of Dowland and the styles of other composers that we know today which pieces may be accepted as coming from his pen.

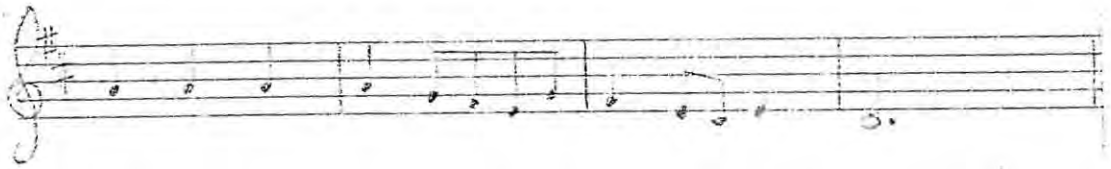
Dowland's favourite form for solo lute composition was the galliard and thirty of these can be attributed to him with certainty. One of the most popular of these is the "Queen Elizabeth her Galliard". This work was a revision by Dowland of his earlier work called "K. Darcies Galliard". What is immediately noticable about this piece is his very common practice of building the work out of a certain number of themes, each with a different character and each one being repeated with embellishments, thus giving the form A A′ B B′, etc. For example the first bar of the Queen Elizabeth galliard is;



and in the embellished repetition is given as;



The "The King of Denmark his Galliard" uses the melody from a song that was popular in Europe during the early Sixteenth Century called "La Guerre", a battle song. This galliard is also known as the "Battle Galliard". Two other galliards by Dowland are also derived from "La Guerre". They are "Mr Langon's Galliard" and "Dowland's Galliard". The theme;



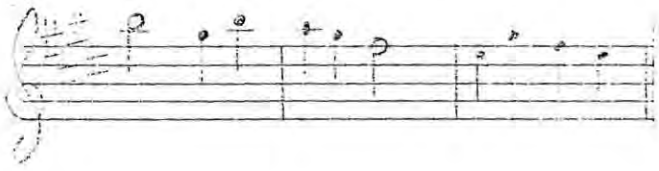
was also used by other composers such as Byrd and Bull.

The "Melancholy Galliard" is another good example of an eight bar strain being repeated with embellishment. It is in a minor key and the three strains retain the underlying vein of sadness throughout.

Perhaps the most beautiful of his galliards is his "Captaine Digori Piper his Galliard". Dowland no doubt also thought the melody beautiful as he used it four times, firstly as a lute solo, then as a solo song with lute accompaniment, as a four part ayre and lastly for a five part choir with lute accompaniment.

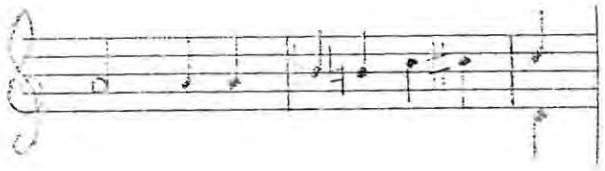
Of his pavans the "Lachrimae Antiquae Pavan" is the most heard today. After writing it for lute solo he also arranged it for voice and lute and later for viols and lute. The lute solo is in the form of three different strains being repeated with embellishments.

Seven of Dowland's fantasies are known to us. Five are built on diatonic themes and the remaining two are more chromatic. The most well known one is built on the theme:

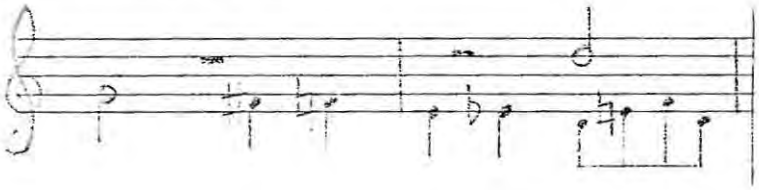


This theme comes from an Italian Lauda and was also used by other composers. The fantasie shows Dowland's ability as a contrapuntal writer and virtuoso lutenist.

The two chromatic fantasies are interesting in that the one named "Farewell" begins with a six note ascending chromatic scale:



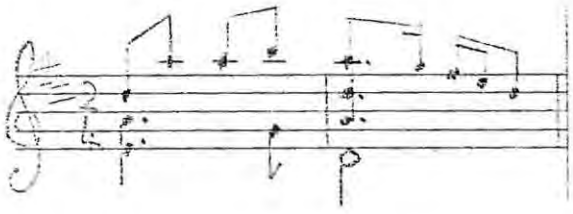
while the "Forlorne Hope Fancye" begins with a descending six note chromatic scale.



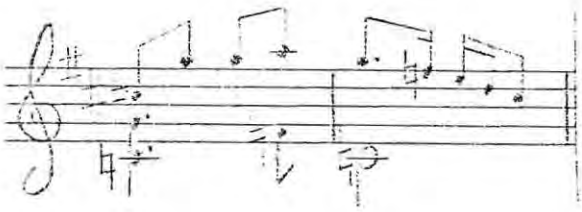
In both the fantasies the chromatic phrases occur at least a dozen times and both show remarkable complexity and require an advanced technique to be performed.

Of his Almains (old English form of the Allemande) the "My Lady Hunssdons Puffe" is the most attractive piece. The common technique of giving an embellished variation to a repeated phrase is particularly clear in this work. After the repeat of the first strain, the second strain begins with the opening motif a tone lower.

1st Strain



2nd Strain



Among Dowland's lighter and shorter pieces are his jigs, airs and other pieces in $\frac{6}{8}$ time. His setting of the air "As I went to Walsingham" uses the melody of the Walsingham tune which was popular at the time.

He also used the Walsingham tune in one of his galliards.

From his list of jigs the "Mrs Vaumes Jig" is the most noteworthy. It is in the form

A A′ B B′ C C′

but uses an anacrusis of two quavers into each strain and it's repeat thus giving the piece more flow and concealing form as against the rigid form found in other works such as the "Melancholy Galliard".

Other light pieces include "Mrs White's Nothing" and its companion piece "Mrs White's Thinge" (they have nothing musically in common), "Mrs Winter's Jump", "Dowland's Bells", "M. Darcie's Spirit" and "The Shoemaker's Wife A Toy".

Due to the lack of written music for the lute before the Sixteenth Century it is not known for how long the lute-solo song combination had been used. The Renaissance lute song form began to flourish after the publication of Dowland's First Book of Songs or Airs in 1597. The suitability of the lute as a supporting instrument to the solo song was realized.

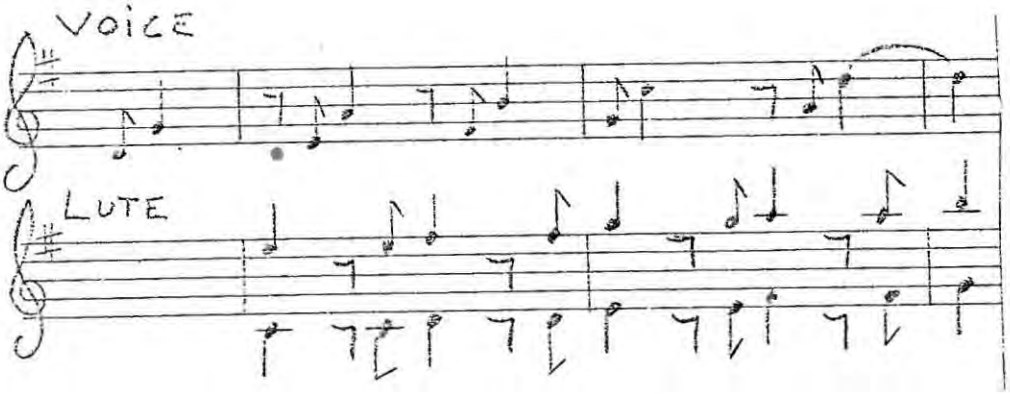
Among the best of the modern collections of Dowland's lute songs arranged for guitar and voice is the 18 Songs arranged for Guitar and Voice by Siegfried Behrend. They are all love songs with a continual vein of sadness.

The words for the beautiful "Who ever thinks or hopes of love" come from "Caelica" by Fulke Greville.

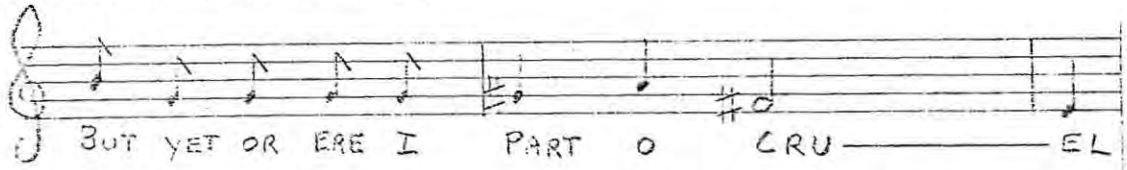
although Dowland has changed the text slightly to suit his setting. As with many of his other songs the lute accompaniment went through many changes as can be seen from the different manuscripts.

In contrast to this slow moving song is his "Fine knacks for Ladies" which is a strophic form. The accompaniment is mainly chordal but Dowland has been particularly clever in obtaining a rhythmic balance between the lively melody and the words.

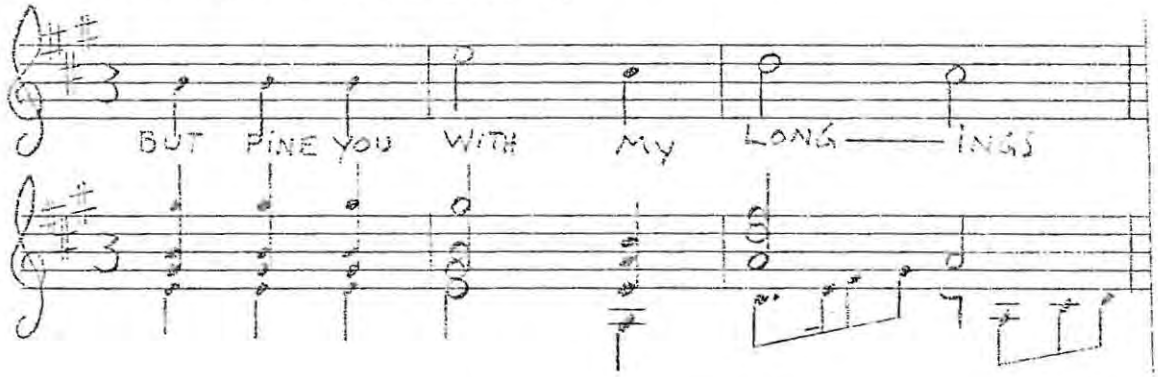
The song "Come again" is also strophic but the lute accompaniment is much more elaborate with constant counter melodies. The accompaniment is excellently written in that it not only supports the vocal line but is equally important in the expression of the text. For example, in the eighth bar the lute echoes the rhythm of the vocal in a crescendo line.



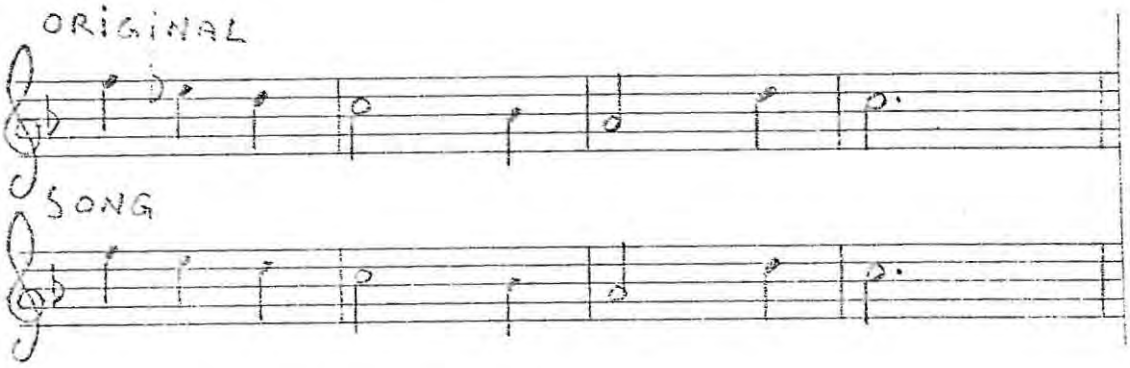
"Wilt thou unkind thus reave me" is typical of Dowland's melancholic writing. To add to the expression of the pains of love he uses certain melodic devices such as the sudden change to g sharp on the word "part" in the second last line of each stanza.



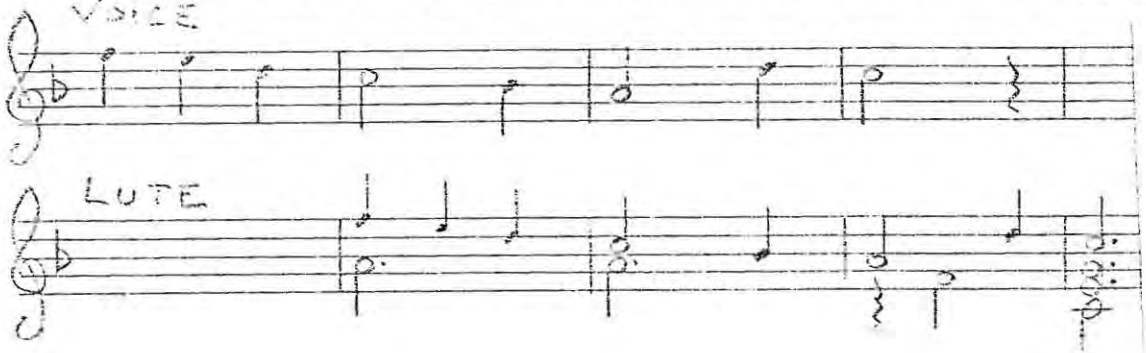
One of his most simple songs is the "Sleep wayward thoughts" which is also one of his most beautiful. In it we find Dowland in a typically dreamy mood. The melody line has been set with a note for each syllable of text and is without any jagged rhythm which might destroy the dreamy effect. The accompaniment consists of chords which follow the melody line as well, with a chord per note, except where the vocal line has to hold a long note, at which time, the lute fills in with a few decorative figures, e.g.,



The song "Awake sweet love" was originally written by Dowland as a lute solo. It was only later that he reset it for voice and lute at the same time changing the modal minor seventh of the instrumental version to a major seventh in the song.



The fact that the piece begins with an unaccented syllable on an accented note stems from the fact that it was originally a lute solo. The first half of the piece has very simple accompaniment with the lute playing a canonic imitation of the vocal line.



The second half is more elaborate with melodic and rhythmic imitation between the lute and the voice.

In his song, "Come heavy sleep", Dowland shows his ability to utilise the different tonal characteristics of the lute. For example, on the word "cries", he uses the full g major chord which on the lute consists of mainly open strings which have a fuller sonority. Then, after a slight pause, the words go on "come and posess my tired thoughts", but they are preceded by a b major chord which uses stopped notes, thereby giving a more muted chord.

Other songs by Dowland include "What if I never speed", "Farewell unkind", "Flow not fast ye fountains", "Sweet, stay awhile", "Faction that ever dwells", "It was a time", "Disdain me still", "Shall I sue", "Daphne was not so chaste" and "Lady if you spite me".

C H A P T E R I I

MUSIC DURING THE BAROQUE

The movement of establishing the foundation of modern instrumental music was carried on through the Baroque era with further innovations in style and form. Although the sixteenth century vihuelistas had broken away from the vocal style, their compositions still showed evidence of being written in "voice parts" such as in the harmonic passages of Milan.

During the Seventeenth Century the composers began to realize more and more that the instruments could do certain things that the voices could not. These included the rapid repetition of a note, big interval jumps in the melody and the execution of broken chords and chromatic scales.

Both the vihuela and the four course guitar had been succeeded by the new five course guitar by the beginning of the Seventeenth Century. The most important composers for this instrument were Corbetta (Italy), Sanz (Spain) and de Visee (France).

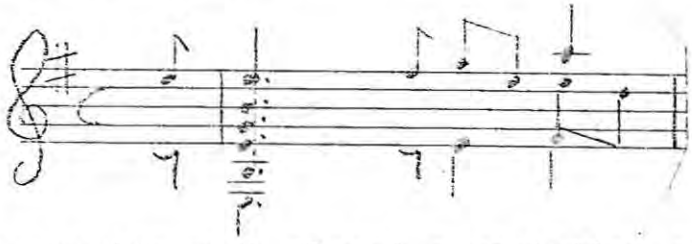
A first glance at their music shows that they composed in two main forms. The Italian and French composers wrote dance suites while the Spanish composers wrote mainly in single movement dance forms. The baroque composers wrote with a thorough understanding of their instrument as they were also the top performers of the time, whereas today, there is a greater distinction between the composer and the performer.

The first of the great baroque guitarists was the Italian Francesco Corbetta (1615-1689). He was born at Pavia in Italy and was first discovered by the Duke de Guise who employed him at the royal household. In 1639 he published De Gli Scherzi Armonici and in 1643 he published Varii Capricii per la Chitarra Spanuola which he dedicated to his patron the Duke of Mantua. Corbetta toured Europe as a concert

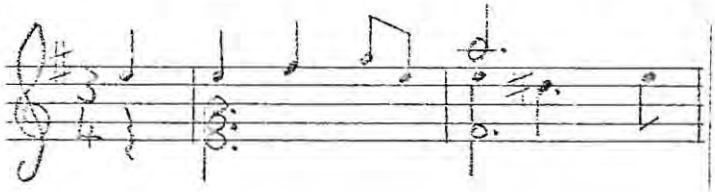
guitarist after which he was recommended to Louis XIV of France. While in the service of Louis, Corbetta was heard by Charles II of England who immediately employed him as one of the grooms to the privy chamber of the queen. His most important publications were the two sets of La Guitarre Royal (1671 and 1674) which he dedicated to Charles II. During the revolutions of 1688 Corbetta had to flee to Paris where he died the following year.

Corbetta wrote in a variety of musical forms but his most important works are his suites. His earlier form of the suite comes from the Varii Capricii publication. These "suites" were amongst the earliest dance suites to be composed during the Baroque and consisted of only three movements, Almanda, Corrente and Sarabanda. Although Corbetta did not use the term "suite" himself, he grouped his pieces in the above order and indicated that they belonged together as one work. All the movements are in binary form, as were most of the baroque suite movements.

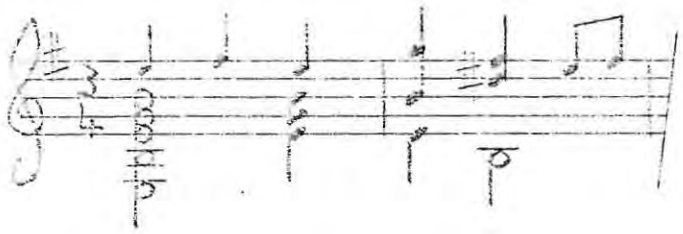
Corbetta achieves a remarkable unity within each of the suites. All three movements of each suite are in the same key using the major and minor tonalities as against the earlier modal systems. Unity is also achieved by the repetition of certain phrases in all three movements. In fact the correntes are so similar to the almandas that they are almost a variation of the almanda. The sarabandas always introduce new material but with repetition of certain phrases from the almanda. A good example of this is his suite in E minor. The almanda begins:



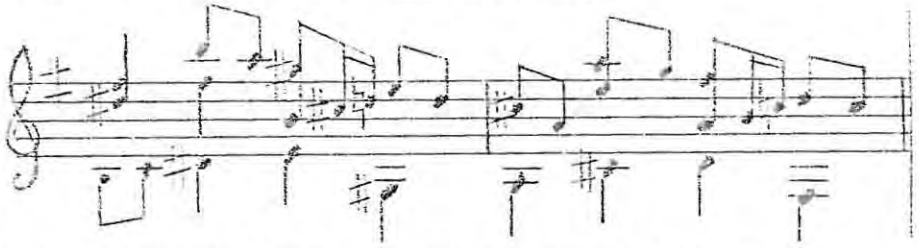
and the corrente begins with almost a variation of the above:



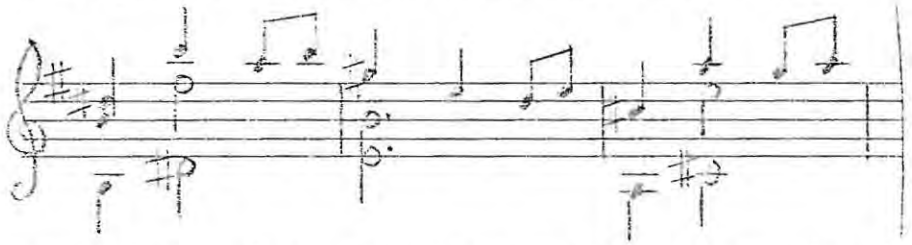
The sarabanda on the other hand begins with the same harmonic progression, but a different melodic line:



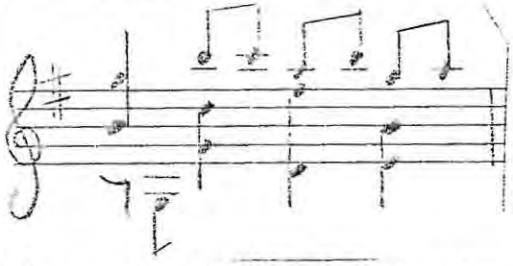
Bars 12 and 13 of the almanda are:



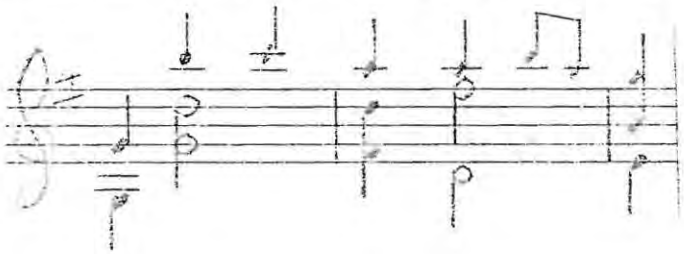
This is repeated in the corrente at bar 27 as:



Once again less obvious thematic repeats can be found between the almanda and sarabanda. Bar 15 of the almanda has:



which occurs at bar 5 of the sarabanda as:



The melodic and rhythmic sequencial patterns which are so typical of baroque music are also common in Corbetta's suites as shown above in the example from bars 12 and 13 of the almanda.

His suites show further independence from vocal music in that they are particularly rhythmical, whereas the vihuela music of the previous century still had the smoother melodic flow more typical of vocal music.

Corbetta's later suites have an increased number of movements. The suite in D major from La Guitarre Royal has five movements. It begins with a prelude and then follows the usual allemande, courante and sarabande, but then he adds a chaconne to end the work. He is, therefore, still ending his suite with a slow movement as he did in his earlier suites. It was at about this time, however, that composers began to end their suites with a gigue thus giving a lighter and faster close to the work. This gave the nucleus of the dance suite, i.e., allemande, courante, sarabande and gigue. To this nucleus further movements would be added such as preludes, minuets, bourrees, etc., as seen in the suites of the later French guitarist, de Visee.

The suite in D Major shows a large amount of ornamentation. The practice of adding ornaments to the music was at first functional in that it was meant to make up for the lack of sustain in the instruments and, as seen in the suite, they are found on the longer note values and particularly in the slower movements. But during the Seventeenth Century they also became idiomatic of the florid Baroque style and are, therefore, not uncommonly found on the shorter note values as well.

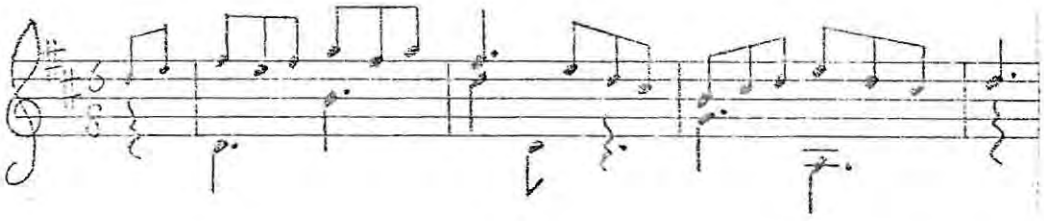
Like all the earlier suites, all the movements of the D major suite are in the same key but they do not have the same inter-movement phrase repetition and variation found in the earlier suites.

Corbetta also wrote in forms other than the suite, though these are of less importance. One of these is his variations on the "Follia" theme. The Follia theme was a bass line which had the function of guiding the harmonic progression of the work so that in the variations the harmonic

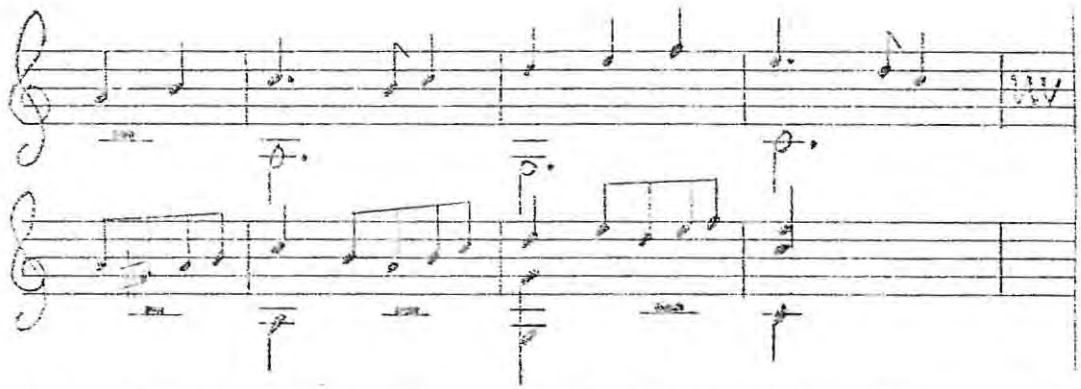
progressions stayed the same but the melody lines could be completely different. He wrote three variations on the theme and indicated that each should be played at a different tempo.

In contrast to Corbetta, whose best works are his suites, the Spanish baroque guitarist, Gaspar Sanz , is better known for his single movement dance forms. Sanz (1640-1710) was born at Calanda in Spain. He took degrees in philosophy and theology at Salamanca and studied the guitar in Italy under Lelio Colista. He also studied the organ and music theory with Cristoforo Carisani and became the organist at the King's Chapel in Naples. He returned to Spain and compiled three books of guitar music which he later published as one book under the title Instruccion De Musica Sobre La Guitarra Espanola (1697). The music from this work shows Sanz as having been close to the folk music of the time as it contains many of the dance tunes that were popular in his day.

The "Canarios" is a traditional Spanish dance that was popular in Europe particularly during the late Sixteenth Century. It is a fast, colourful dance in triple meter and is described by Curt Sachs as 'bold, bizarre and exotic. The combination of skip and stamp and the alternation of heel and toe in the stamping are characteristic' (similar to flamenco dancing). Sanz's version of the canarios certainly conveys this spirit.



Another of his works is the "Espanoleta" dance tune. The form of the piece recalls the Dowland technique of stating the theme and then restating it with elaborations, although still following the original melody line to a certain extent.



A big difference, though, is that Dowland wrote each variation immediately after each theme:

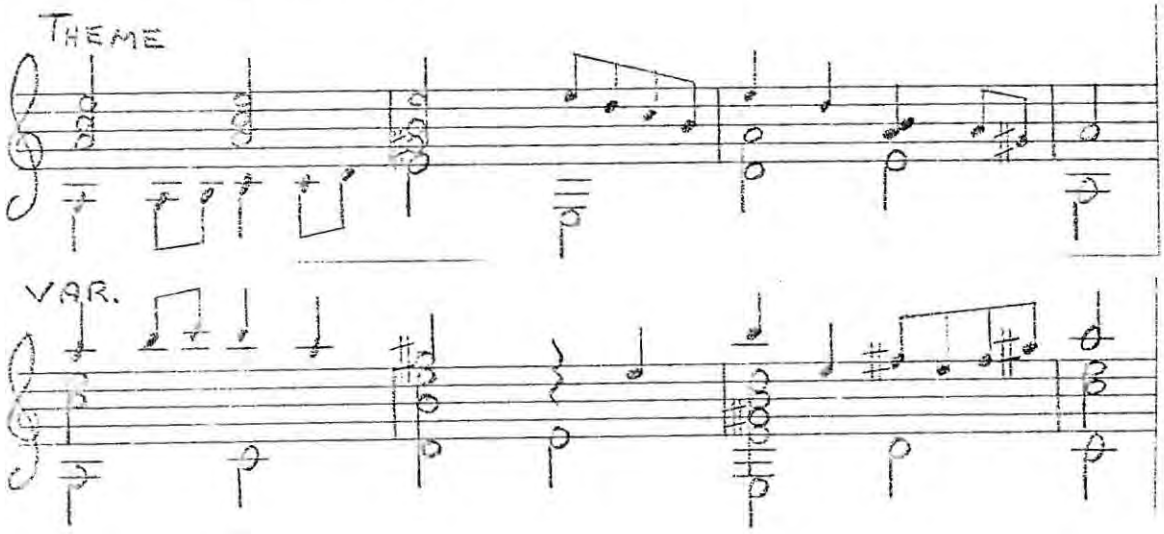
A A′ B B′ C C′

where as Sanz states the three themes of the Espanoleta and then only the variations:

A B C A′ B′ C′

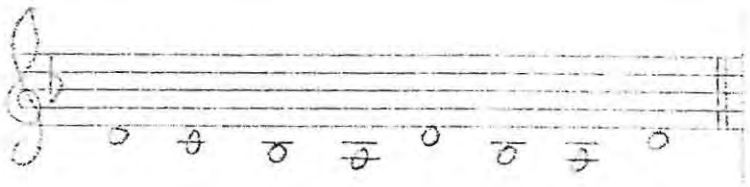
The Sanz themes, however, are much more closely associated to each other and follow each other naturally, whereas the Dowland themes each have their own character and are to a certain extent independent of each other.

His "Pavanas" is written in the same form as the Espanoleta, but the variation is not the Dowland type elaboration as found in the Espanoleta. Instead it retains the same texture as the theme:



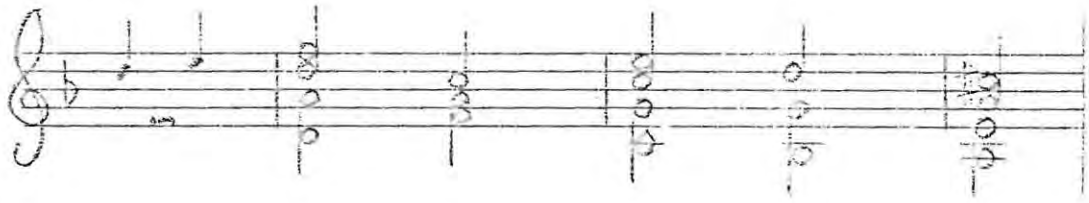
The "Gallardas" by Sanz consists of a theme and eight variations. The theme is completely chordal and it uses

a typical chaconne bass line on to which the chords are built.

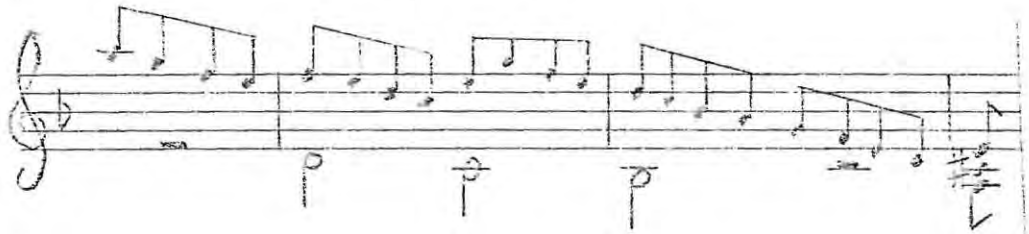


Some of the variations are florid running passages (as in the Espanolata) while others have a texture more similar to the theme (as in the Pavana).

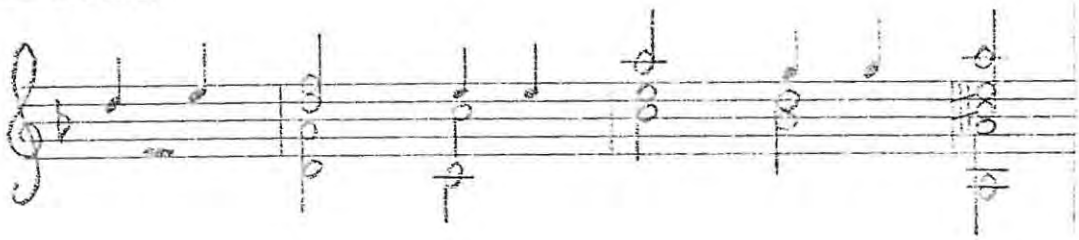
THEME



VARIATION III

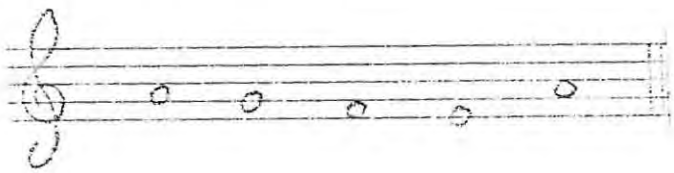


VARIATION V

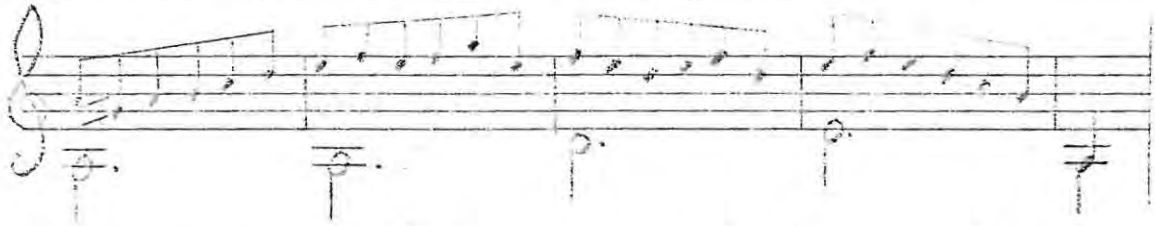


Another work which is similar in form to the Gallardas is his variations on the "Follia" theme. It consists of the theme and three variations. The third variation runs in continuous quavers and Sanz indicated that it is to be played at an increased tempo.

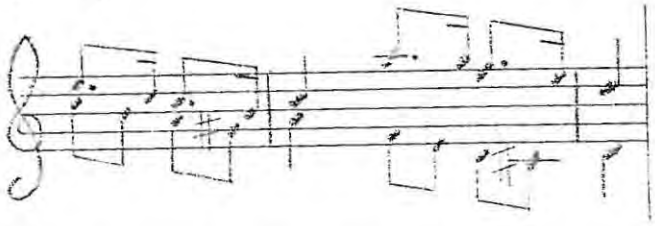
His "Pasachalle" is, of course, built on the chaconne bass line;



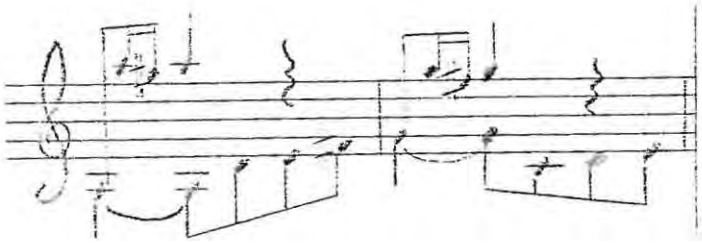
but he does not strictly keep to this in each variation. What is fascinating, however, is that there is a hint of the tonic - subdominant - dominant - tonic chord progression in some of the variations. In fact, the seventh variation has the melody line based on the chaconne bass line, but the bass line gives the above mentioned progression.



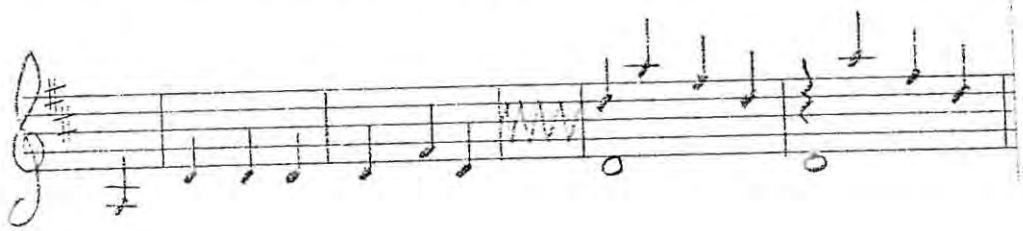
He also introduces different rhythms into the variations. The above example is in running quavers, the fifth variation has a dotted rhythm;



and in the eighth variation he uses a rhythmic motif that one would expect to find in a work by Bach.



Sanz had the idea of trying to reproduce the "sounds of the palace", particularly trumpet fanfares, on the guitar. His work "Clairons Et Trompetts " uses the characteristic intervals of the instruments.



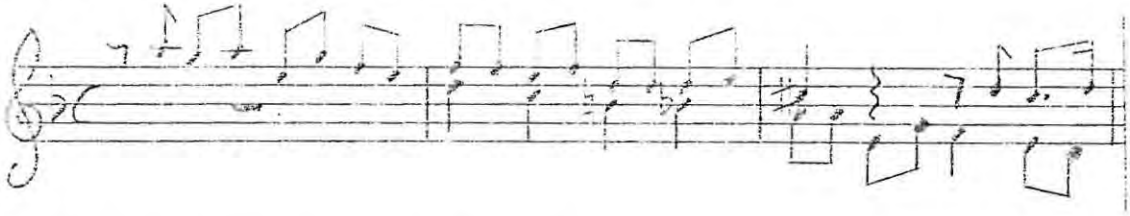
His "Cavalcy of Naples" is probably his best attempt at imitating the sound of trumpets.

Other such works by Sanz include "The Trumpets of the Queen of Sweden", "Bugle Calls of the Musketeers of the King of France" and "Tournoi Et Bataille".

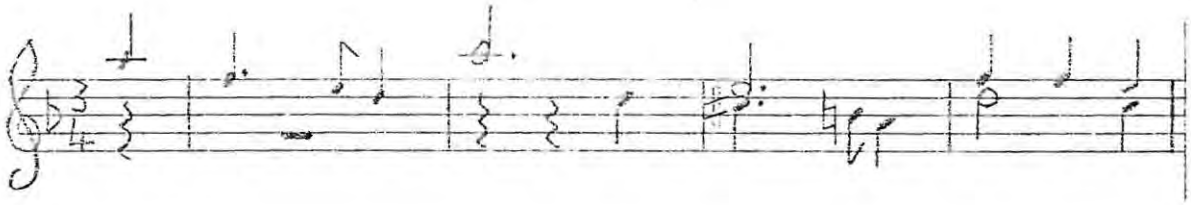
The most important French baroque guitarist is Robert de Visee (1650-1725). He was taught to play the guitar by Corbetta and became chamber musician to the Dauphin (Louis XIV's brother) and protégé to Colbert (Louis XIV's master of finances). The publication of music was a difficult and expensive process at that time, so when de Visee compiled his first book of dance suites (Livre de Guitarre), he sent it to Louis XIV for approval. Louis, in turn, financed its publication in 1682. Thereafter he taught the guitar to Louis and entertained at his court. In 1686, he published his second collection of suites which he dedicated to the king and yet another volume in 1689. De Visee was also a lutenist, theorboist and singer, and his last publication (1716) was for lute and theorbo.

Most of his suites have a high musical quality and de Visee admitted that he was influenced by Lully, whose style he copied to a certain extent. His suite in D minor is generally considered to be his best work. It originally consisted of ten movements in the following order: prelude, allemande, courante, sarabande, gigue, gavotte, bourree, minuet, passacaglia and minuet. Modern publications of this work have the movements rearranged in accordance with the ancient form of the suite, leaving out the passacaglia because of its scanty musical value. The suite is, therefore, found arranged as prelude, allemande, courante, sarabande, gavotte, minute I, minuet II, bourree and gigue. This work shows de Visee's advanced understanding of the importance of a good

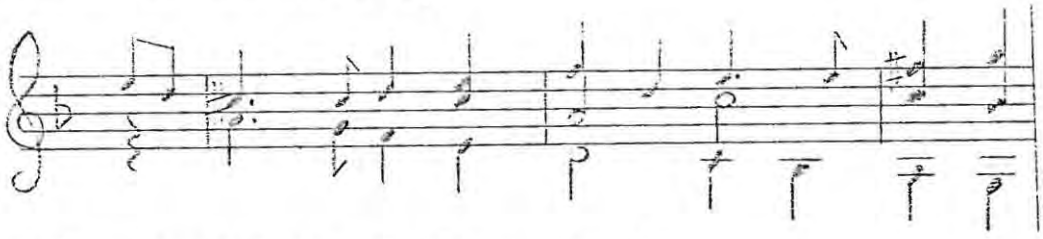
melody and bass line and his skill at working with these two lines contrapuntally. This fact becomes evident even in the opening bars of the prelude;



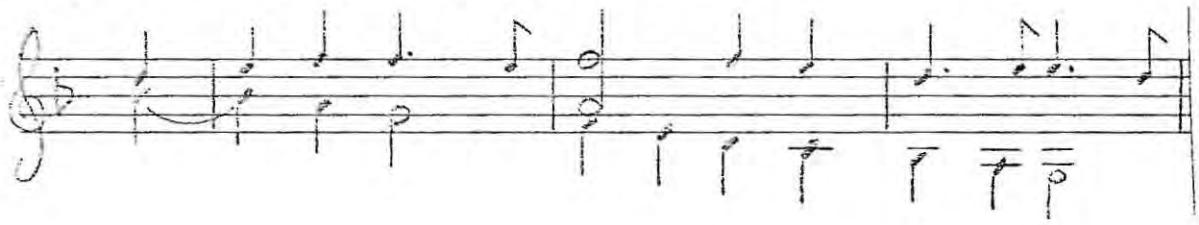
as well as those of the gigue:



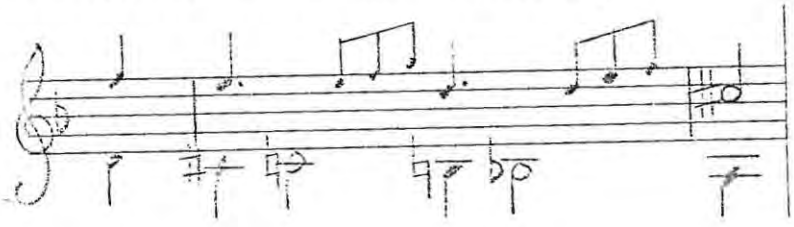
He also makes use of long descending lines as in the second half of the bourree;



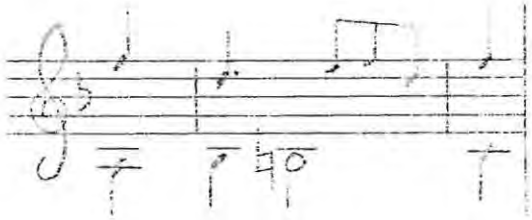
and in the second half of the gavotte:



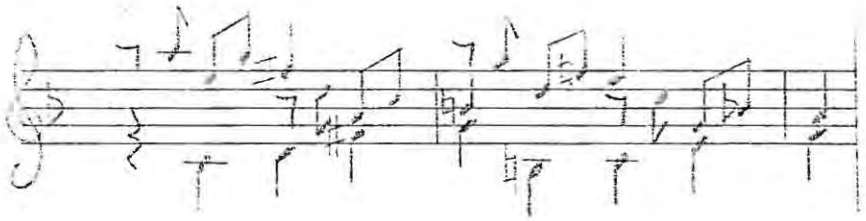
Other effective bass lines are those that move chromatically as in bar 10 of the courante;



and bar 10 of the gigue:

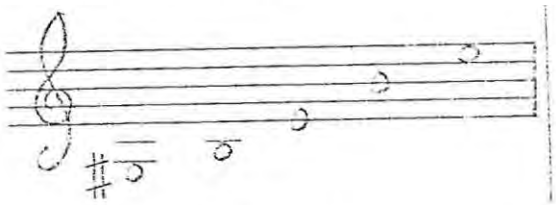


Other factors which account for the popularity of this suite include the advanced harmonic progressions which show certain chromaticisms as in the opening bars of the allemande where he begins with the tonic - dominant - tonic progression (D minor - A major - D minor). He then proceeds to a major chord on the subdominant (G major) after which the harmony goes through the cycle of fifths until it arrives at the B flat major chord (G major - C major - F major - B flat major) and then drops to the dominant of the key (A major). He uses typical baroque sequential patterns. A good example of this comes from the prelude:



The beauty of the melody line, which is skilfully balanced by the bass line, together with the very rhythmic flow of the faster movements, make this suite the most successful to come from any baroque guitarist.

His E major suite is interesting in that it required the guitar to be tuned as follows:



This gives a convenient tuning for the key of E major and, as the suite was written in tablature, it presented no extra reading difficulties to the performer. Chronologically,

it is one of his earlier suites and is, therefore, one of the first suites to include a minuet, gavotte and bourree. It also includes a chaconne which, in this case, is in rondo form,

A B A C A D A E A.

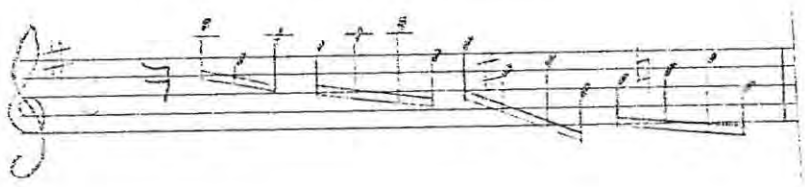
The other two suites generally heard today are the G minor (U E No. 12714) which has nine movements, and another D minor suite in seven movements. (Anthology for Guitar - A. Bellow).

De Visee's output consisted mainly of suites. His reason for not composing dance tunes can perhaps be understood from his own explanation on why he never wrote variations on the Follia theme as did most other guitarists. 'There are so many of them in fashion from which all concerts resound that I could only repeat the follies of others'.

The late Baroque period saw the end of the popularity which the lute had enjoyed, particularly during the Renaissance. One of the last important composers to concern himself with the lute was J.S. Bach.

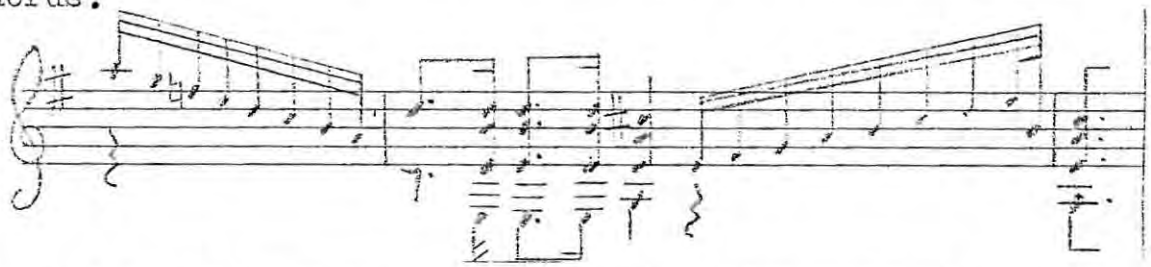
Johann Sebastian Bach (1685-1750) was the principle composer of the Baroque contrapuntal school. His works are far too numerous to mention but include preludes, fugues, masses, passions, suites, etc. Today he is considered to be one of the fore-most composers of all time. His interest in the lute stemmed from his association with some of the best lute players of the time. They included Johann Kropfgans and Silvius Weiss for whom Bach composed and arranged lute music. Two of Bach's own pupils, Rudolph Straube and Johann Krebs, were distinguished lute players. The most important of Bach's lute works are his four lute suites.

Suite No. I is in E minor;

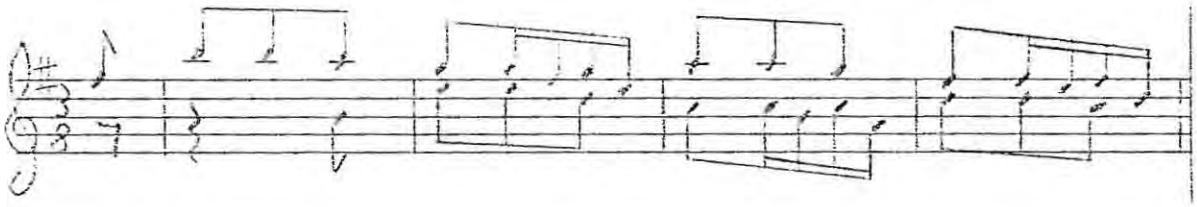


and was originally found amongst the manuscripts of Bach's pupil, Johann Krebs, with the title Praeludio Con La Suite De Gio i Bast i Bach Aufs Lauten Werck. Some musicologists are of the opinion that Bach wrote this suite for the lute-harpsichord which he had commissioned Z. Hildebrand to build and which sounded very much like the lute. Other musicologists, however, reject this and judge the suite to be an original lute composition.

The work has six movements: prelude, allemande, courante, sarabande, bourree and gigue. The prelude begins with a slow introductory section of fifteen bars which is characterized by rapid scale passages punctuated by heavy chords:



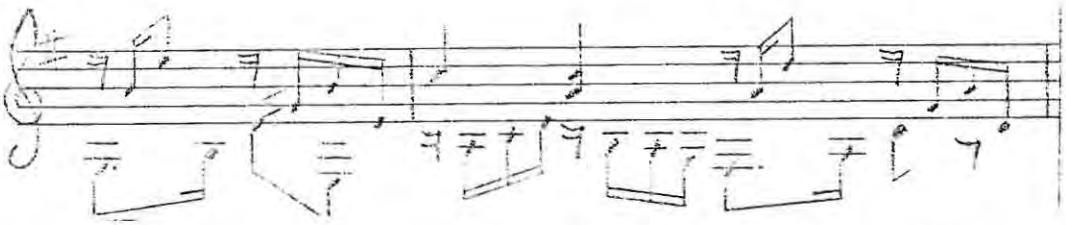
It then moves into the presto section beginning with the following motifs;



which immediately gives the contrapuntal style with which it continues with new entries of the head motif being made at different points and the rhythmic motif . .... dominating throughout. The presto is basically in two part writing filled in with the occasional three, four or five part chords which is characteristic of most contrapuntal lute and guitar music. The driving force of the presto in which every bar is packed with significance and activity leads to the climax of the last bar being on the E major chord.

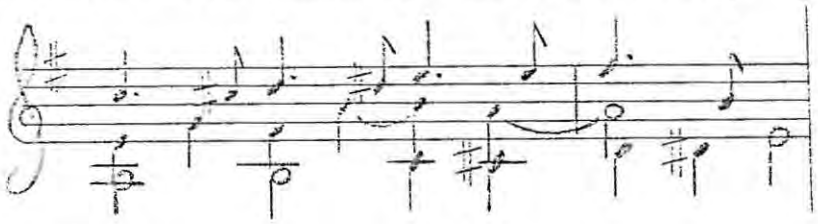
After the hectic flights of the prelude, comes the more serene and gently flowing allemande. This movement

is in two part writing but Bach cleverly arranges the parts so that they alternate, thereby making the performance of the work somewhat easier for the player but without losing the two part feeling:



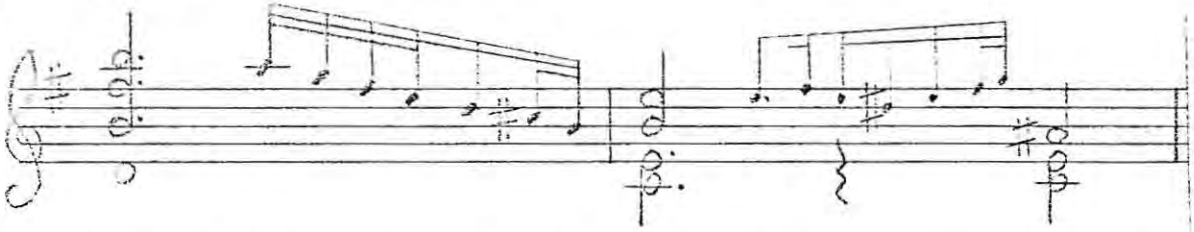
This may be compared to his addition of chords to the two part prelude giving a multi-part sound to the work. We can, therefore, assume that Bach understood the difficulties of performing contrapuntal music on the lute and was able to make the necessary allowances without letting the music lose its effectiveness.

The subtle, but complex, rhythmic patterns of the courante, present a certain amount of difficulty to the performer. It is in triple time with the six beats of each bar divided into either three groups of two or two groups of three. Of great interest, though, are the chromatic lines in both the melody and bass which occur in bars 20 and 21;



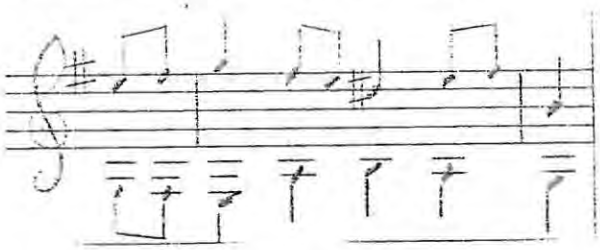
and which culminate in the final cadence.

The sarabande is reminiscent of the slow section of the prelude with its rubato feel and alternating scale and chord passages:



He makes effective use of placing major and minor chords side by side:

The bourree is the most light hearted of the movements and Bach exploits the up-beat rhythmically so that it does not actually sound like an up-beat:



The gigue has a fast flowing contrapuntal texture in continuous semiquavers giving a joyful ending to the work.

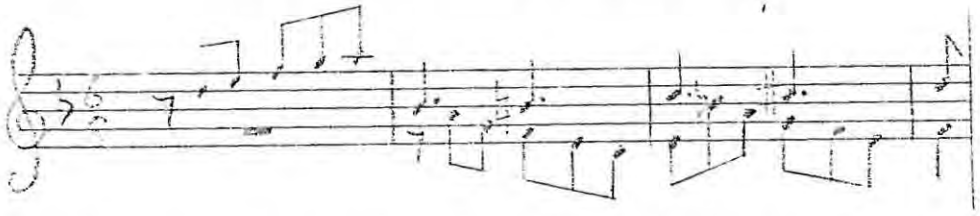
As can be seen from the first lute suite, the Bach lute suites are the most important works in that form in the guitar literature.

Bach's lute suite No. II in D minor (originally C minor) exists in the Leipzig Stadtbibliothek as a "Partita Al Liuto Composta Dal Sigre Bach". Although Bach subsequently arranged the suite for the clavier, there is definite proof that it was originally composed for the lute.

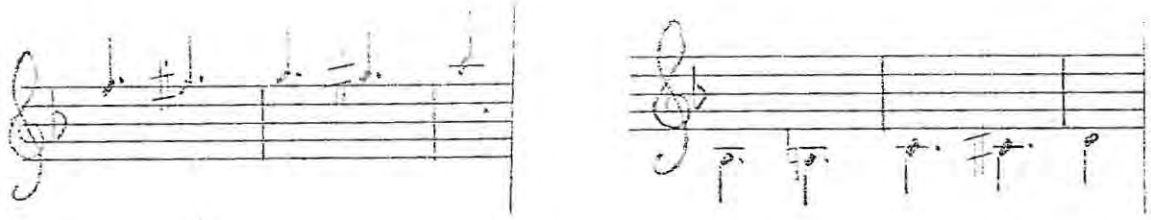
The suite consists of a prelude, fugue, sarabande, gigue and its double. The prelude is in two part writing with the upper line running almost continually in semiquavers except when the opening theme (mainly in quavers) is re-stated at the dominant level at bars 17 and 33.

The most remarkable movement in this suite is the fugue, the character of which is far removed from that of the dance movements. The theme upon which the fugue is built first rises diatonically and then leaps down a major seventh

rising again chromatically to the tonic note:



This rising chromatic line is used throughout the movement;



and adds a haunting melancholy to the whole work. It is in strict three part writing and is formally divided into three sections, A (bars 1-48), B (bars 49-109) and the A again but with a few slight changes which brings the movement rather close to sonata form.

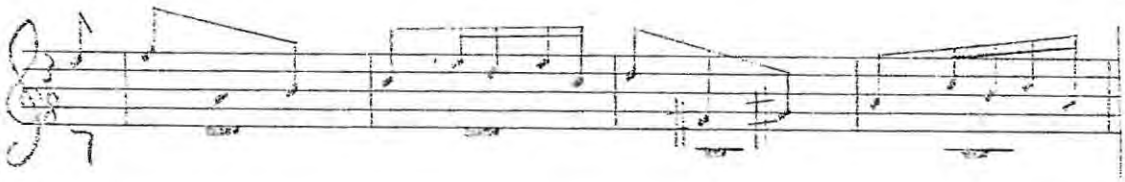
The sarabande retains the melancholy of the fugue but the gigue has a more cheerful theme. The double resolves the melody of the gigue into even flowing semiquavers but Bach did not stick to the harmonic progression of the gigue as was the practice of the time.

The suite No. III in A minor (originally G minor) was found in a collection of manuscripts titled Pieces Pour Le Lut Par Sre J.S. Bach which are now preserved in the Brussels Fetis library. The suite itself bears the title Suite Pour La Luth à Monsieur Schouster Par J.S. Bach. Mounsieur Schouster is thought to have been a chamber musician in Dresden at the time and father of Joseph Schouster who subsequently became Capell Meister there.

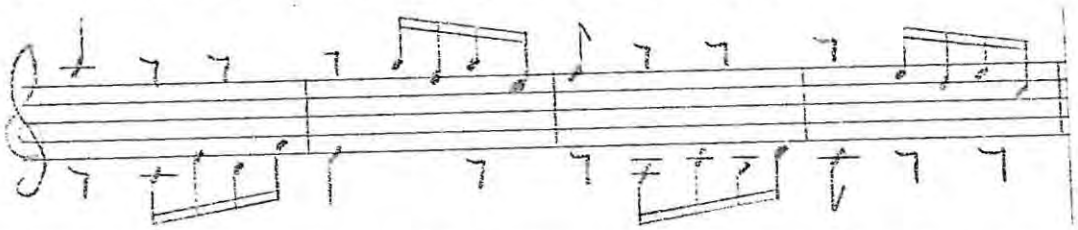
Unlike the first two suites, this suite was originally written for the 'cello (Suite Discordable) but Bach later arranged it for solo lute himself. It has seven movements, prelude, allemande, courante, sarabande, gavotte I, gavotte II

and gigue.

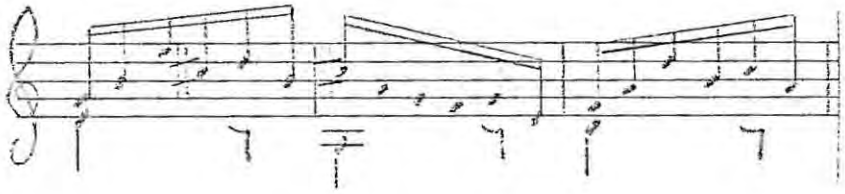
The prelude is a long movement (nearly two hundred bars) and like the prelude to the first lute suite, it begins with a slow section in $\frac{4}{4}$ before changing into the flowing presto section in $\frac{3}{8}$. That it was originally a 'cello solo, is obvious from the writing, i.e., there is often just a single part moving as in the opening eight bars of the presto;



or with two parts alternating as at bar 171;



and when bass notes are added they often have the function of merely establishing the harmonic progression more clearly:

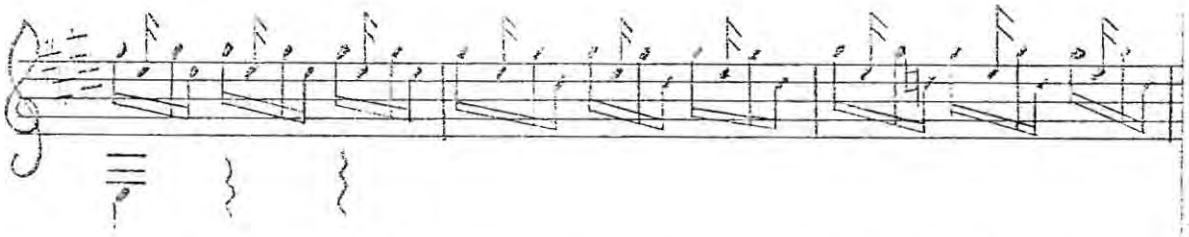


These characteristics are found in all the movements of the suite.

The suite No. IV in E major, because it was not originally written for the lute but for the solo violin, also shows these characteristics. At any rate the general opinion is that it was originally written for the violin, but some credit it to the clavier and even harp. It was, however, later arranged for the lute by Bach.

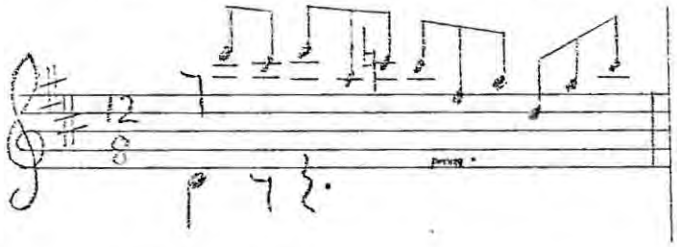
A study of the music certainly suggests that it was written originally for the solo violin because the texture indicates that it was originally a single part work (as in the third suite) and the lyricism of the movements would indicate

that it was for an instrument such as the violin. There are also certain sections that point towards the harp theory such as bars 17 to 28 of the prelude:



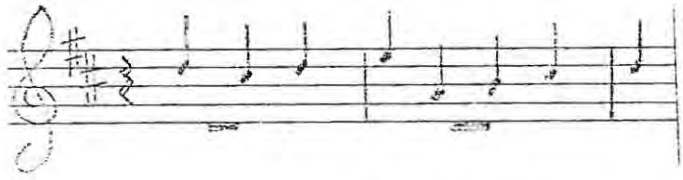
The suite has seven movements, prelude, loure, gavotte en rondeau, minuet I, minuet II, bourree and gigue.

Besides these four lute suites, Bach also composed and arranged other shorter works for the lute. One of these is the prelude, fugue and allegro in D major (originally E flat major.) The original manuscript bears Bach's autograph which indicates the music to be "Prelude Pour La Luth O Cembal". The opening bar of the prelude has a bass note on the first beat followed by the melody line in the upper register:



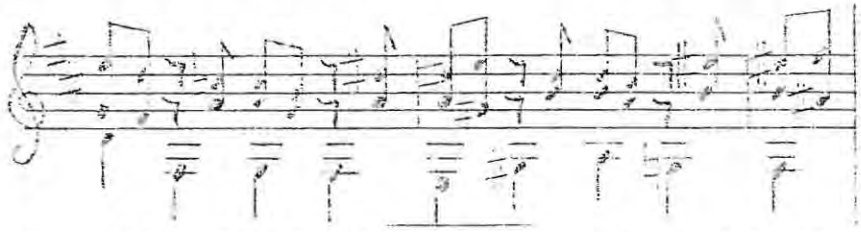
This idea of the leap up after the first beat of each bar dominates the whole prelude.

The fugue begins with the phrase;



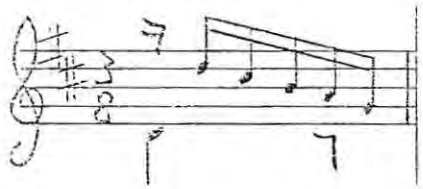
which is used again in bar 3 to introduce the second part and again in bar 7 to introduce the third part after which the work continues in three part writing until bar 29 at which point the middle section of the fugue begins. This middle section has a completely different texture to the first section. Whereas the first section moved mainly in quavers

using clear three part writing and typical Bach sequences;



the second section breaks into semiquavers with the top line dominating until bar 77, from where the first section is repeated but leaving out the initial phrase (first two bars). Bach does, however, interrupt the flow of the middle section on two occasions by introducing brief imitations of the above sequence in quavers. An unusual point about this fugue is that the opening phrase is used to introduce the three voice parts and is not referred to again (except, of course, in the repeat of the first section).

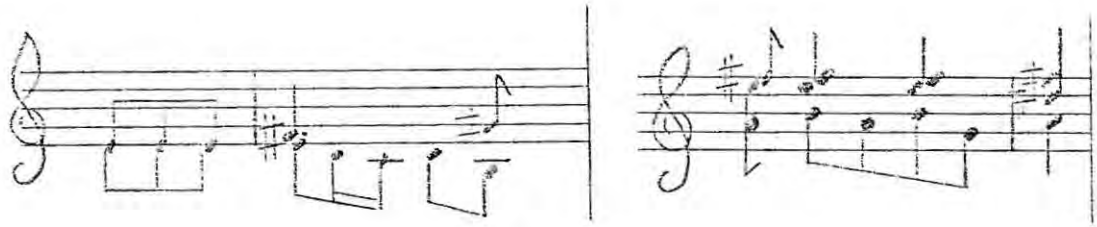
The allegro is in two part counterpoint with the top line dominating. It is similar to the prelude in that is also uses the idea of the leap up from the first beat as shown in the opening bar.



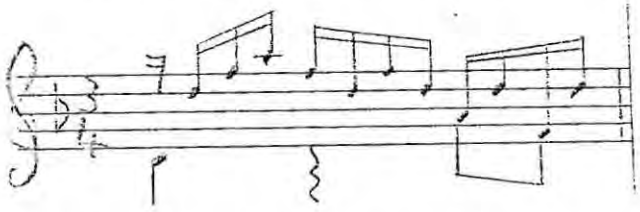
Another beautiful work is the fugue in A minor (originally G minor). Bach actually wrote three different versions of this work. The one appears as the fugue in the violin sonata in G minor, another in the prelude and fugue in D minor for organ and the last for lute solo. All three versions are so appropriate to their respective instruments that the musicologists have found it impossible to decide for which instrument the music was originally written.

The fugue is completely dominated by the opening phrase;

which is continually introduced at different levels. In the first seven bars alone it is introduced seven times. But Bach alternates these sections with short flowing sections in semiquavers which do not contain any reference to the theme thus avoiding any possible monotony. The work also contains some effective dissonances, e.g.



The last lute piece by Bach is the prelude in D minor (originally C minor). Once again it is not known whether it was originally written for the lute or keyboard, but it is particularly keyboardish with the division of left and right hands being obvious. The actual manuscript which contains the lute tablature of this prelude has the inscription "Praelude in C Mol Pour La Lute Di Johann Sebastian Bach". The prelude is based on a single bar rhythmic figure;



which is constantly repeated with changing harmonizations.

C H A P T E R I I I

THE CLASSICAL PERIOD

The Eighteenth Century saw the advent of the six string classical guitar and an increase in the number of performers and composers. This was accompanied by an important change in musical style as seen in the works of such composers as Sor, Diabelli, Giuliani, Carulli, Carcassi, etc. The composers whose works best represent the style of this period are Sor, Giuliani and Diabelli.

Jose Ferdinand Macario Sor (1780-1839) was born in Barcelona and began his musical studies on the violin and 'cello. He went to the monastery of Montserrat where his musical education was furthered, particularly in the fields of harmony, composition and singing. His guitar playing was, however, suppressed at the monastery so it was only after he left that he could devote himself more seriously to the instrument. He later joined the army and after the French invasion of Spain, he decided, along with many other intellectuals, to throw in his lot with the Bonapartes in the hope of a better deal than had been forthcoming from Charles IV. The result was, that when the French were driven out of Spain, Sor had to leave as well. After 1812 he lived in Paris where he associated with musicians such as Cherubini, Pleyel and Mehul. He gave successful concert tours, particularly in England and Russia, and was the first guitarist to be invited to play for the London Philharmonic Society in the hundred years of its existence.

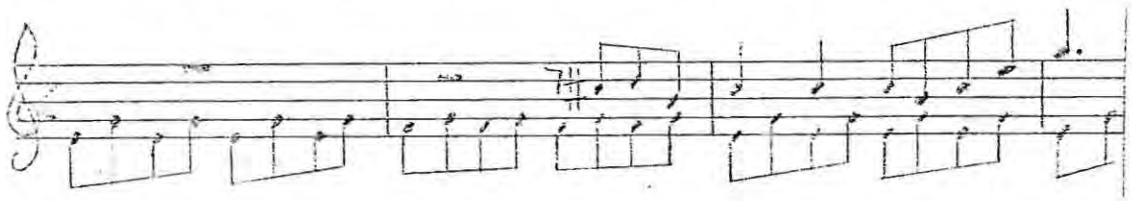
Sor's compositions are not restricted to the guitar. He composed ballets (his wife was a famous ballerina), operas, sacred music, string quartets, music for military bands, symphonies, songs, works for piano, etc. Many of these works exist as literary references only as the manuscripts have not yet been discovered. His guitar compositions, however, form the bulk of his work.

Mauro Giuliani (1780-1840) was born in Bologna in Italy and began by studying the guitar and violin, later concentrating on the guitar. He became Italy's most famous guitarist and toured Europe, finally settling in Vienna in 1807 where he associated with such musicians as Beethoven, Hummel, Moscheles and Diabelli. His popularity throughout Europe was such that, when he visited England in 1833, a guitar monthly publication, called the "Giulianiad", was started and was probably the first ever "fan" magazine.

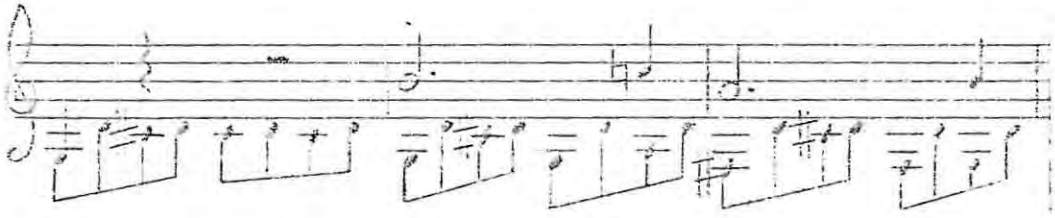
Anton Diabelli (1781-1858) was born near Salzburg in Austria and began by following a clerical career but later left for Vienna and became a pupil of Michael Haydn. Diabelli was a composer and teacher of both the piano and guitar and later went into the music publishing business, working in close association with Giuliani.

These composers composed in all the usual classical forms, e.g., sonatas, variations, concertos, studies, fantasias, airs, divertisiments, etc.

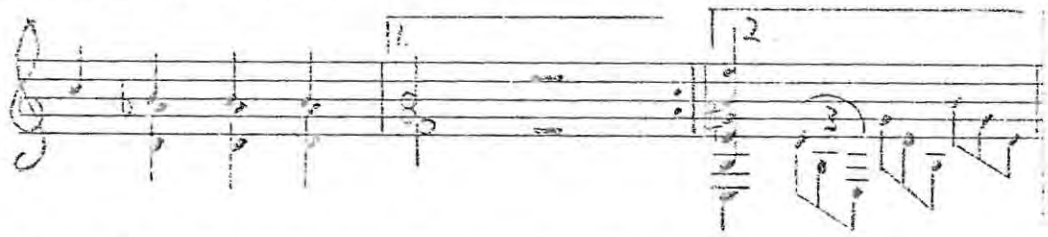
Giuliani wrote only one three movement sonata. This work is his Op. 15 No. 1 in C major which has become one of the most popular sonatas of the classical era. The work is in three movements, Allegro spiritoso, Adagio con expressione and Allegro vivace. The first movement is in sonata form with two themes in the exposition. The first theme begins with an accompaniment figure on to which the melody is built from the second half of the second bar:



After the transition section, in which the music modulates through D major to G major, the second theme is introduced in the dominant and also begins with an accompaniment figure on to which the melody is built:

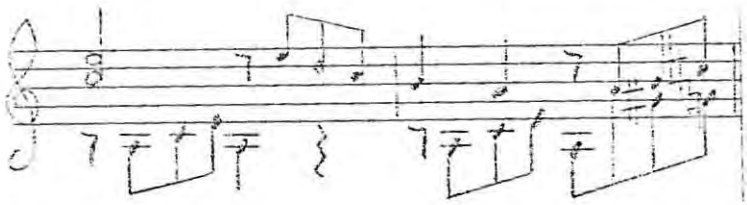


The transition from the exposition to the development is rather cleverly done:

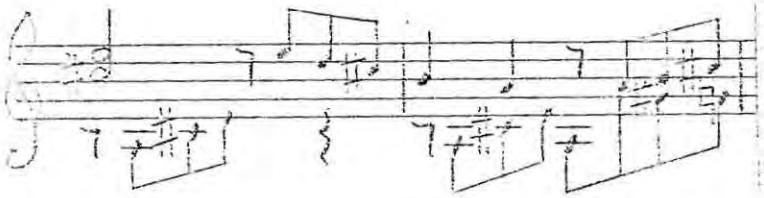


Before the repeat back to the beginning of the exposition, the A flat note drops to a G thus giving the dominant seventh of the opening theme. After the repeat has been played the F; A flat; B; chord has a dominant function (half diminished seventh on B) to the first chord of the development. This E major chord, however, also has a dominant function as the development is in A minor.

Giuliani introduced a new theme in the development, first in minor;

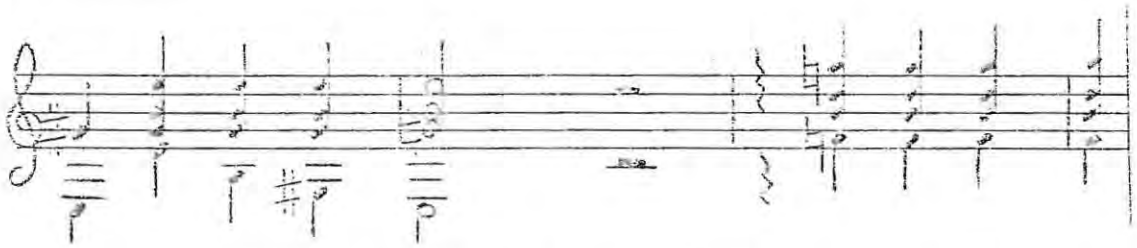


and then in major:



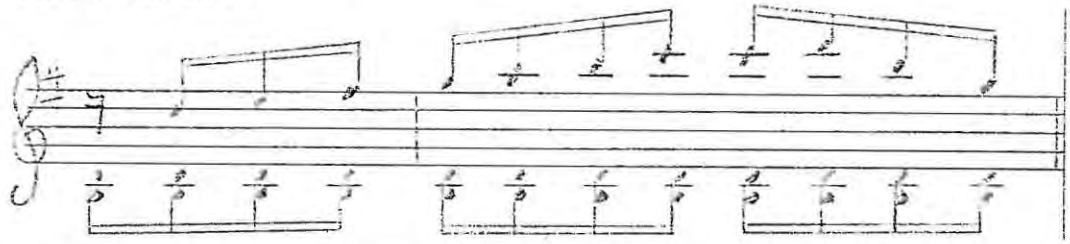
The transition from the development into the recapitulation is somewhat the reverse of the transition from the exposition to the development. The development section ends

on an E major chord and Giuliani then introduced a G seventh chord as the dominant of the key of the recapitulation (C major):

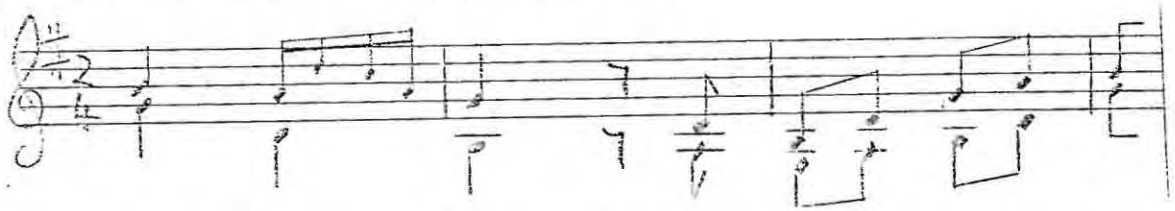


The recapitulation contains both themes of the exposition in the tonic key.

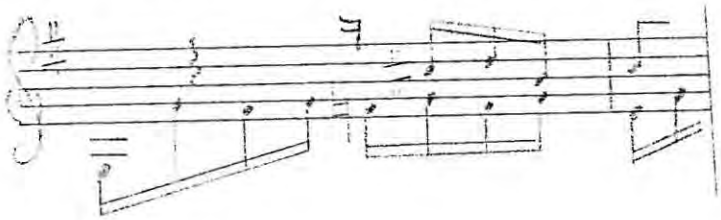
The Adagio is in the dominant (G major) and is characterized by the melody line being supported by repeated two note chords:



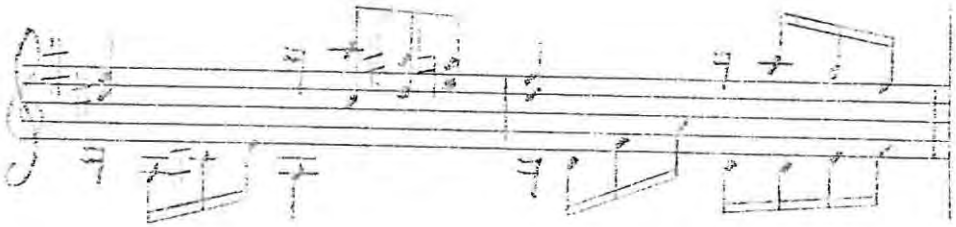
The opening bars use horn intervals;



and during the movement he introduced the themes from the first movement, e.g., the accompaniment figure of the second theme of the exposition in combination with the first theme:

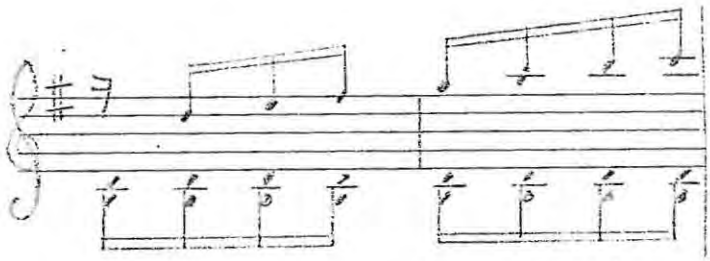


References to the theme from the development are also to be found:

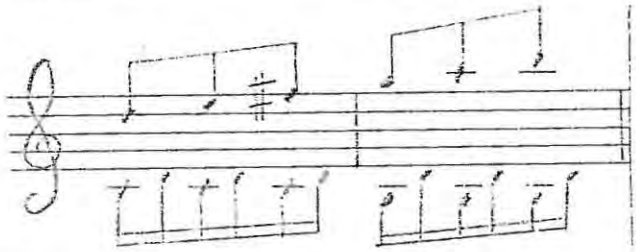


The final movement is in C major and is the lightest of the three movements. It follows the standard formal outline of the classical sonata in that it is in rondo form. The movement is tied to the Adagio in musical content, e.g., the comparison between the following two extracts;

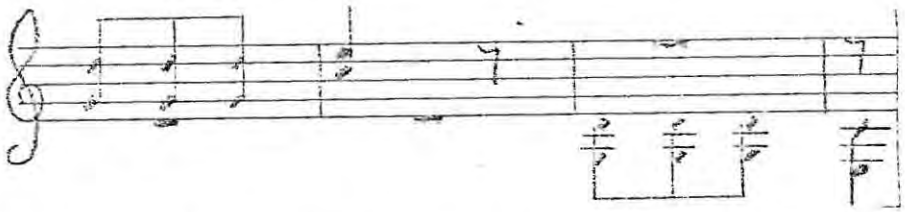
ADAGIO



ALLEGRO

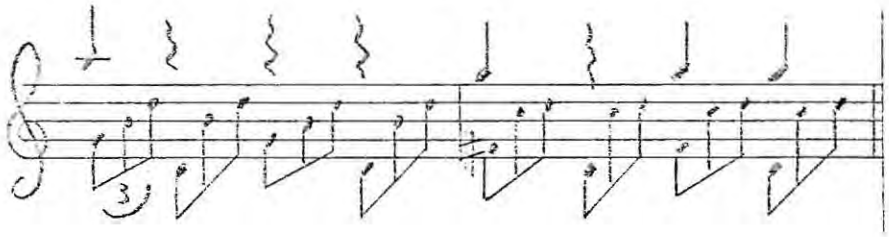


and the fact that he ends the allegro as he began the Adagio, i.e., using horn intervals:

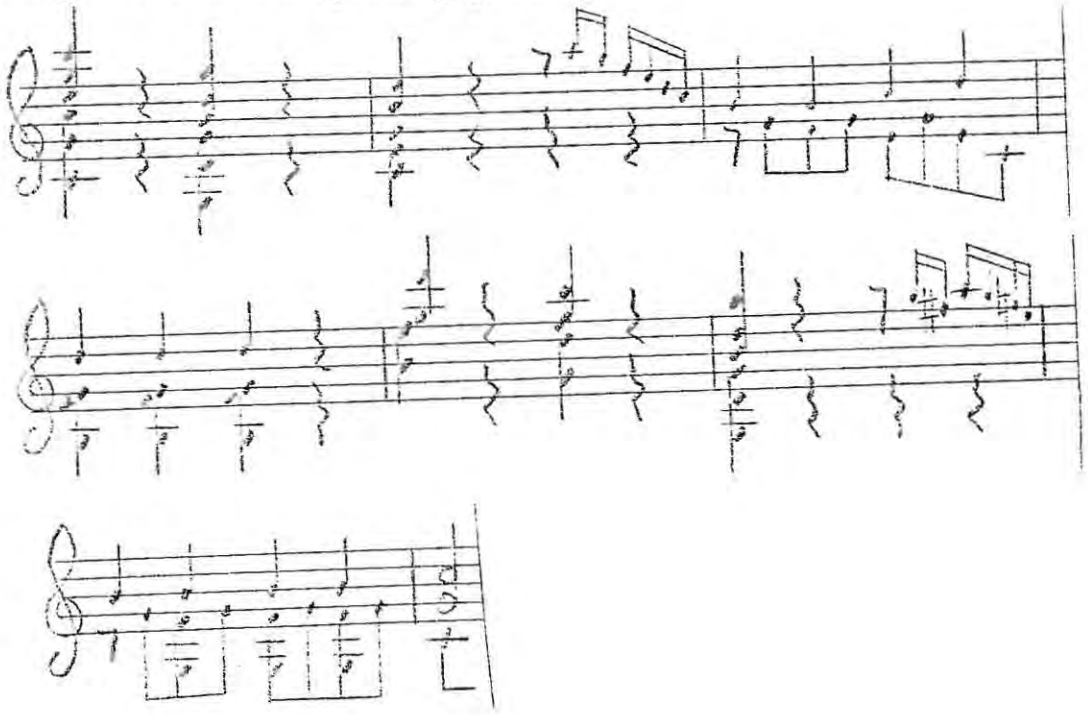


Taking this sonata as representative of the sonatas of Sor and Diabelli as well, we can see that the classical guitar sonatas are formally comparable to the piano sonatas of the time. This sonata, like the sonata No III by Diabelli, has only three movements but most of the other sonatas have four movements with the extra movement being a menuet between the second movement and the final movement as in the sonatas No. I and II by Diabelli and the Op. 22 by Sor.

As far as musical style is concerned, these sonatas clearly show the new classical idiom. Firstly, the classical writing was homophonic as against the contrapuntal baroque style. Instead of having two or more melody lines moving at the same time, the composers wrote a single melody line which supported by chords. This subordination of the bass and harmonics to the melody line resulted in the common use of an accompaniment figure called the "Alberti Bass". This consists of a chord being broken in an incessantly repeated pattern in support of the melody line. Although it is actually a keyboard device, it is often found in guitar music, e.g. the first movement of the sonata Op. 15 No. 2 by Sor:



The complexity of the baroque "spinning out" of the melody line was superceded by melody lines in regular phrases of two or four bars each resulting in a periodic structure. The sonata Op. 22 by Sor begins with two four bar phrases giving a balanced opening period:

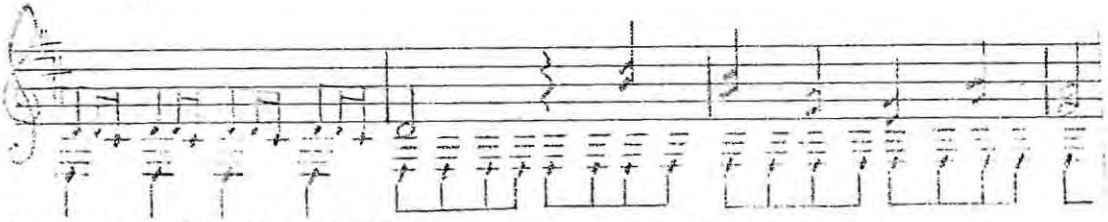


Contrasting phrases or periods are often put side by side as in the riternello of the rondo from the same sonata. It consists of two four bar phrases marked "Deciso", followed by a contrasting four bar phrase marked "Dolce" and then returning to the "Deciso" phrases.

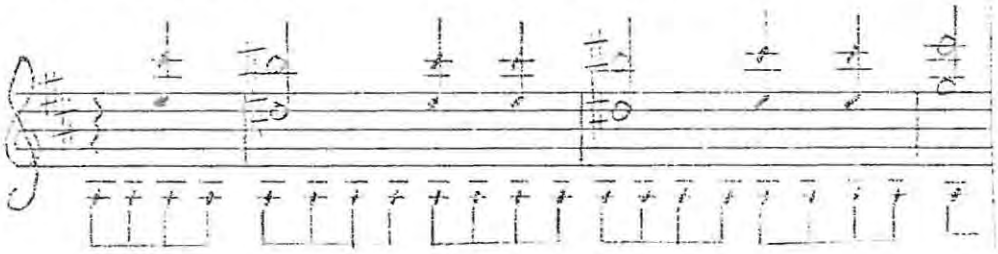
This increased use of shorter phrase lengths meant, in turn, that cadences occurred more frequently as they were used to puntuate the periods giving a clearer structural division.

The classical style is more immediately appealing to the average listener because of the clear cut phrasing of the single melody line and the simpler harmonic support. It is also a much more international language. Sor and Giuliani both toured and worked in the whole of Europe from England to Russia whereas the baroque guitarists confined themselves more, i.e., Sanz to Spain and Italy and de Visee to France.

Sor and Giuliani both composed in extended single movement sonata forms as well. The Op. 14 "Gran Solo" by Sor begins with a slow twenty five bar introduction in D minor after which the allegro section begins in D major. The movement is two hundred and seventy three bars long and shows a technique which is commonly found in the compositions of the classical guitarists, particularly Sor. This is the idea of having a pedal note on an open string over which the melody moves either in single notes or double notes moving parallel. For example, the allegro of the "Gran Solo" begins with the following;



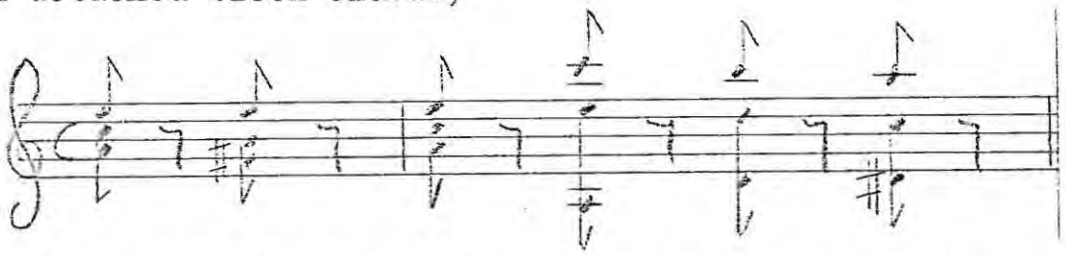
and at bar 79 the following passage occurs:



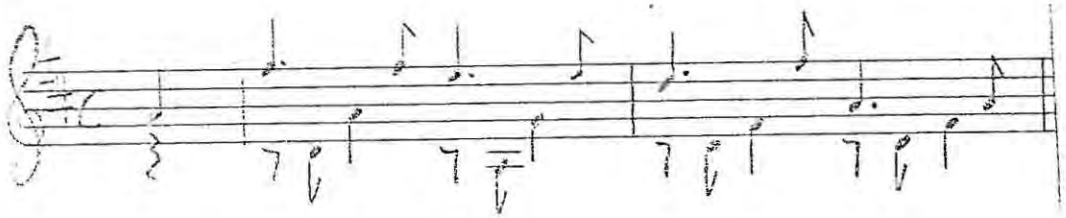
The "Grand Overture" Op. 61 by Giuliani is also a single movement sonata form. It is a colourful evocation of a classic opera overture and is very "orchestral" sounding. It was, perhaps, after hearing Giuliani play this work that Beethoven made his famous remark to the effect that the guitar is a "miniature orchestra".

The Eighteenth Century saw the first guitar studies as such and the undoubted master of this form is Sor. His studies strike 'the right balance between the pedagogical purpose and the natural musical beauty' - Segovia. He wrote many studies under different opus numbers, e.g., Op. 6, 29, 31, 35, 44 and 60. They vary in difficulty from very easy to very difficult. Sor's best studies have been published in the work Twenty Studies, edited by Segovia and this collection, therefore, gives the best impression of Sor's studies and the technical aspects which they explore.

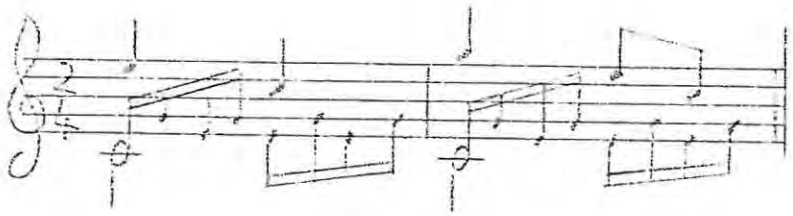
These aspects include the playing of three or four part chords as in the No. 9 of the collection which is entirely in detached block chords;



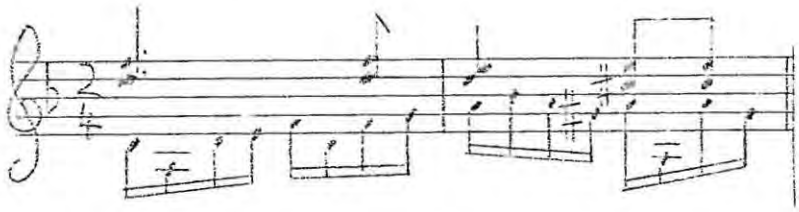
while others are in broken chords as in the No. 6 which consists of three part chords broken in a repeated right hand pattern:



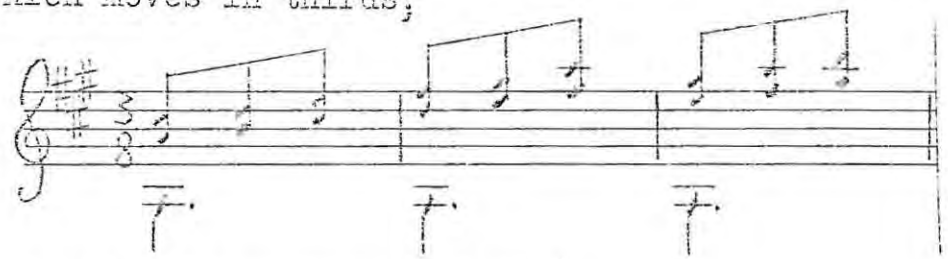
Other studies are exercises in accompanying a melody line with broken chords in the style of the "Alberti Bass" as in No. 2:



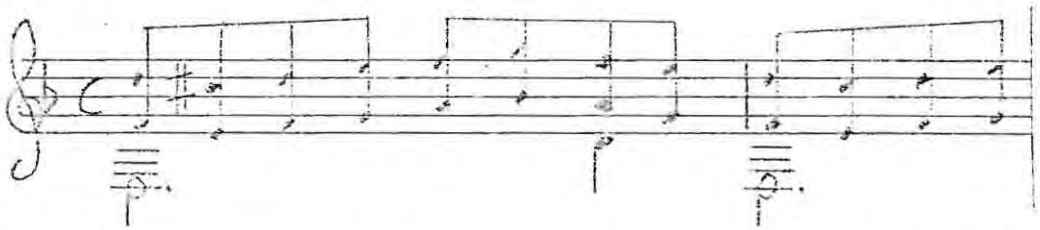
This No. 2 study requires the melody line to stand out in volume above the accompaniment, but other studies such as the No. 8, require the bass line to dominate with the accompaniment being played on top:



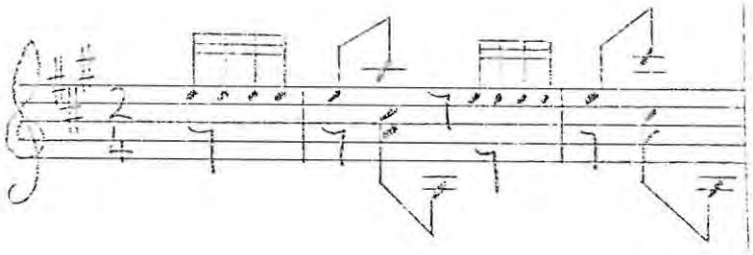
A technique which is particularly difficult on the guitar is that of playing parallel notes with speed and smoothness. Sor wrote many studies using parallel notes such as the No. 12 which moves in thirds;



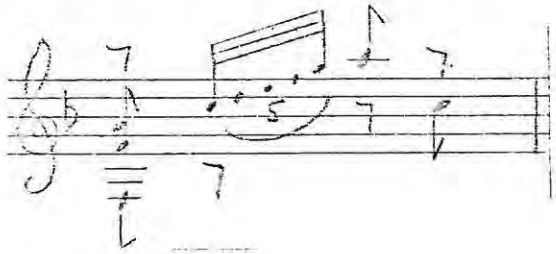
and the No. 15 which moves in sixths:



Other studies include the rapid repetition of notes as in No. 10;



and the playing of rapid scale passages as in Op. 29 No. 2.



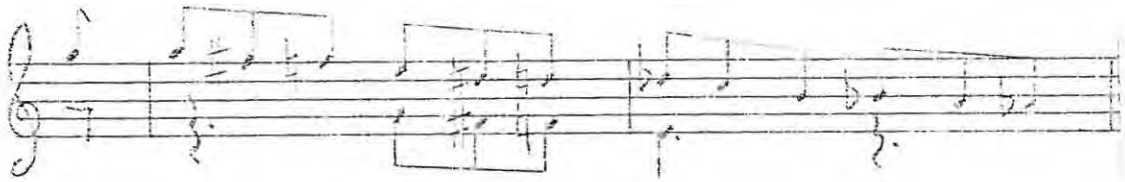
Sor composed in a greater variety of keys than had been usual on the guitar. His key signatures range from four sharps to three flats and in the "Gran Solo" he goes to five flats at one stage.

In the field of the theme and variations, Sor once again reigns supreme. The most important of his sets are the variations on a theme by Mozart (Op. 9) and the variations on a theme by Paisiello (Op. 16).

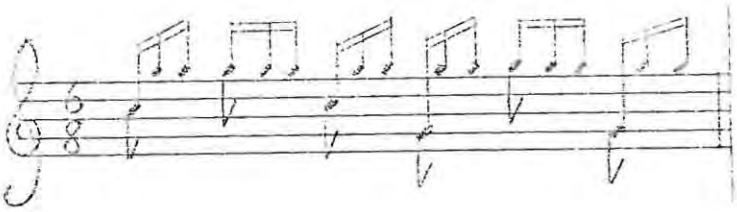
Sor must have been an admirer of the work of Mozart and, in particular, his opera, "The Magic Flute". This can be assumed from the fact that the Op. 19 by Sor is his arrangement for solo guitar of six airs from "The Magic Flute", the Op. 9 variations are based on the "O Cara Armonia" theme from the same opera and that Sor was an opera composer himself.

The variations begin with a slow introduction in E minor (twenty three bars) before the theme is stated in E major. The theme and five variations are all in binary form with each section being repeated. All the variations, except the second, which is in E minor, are fast show pieces, each one being almost a study exploiting a particular playing technique. The work ends with a twenty two bar coda which requires an equally brilliant technique.

Sor chose the piece titled "Nel Cor Piu Non Mi Sento" by Paisiello as the theme for his Op. 16 variations (Giuliani also used this theme for his Op. 4 variations). The work includes nine variations but of particular interest are the third, seventh and eighth variations. The third variation consists of ascending and descending chromatic lines throughout.



The seventh variation uses a tremelo figuration for the top line;



and the eighth variation is played by the left hand alone. it, therefore, consists of a fast moving single melody line mainly on the third, fourth and fifth strings to be played entirely in ascending and descending ligados.

The classical composers were the first to write for the guitar in the concerto form. Although Sor and Carulli both wrote concertos it is the Giuliani works which show the highest level of composition skill. Giuliani's primary pursuit was performance and composition was, for him, a means towards this end. His three concertos (Op. 30, 36 and 70) are display pieces which he only meant for himself to play. He wrote these concertos in such a way as to exploit in a very satisfying way, the solo-tutti relationship, and knew how to limit the orchestral accompaniment to soft, subdued strings when the guitar would play.

The best known of his concertos is the Op. 30 in A major which he wrote in 1810. Modern editions of the orchestral score always leave out the wood ind, brass and timpani, the parts of which are still only in manuscript form.

The Op. 36 concerto is the most lyrical of the three and is similar to his Op. 15 sonata in that he introduces new material into the development section of the first movement instead of developing the themes of the exposition. Some

musicologists see this as a weakness, but, it must be remembered that the piano concerto No. 23 (K. 488) by Mozart also does this and Giuliani may have wanted to experiment in this way as well. Another point is that the Op. 30 concerto developes the second theme of the exposition which shows that he was able to write a more conventional development before he started experimenting with new material in the development. It is generally known, however, that few classical Italian composers really understood motivic development and what it involved. The term development was not even used by music theorists with regards to sonata form until after 1820, by which time Giuliani had written his concertos.

The Op. 70 concerto was written for the terz guitar, a smaller guitar which was tuned a minor third higher than the standard guitar. The orchestral score is in F major and the guitar key is a minor third lower, D major (sounding F major). Since the terz guitar is no longer generally available or played, the orchestral part has been transposed down to D major. The exposition has the usual two themes, but once again the development does not develop these, but finds new material. There is the usual virtuoso's cadenza near the end. Both the Op. 36 and 70 only restate the second exposition theme in the tonic, leaving out the first theme.

The second and third movements of the three concertos, like the Op. 15 sonata, are of less importance. Op. 30 and 70 both have slow second movements in $\frac{6}{8}$ marked "Andantino Siciliano" and "Alla Polacca" finales. The Op. 36 concerto has its slow movement in $\frac{3}{4}$ and a $\frac{2}{4}$ rondo finale.

We have already noted the extent to which the vihuela (or lute) - voice combination was used during the Renaissance. It was not until the late Eighteenth Century that composers began to compose for the guitar in combination with other instruments to any extent, in the form of duets and trios, etc. The combinations that were used included guitar and piano, guitar and flute, guitar and violin, etc., but the most interesting are the works for two guitars.

The guitar has a large range of tone colours and is able to produce both simple and sophisticated harmonies. The guitar duo greatly extends the musical possibilities of the solo guitar giving extra depth and substance to the sound without losing the clarity. With the guitar trio, however, the sound becomes opaque and it is, therefore, the guitar duo which gives the maximum resourcefulness of the instrument giving a tonal variety approaching that of an orchestra.

The earliest duetists of importance were Sor and Aguado who played together in Paris during Aguado's visit there. Of Sor's compositions for two guitars the Op. 34 work is the most important. The duo begins with an "Andante Cantabile" movement in E Major in which the guitars alternate between palying the melody and the accompaniment.

GUITAR I A Accompaniment B Accompaniment

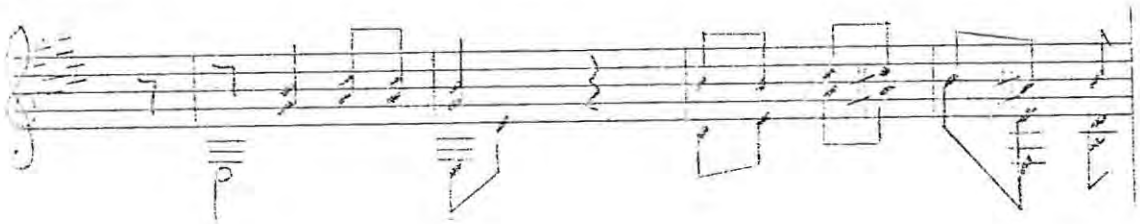
GUITAR II Accompaniment A Accompaniment B etc.

Then the main body of the work begins. It is in the form of a theme and variations with the guitars alternating as in the first movement.

Sor has written the work so that the guitar playing the melody line has a single part to play while the accompanying guitar fills in with two or three part chords as in the beginning of the theme:

GUITAR I

GUITAR II



C H A P T E R I V

MODERN GUITAR MUSIC

The romantic period as such has been left out of this discussion for the following reasons. The classical composers, discussed in the previous chapter were all late classical and early romantic. For example, Sor, Giuliani, Diabelli, Carcassi and Carulli, all outlived both Beethoven and Schubert. Their compositional style, however, remained basically classical. Those composers who did live within the Nineteenth Century, i.e. Ferranti (1802-1887), Coste (1806-1883), Mertz (1806-1856), etc., are of little importance in that their music is of a lower quality and shows no particular change in musical style from that of the classicists. The one nineteenth century composer who is of importance is Tarrega, but the following chart of the life spans of the different composers clearly shows my reason for placing him at the beginning of the line of modern composers.

Sor

Giuliani

Carcassi

Tarrega

Llobet

Ponce

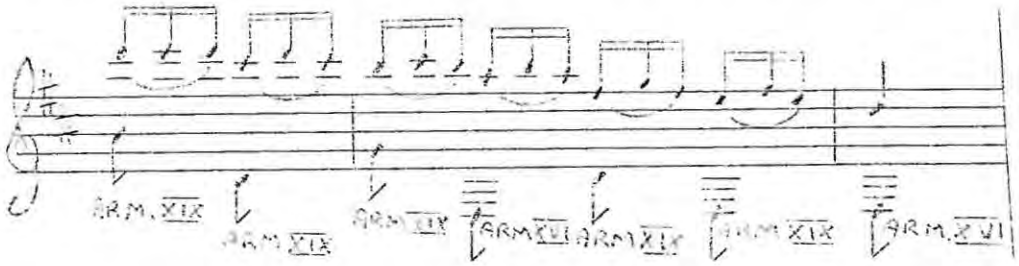
Villa Lobos

Francisco Eixea Tarrega (1854-1909) was born at Villareal in Spain of a poor family. He began by studying both the guitar and piano and later completed his piano studies at the Madrid Conservatoire. After holding teaching posts at both the Madrid and Barcelona conservatoires, he finally settled in Barcelona where he taught the guitar. His pupils included guitarists of the callibre of Llobet and Pujol. Today he is regarded as the founder of the modern guitar technique and his compositions are often heard in

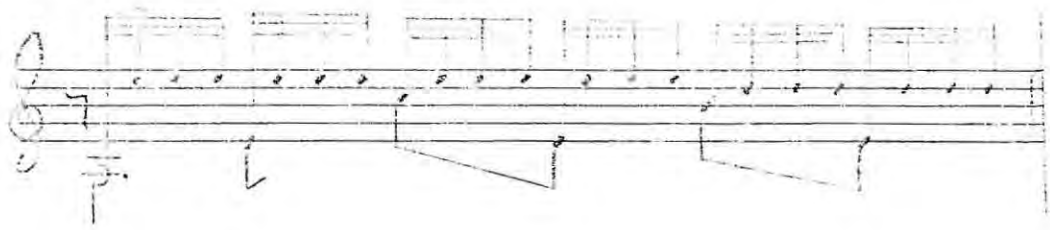
concerts and on record.

All Tarrega's compositions are single movement character pieces in the form of dances, preludes, caprichios, studies, etc. One of the characteristics of nineteenth century music was the writing of program music and many of Tarrega's works have programmatic titles with the music evoking mental pictures thereof. One of these is the "Carrichio Arabe" which has an underlying Moorish flavour as shown in the following scale passage from the short introduction:

Another fascinating example is his Alborada which is subtitled "The Little Musical Box". Tarrega imitates the sound of the musical box in certain sections by having the upper line played entirely in Ligados with the left hand and the lower part in harmonics with the right hand:

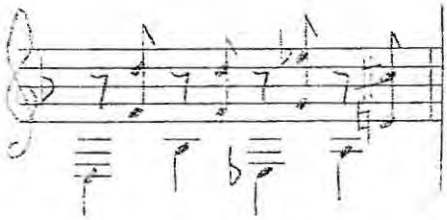


Tarrega's most famous work is his "Recuerdos De La Alhambra" (Memories of the Alhambra) which, as the story goes, Tarrega wrote after a visit to the Alhambra and which reflects his impressions of the palace and gardens. It is written in the form of a tremelo study with the melody line played as a three note tremelo while the thumb plays broken chords in support:

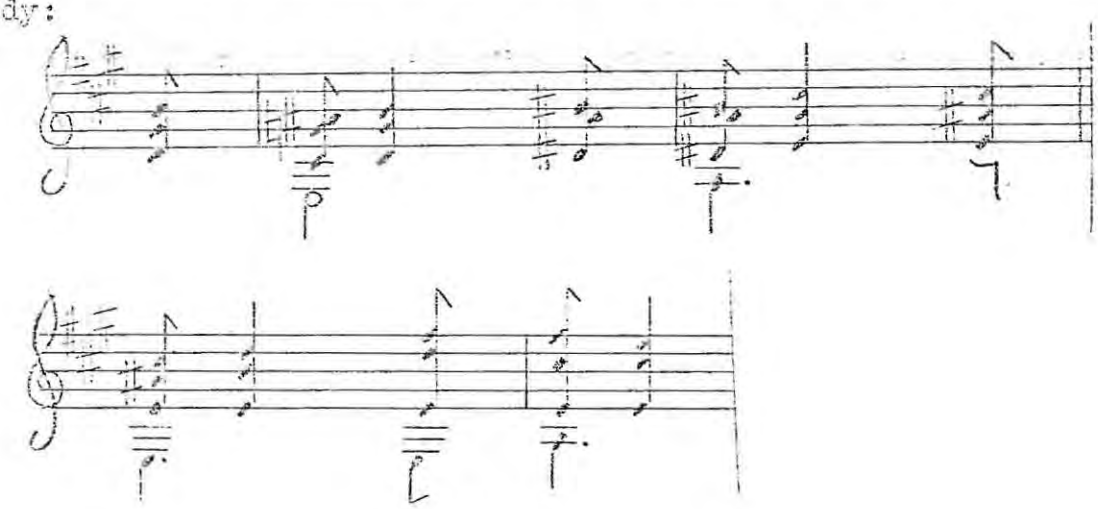


Tarrega subtitled many of his short dance movements with girl's names, e.g., Adelita (Mazurka), Marieta (Mazurka), Maria (Gavota), Rosita (Polka), etc. We can only assume that he was inspired to write the works by the "senoritas" in question and that they portray something of the character of each.

Tarrega's music shows the result of the evolutionary process whereby nineteenth century harmonic vocabulary broke away from the limitations of the classical harmony. He wrote chord progressions using chords that are not directly related as in the following extract from the "Caprichio Arabe":



His writing shows a greater use of chromatic harmonies, more complex chords and a greater use of nonharmonic tones, ritardations and suspensions as in the introduction to the "Bueno" study:



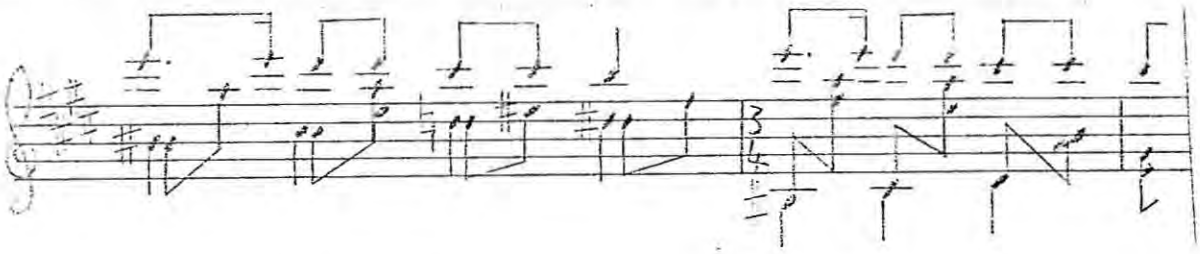
Tarrega's use of more distant modulations is particularly evident in such works as the Prelude No. 2. Within the first fourteen bars he modulates through the following keys:
A minor, G major, A major, C sharp major, F sharp major, A sharp minor, C sharp minor and B major.

All this new harmonic vocabulary resulted in a much more colourful writing with greater potential for expression. The guitar that Tarrega played was a far better instrument

than that which Sor and his contemporaries had played. Torres had by now made his structural improvements to the guitar which made it capable of producing a fuller and sweeter tone at a greater range of dynamic levels, thus enabling it to cope with the demands of this more expressive music.

Tarrega used a bigger range on the guitar than had ever been used before. In fact it is common for his compositions to use notes above the twelfth fret while pieces like the Alborada go up to the seventeenth fret.

As one would expect, Tarrega's most famous pupils Llobet and Pujol continued to compose in very much the same style. Miguel Llobet (1878-1837) was one of the greatest concert guitarists of all time and his main contribution to the guitar literature consists of brilliant arrangements of Spanish folk songs (especially from Catalonia) for solo guitar. His ability at harmonizing a simple folk melody with colourful chromatic harmonies is evident in all the works, e.g., the following extract from "La Nit De Nadal":



To add further colour to his arrangements, Llobet makes extensive use of harmonics. The whole of the first half of "La Filla Del Marxant" has the melody in harmonics with harmonics used throughout the work in the accompaniment. Other works such as "El Mestre", "Canco Del Lladre" and "El Testament D'Amelia" use harmonics extensively.

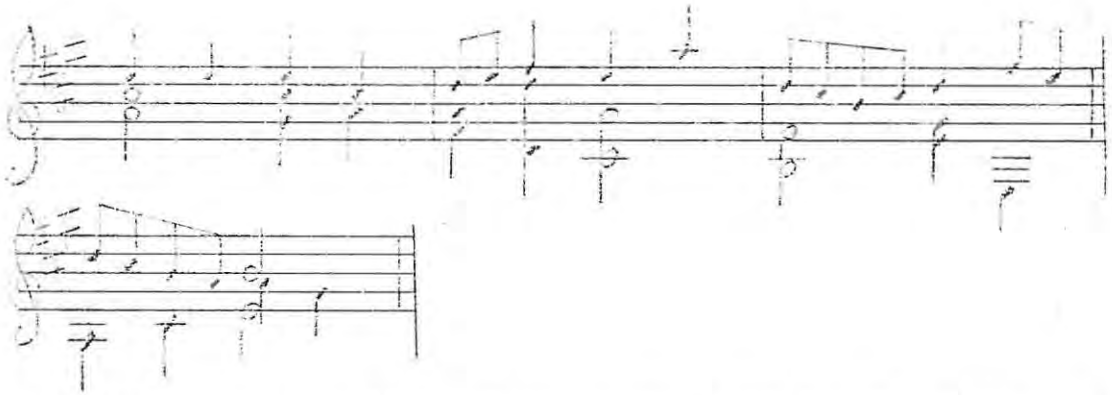
Emilio Pujol (born 1886) has done much to further the study of the guitar and its history. His publications include such subjects as guitar technique, timbre on the guitar, guitar construction, etc. Pujol's compositions include short easy pieces with a simple harmonic structure such as "Le Petit Grenadier" as well as more extended pieces.

The "Guajira", which is over one hundred and seventy bars long, is sectional in that it begins in D major, and after two and a half pages the key signature changes to G major and later to G minor, finally to return to D major. This is accompanied by changes in tempo, pause signs and an ad. lib. section.

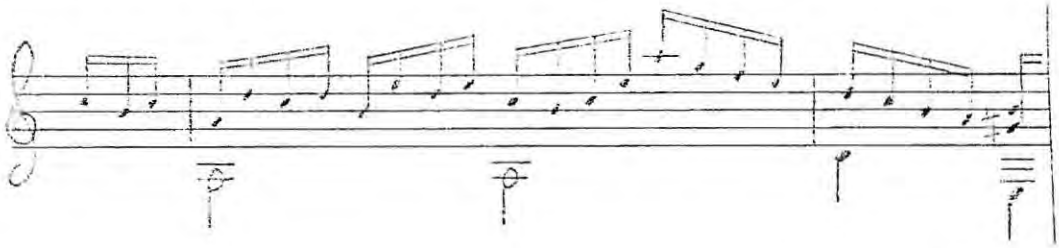
In contrast to the above three composers, who we could catagorise as the "Tarrega School", we have the South American composer Manuel Ponce (1885-1948). He was born in Mexico and studied in Paris under Paul Dukas and became the first Mexican composer to raise the music of Mexico above the "Salon music" category.

Up till now all the major composers for the guitar were also the top performers on the instrument and it was very rare that a composer from the general history of music would have composed for the guitar. From the beginning of this century, however, other composers, many of whom do not play the guitar at all, have begun to treat the instrument seriously. Ponce was one of the first of these modern composers and was inspired to write for the guitar by Segovia.

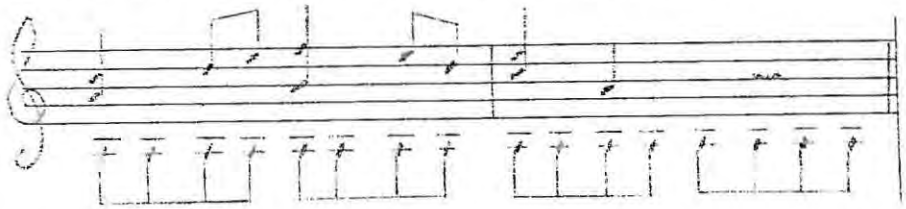
An interesting section of his composition is those works which imitate the style of other composers. One of these is his "Suite Antique". The writing of this work began as a joke between Segovia and Ponce. Segovia commissioned Ponce to compose, secretly, a suite in the style of the baroque lutenist Weiss. This work was then credited to Weiss at a subsequent concert. The truth about the origin of the work has only recently been made known and so most of the recordings and music editions still credit the work to Weiss. The suite is in five movement, prelude, allemande, sarabande, gavotte and gigue. The actual writing is perhaps more classical than baroque as each movement has a clear melodic line which is easily remembered and such sections as the trio from the gavotte show typical classical phrasing and harmonization:



The most baroque sounding of the movements is the allemande which has the typically Bachian style of the continuously flowing upper line supported by occasional bass notes (as in Bach's lute suite No. III:

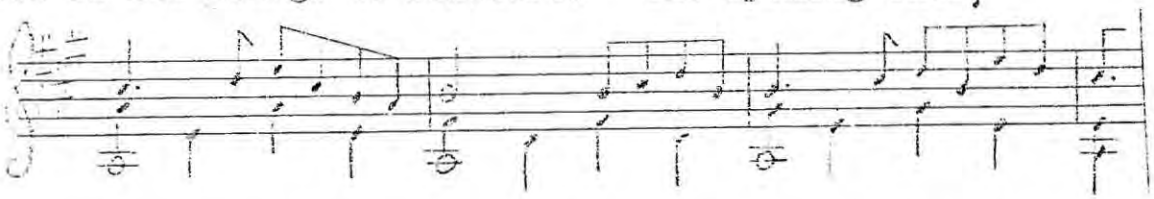


Ponce wrote a four movement sonata in homage to Sor titled "Sonata Clasica" in which he imitates the style of Sor, e.g., the fifth bar of the first movement:



The form is typically classical in that the first movement is in sonata form followed by a slow movement, a minuet and trio, and an allegro. His harmonic writing is, however, somewhat more chromatic than is found in Sor's works.

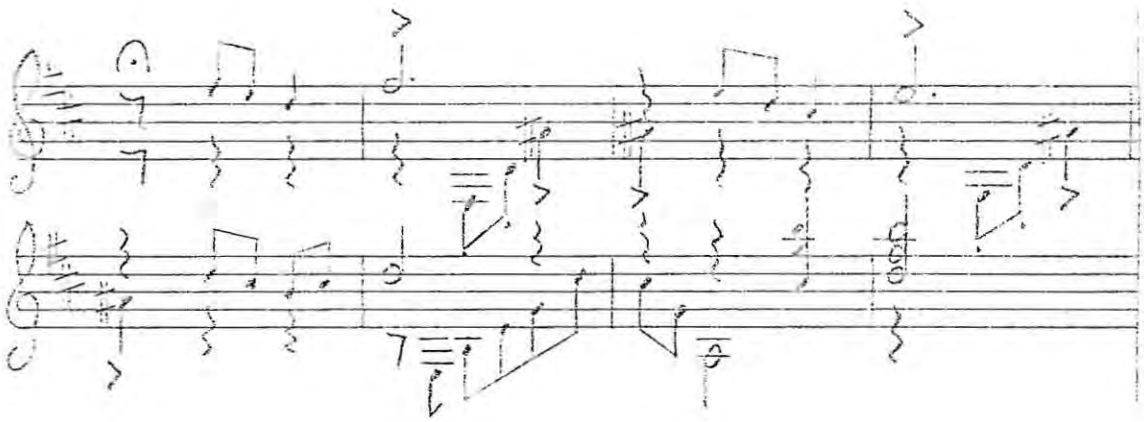
Another sonata by Ponce is the "Sonata Romantica" which is his homage to Schubert. The opening bars;



already echo the spirit of Schubert's music. The whole work

is particularly Schubertian with its contrasting moods, pivotal transitions of key and juxtaposition of major and minor.

The last in this category of works is his "Valse" in D major which, although not indicated as such, is very reminiscent of the waltzes of Johann Strauss, particularly in such sections as that starting from bar 40:

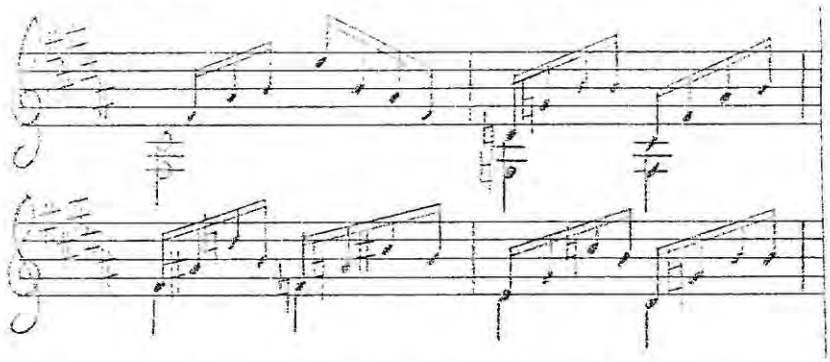


Ponce's original works include another two sonatas, a concerto, themes with variations (including variations on "Folia De Espana"), preludes, studies and arrangements of Mexican folk songs. Ponce spent much of his life collecting original Mexican folk melodies and his work is full of this South American lyricism, rhythm and harmony combined with the European tradition of classical discipline.

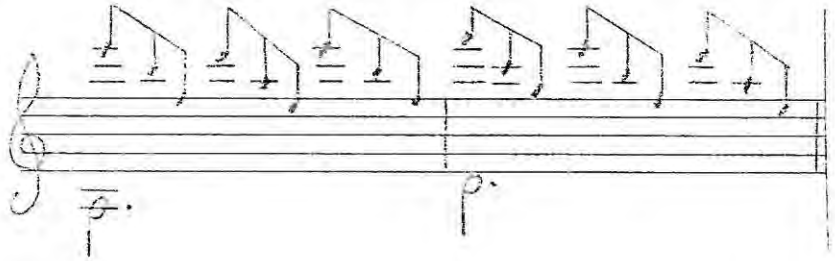
Another composer whose work is influenced by the native music of South America is Heitor Villa-Lobos (1887-1959). He was a Brazilian composer, pianist and teacher and was taught the guitar by his father at a very early age. Although he never became a particularly good guitarist, his compositions show a very thorough understanding of the instruments potential as well as its limitation. His most important guitar works include five preludes, twelve studies, five pieces from the "Suite Populaire Bresilienne" collection, a concerto and his own arrangement for guitar and soprano of his famous "Bachianas Brasileiras No. 5" which he originally wrote for eight 'cellos and soprano.

One of the most striking features of Villa-Lobos' writing is his use of parallelism which gives a very impres-

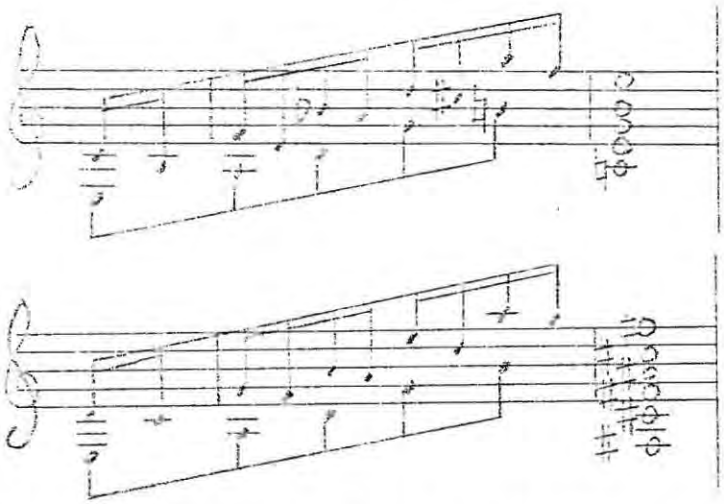
impressionistic sound to the music. The technique is peculiar to the guitar and involves the moving of a particular chord shape (often including open strings) up and down the fretboard obtaining some very colourful combinations of notes as in the middle section of his second prelude;



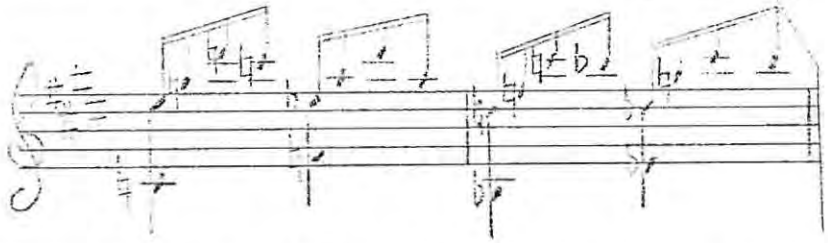
and in the closing section of the Masurka-Choro:



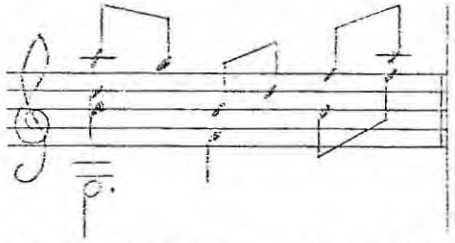
Villa-Labos' compositions are based on a single tonal centre as, for example, they always begin and end, in a particular key. However, his compositions often contain short passages which are polytonal but these are only passing passages and the polytonality is never actually established. This may, therefore, be compared to his parallelism as both have a decorative function. An example of his polytonality can be found in the third prelude where an ascending passage resolves to a C major seventh chord and then a similar passage resolves to an F sharp major chord.



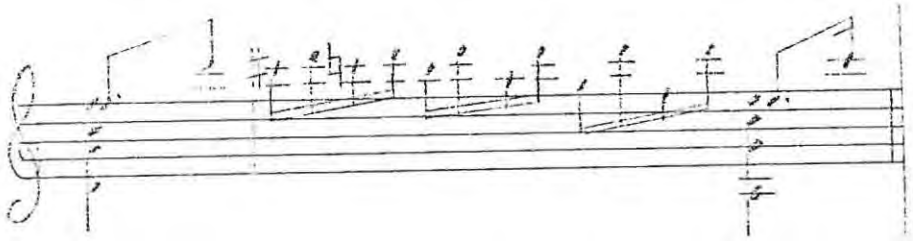
One of the distinguishing features of Brazilian folk music is the use of the flattened seventh note. Villa-Lobos' fondness for this note in his harmonies probably stemmed from this influence. He uses it in different combinations, i.e., a dominant seventh chord as in the second prelude;



or often as a dominant ninth chord as in the Mazurka-Choro;

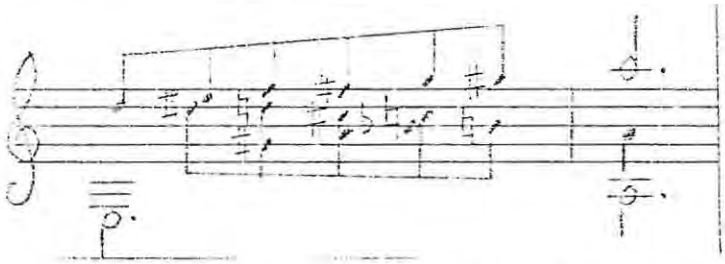


or in combination with a minor chord as in the second section of the third prelude:

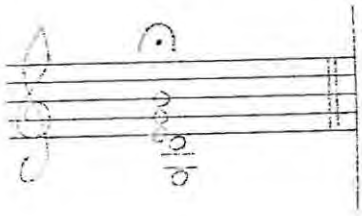


His parallelism often results in what would appear to be chromaticism but he also wrote very chromatic passages

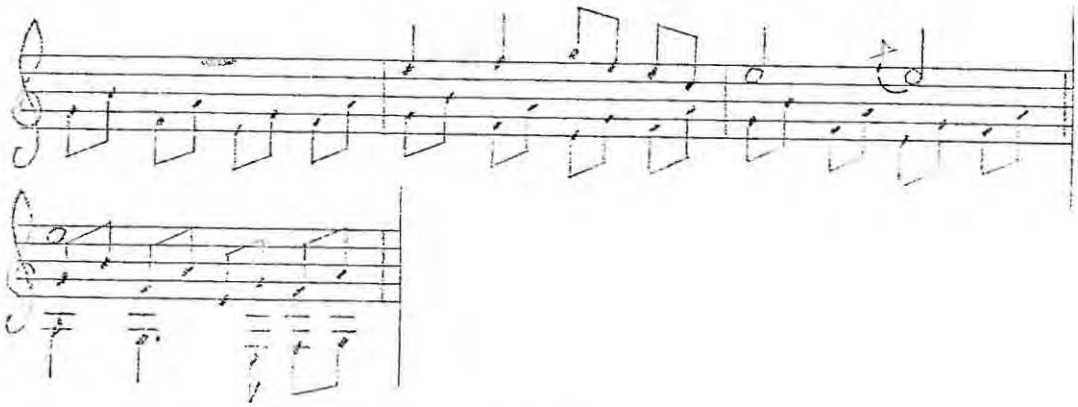
as such as in the Valse-Choro:



His favourite chord with which he ends a lot of his works is the major sixth, e.g., the final chord of the fourth prelude:



His twelve studies are considered to be the most important to come from any modern composer and are sometimes referred to as the 'Sor studies of the Twentieth Century'. Formally they are through-composed, while most of his other works have a simple formal structure, the most usual being ternary (A B A). The exploit various facets of guitar technique such as rapidly played broken chords, repeated block chords or a study in three parts with the middle part moving in a type of perpetual motion as in the study No. 5:



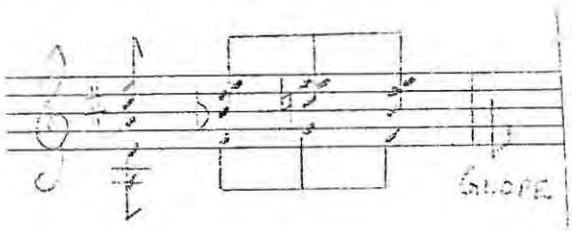
But they do not only study these and other techniques, they are also mood pieces with an emotional content.

Turning to Spain, we find that the composers there are steeped in the local folk tradition. As the guitar is

considered to be the national instrument of Spain and is particularly associated with the folk music, it is natural that the guitar compositions of the serious composers are evocative of this Spanish cultural idiom. These composers, and this applied to most of the modern composers who wrote in a tonal idiom, developed independent national musical styles. Each is an extension of the romantic musical language, i.e., still based on diatonic principles, but with added chromaticism. Because of the strong folk influence, however, the chromaticism in their writing has been subdued to a great extent.

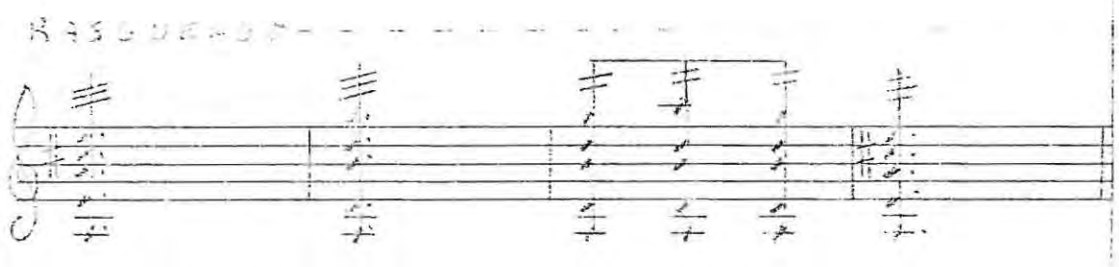
The most important of the Spanish composers are Joaquin Turina (1882-1949) who was a pupil of D'indy and is generally known as a pianist, conductor and composer in the Spanish national style, Frederico Moreno-Torroba (born 1891) who is one of Spain's leading conductors and composers, and Joaquin Rodrigo (born 1902) who, though blind from the age of three, has become one of Spain's most important contemporary composers.

Turina used traditional Spanish dance forms for some of his compositions. His "Hommage to Tarrega" consists of two dance movements, the first being a Garrotin (old Andalusian dance) and the second a Solearas (traditional flamenco dance). He also wrote a Fandanguillo. All these pieces incorporate typical flamenco rhythms, harmonies and techniques. The Garrotin uses the flamenco device of shifting a major chord up a semitone followed by a tone and then returning to the original chord:



This is, of course, a form of parallelism. The Garrotin also uses the flamenco percussion technique of tapping on the wood of the guitar as also seen in the above example.

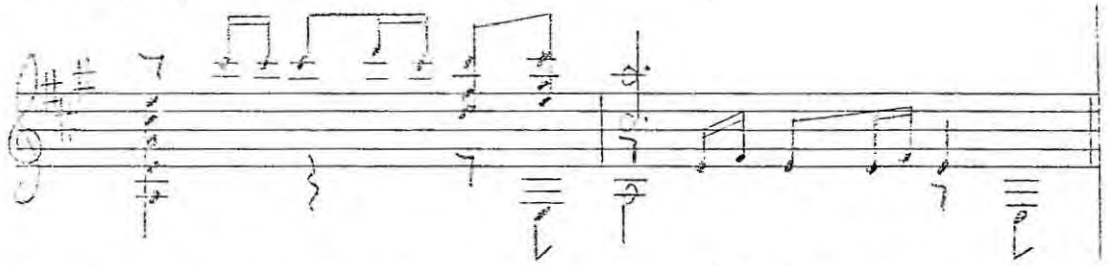
His single movement work titled "Rafaga" (the storm) uses the flamenco rasgueado technique:



The work is programmatic in that it follows the progress of the storm starting with a quiet andante section and building up to the resgueado rhythms which portray the height of the storm.

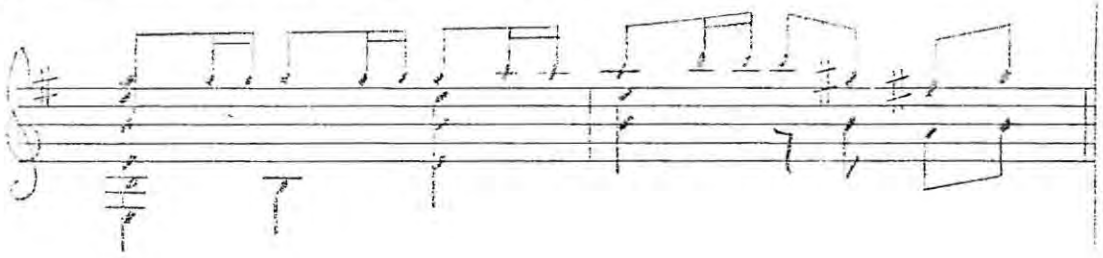
In his Sonata, the musical language is the same but the form is classical with the first movement in a sort of sonata form followed by a slow movement and then a fast movement.

Torroba's most famous work is is Sonatina in A major which is in a strict sonata form in three movements (Allegretto, Andante and Allegro). The work is full of bright Iberian rhythms as in the opening bars;



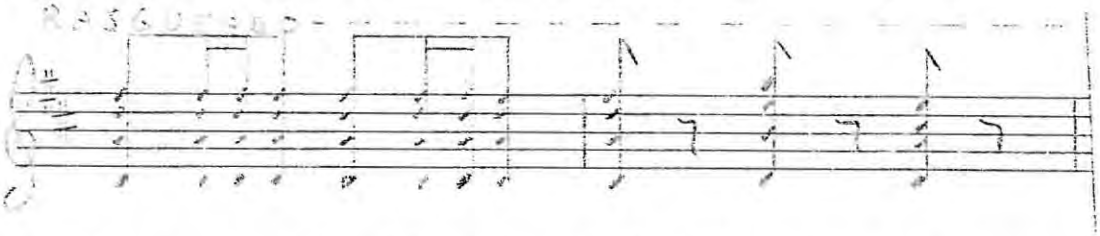
and is also very melodic, particularly in the slow movement.

He also wrote certain descriptive pieces such as his "Suite Castellana" which portrays various castles in Spain. His " Madranos " is based on a popular Spanish street cry and opens with a rhythm very similar to that on which the Sonatina first movement is based:

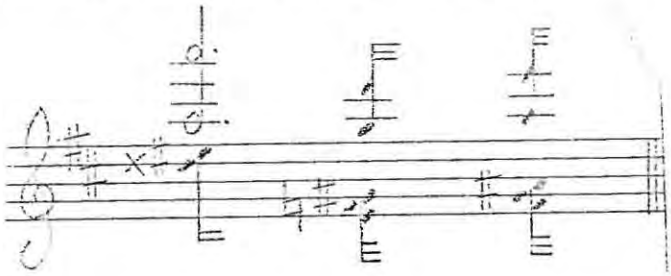


Rodrigo is undoubtedly most famous for his concertos, particularly the "Concierto De Aranjuez". The importance of this work was pretty well summed up by the musicologist J. Sopena when he wrote 'in the whole of Spanish music there is no other work which demonstrates so fully the inspiration of folk music combined with the greatest mastery of form, and which more worthily represents modern Spanish music'.

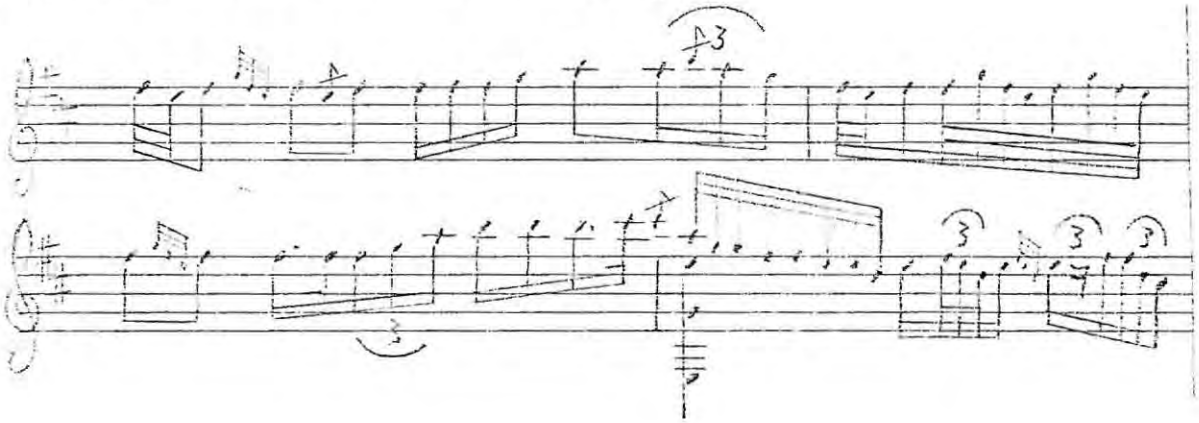
The first movement (Allegro con Spirito) is introduced by the guitar strumming a chord sequence repeatedly at higher levels which builds up to the entry of the orchestra:



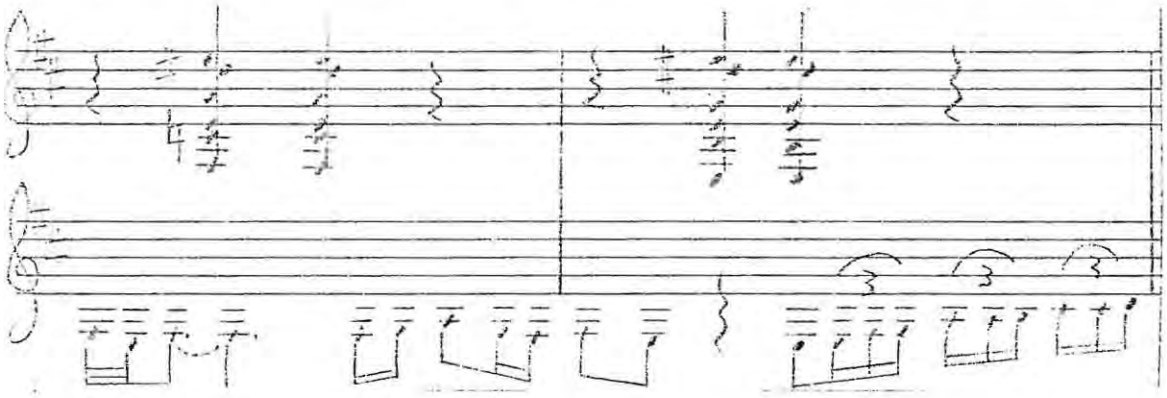
The whole movement is light hearted with the guitar and the orchestra sometimes alternating and sometimes playing together. He obtains some beautifully dissonant harmonies by writing "cluster chords" in the orchestral score:



The adagio movement is particularly moving in its lyricism and seriousness. It begins with the guitar strumming the accompaniment while the oboe states the theme. In the seventh bar the guitar takes up the theme which is in very ornamental and florid writing:

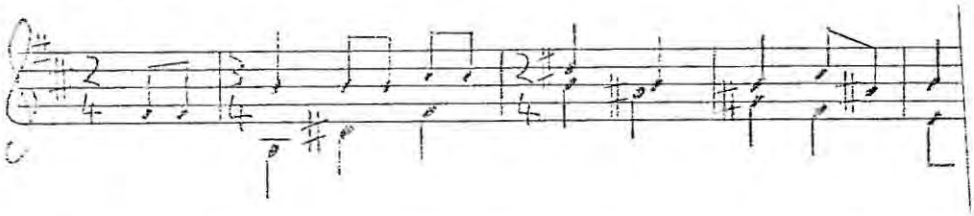


For convenience, the guitar part is sometimes written in two treble clefs. In the following example the melody line which is in the base is on the lower clef while the accompanying chords are on the upper clef.



Notice the cluster chords now being played on the guitar. The movement has a florid twenty seven bar cadenza which builds up to the last three bars which are in a very exciting resgueado technique after which the orchestra enters with the main theme in double forte producing a most thrilling effect.

The final movement (Allegro Gentile) is written in alternating duple and triple time with the guitar solo introducing the theme:



The movement, like the first, is light hearted and gay.

Another of Rodrigo's works for guitar and orchestra is his "Fantasia Para Un Gentilhombre" (fantasia for a courtier) and the courtier in question is Gaspar Sanz. Rodrigo has taken some of the better known themes by Sanz and arranged them into this fantasia in five movements. The movements are Villano Y Ricercar, Espanoleta, Fanfare De La Caballeria De Napoles, Danza De Las Hachas and Canario. Like the Aranguez concerto, this work is scored for a full size orchestra but is arranged so that in all the sections where the guitar is of importance, the orchestral part is either very subdued or completely silent.

Rodrigo's last orchestral work for guitar is his "Concierto Andaluz" which is in many way similar to the Aranjuez, except that it is scored for four guitars and orchestra.

Amongst his other works are many songs for guitar and voice on different themes, e.g., religious songs (Pastorcito Santo) and love songs (De Ronda). Many of the texts come from the poet Lope De Vega. He also wrote many guitar solos, the most important being the "Tres Piezas Espanolas" and "En Los Trigales".

Although all the guitar composers have been influenced by folk music to some extent, there is a group of composers whose style has been less influenced than the Spanish and South American composers previously mentioned and whose music is, therefore, more chromatic. The most important of this group are Castelnuovo-Tedesco and Britten.

Maria Castelnuovo-Tedesco (1895-1968) was born in Florence and studied music under I. Pizzetti in Italy where he became a leading composer. In 1949 he was forced to leave Italy for political reasons and settled in the U.S.A. He composed many works for the guitar and these show him to be a mild romantic, whose compositions are free from twentieth century "isms". He combined his response to the romantics with classical purity. Tedesco, therefore, made no particular advances in musical language over that of the composers already discussed. But what is of interest to this study are the number of different combinations for which he wrote.

His compositions include works for guitar and orchestra, e.g., the "Serenade" Op. 118, the Concerto in D major Op. 99, the Concerto in C major Op. 160 and the Concerto for two guitars and orchestra Op. 201.

His chamber music includes a guitar quintet Op. 143 for guitar and string quartet. Although the guitar had been combined with the string quartet before by such composers as Boccherini and Paganini, it had always played an accompanying

role with only the occasional solo spot. In this quintet the guitar has a position equal to the other four instruments. He also wrote an "Aria" for oboe, 'cello and guitar, his Op. 205 is a "Sonatina" for flute and guitar and his "Fantasia" Op. 145 is scored for piano and guitar.

In 1961 Tedesco met the duetists Presti and Lagoya and they inspired him to compose works for two guitars. These include the "Sonatina Cononica" Op. 196 and the "Les Guitares Bien Temperees" Op. 199 which consists of twenty four preludes and fugues for two guitars. A few years later, after Presti had died, he wrote "Fuga Elegiaca" for two guitars and dedicated it to her memory.

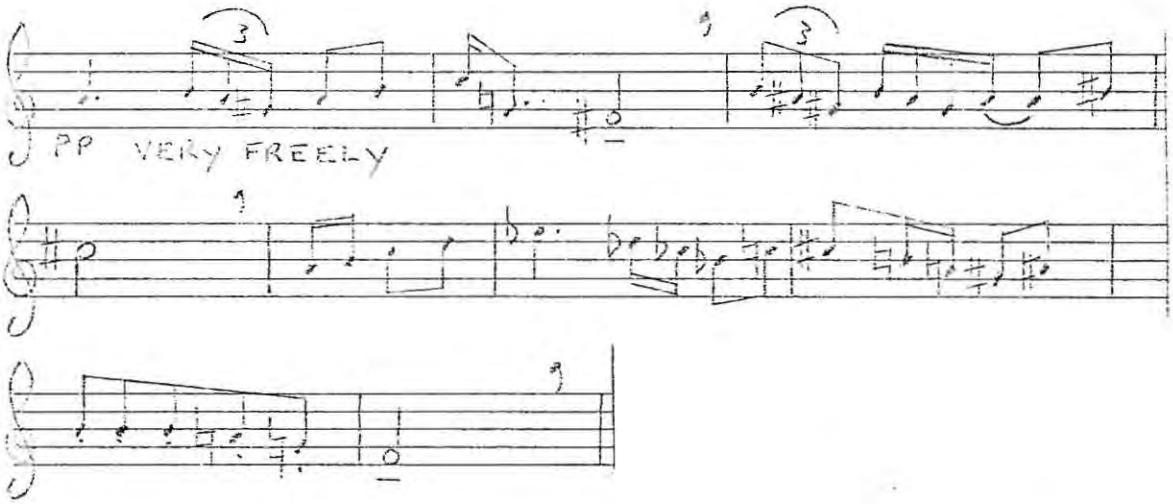
He also wrote many works for voice in combination with the guitar. One of the earliest of these was the "Romancero Gitano" Op. 151 for four voices and guitar based on a selection of poems by F. Garcia Lorca. He wrote two song cycles for solo voice and guitar. The one is the "Vogelweide" Op. 186 (for baritone) and the other is the "Divan of Moses-Ibn-Ezra" Op. 207. The work "Platero Y Yo" Op. 190 is scored for narrator and guitar and based on a poem by Juan Romon Jimenez.

Tedesco also wrote many guitar solos of which the Op. 170 collection is rather interesting. These are his "greeting card" compositions which he dedicated to well known guitarists. The thematic material for each composition was derived from the guitarists name by notating a scale in which each letter represented a note.

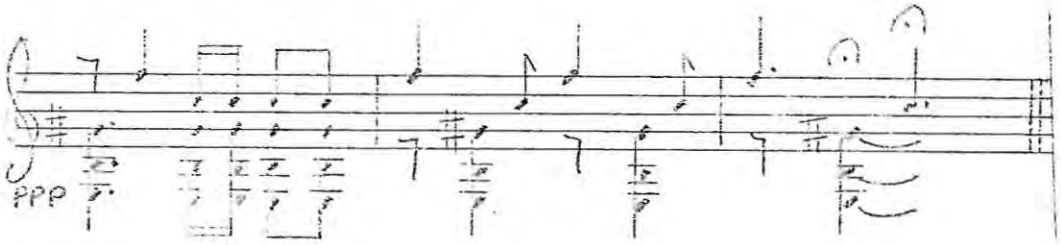
Benjamin Britten (born 1913) studied music under both Frank Bridge and John Ireland and developed a style owing little to his predecessors. He has only written a few works for the guitar but each one is a masterpiece and is particularly interesting for its advanced musical language which is characterized by vague tonalities which, in fact, often verge on atonality.

Britten's "Nocturnal" Op. 70 for solo guitar is regarded by Julian Bream as the greatest single work ever written for the guitar. It was written in 1963 and reflects the composer's preoccupation with sleep and the world of dreams. The work is based on John Dowland's song "Come heavy Sleep, the Image of True Death" and is in the form of a theme and variations. The theme is presented at the end of the work so that the variations works towards it instead of away from it. The work carries the expressive powers of the guitar to a remarkable peak and shows Britten as being a lyricist who draws his melodies from the human voice.

The Nocturnal consists of eight variations and the theme. The first variation is marked "Pensively" and opens with the following beautiful melody line:

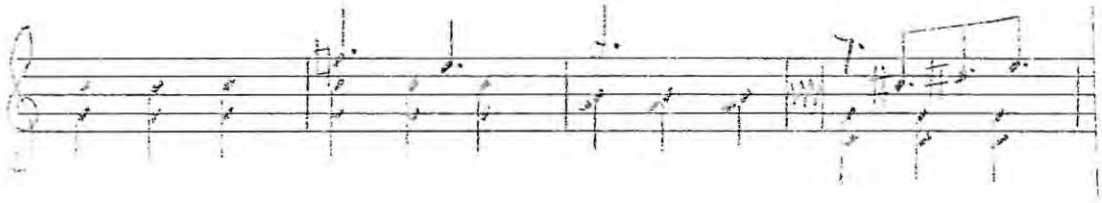


This sleepy nocturnal character persists throughout the variation even to the last chords:

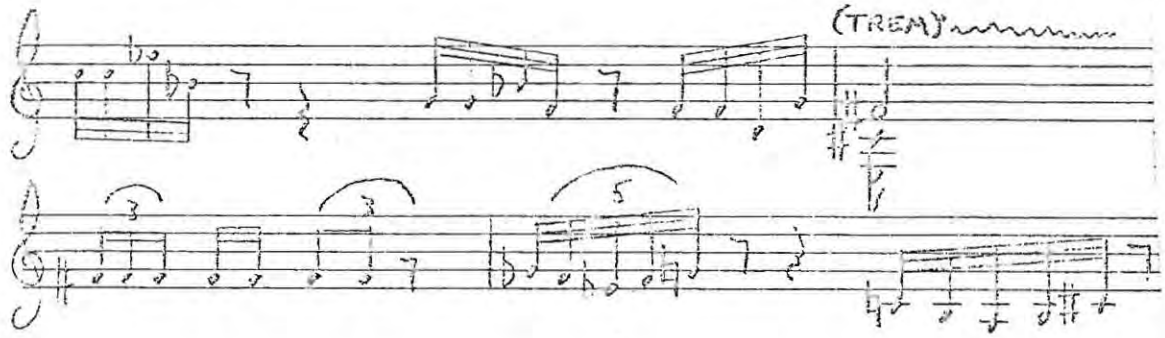


The second variation is marked "Very Agitated" and consists of a fast moving single line in triplets:

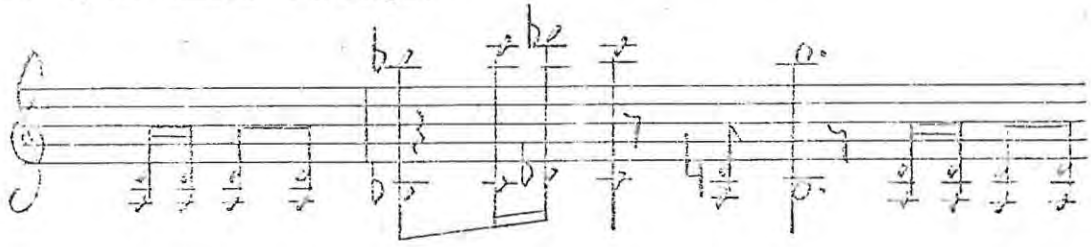
The third variation marked "Restless" has two different times superimposed, viz., duple and triple time. The part in triple time consists of repeated notes forming the accompaniment while the part in duple time is the melody line.



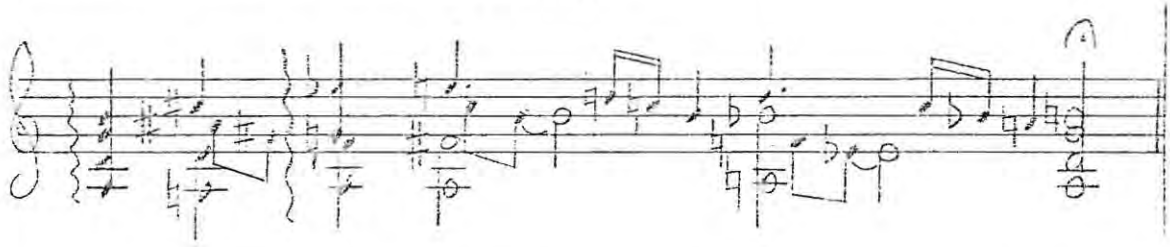
The fourth variation is "Uneasy" and is characterized by short bursts from the guitar alternating with complete silence giving the eerie effect of night.



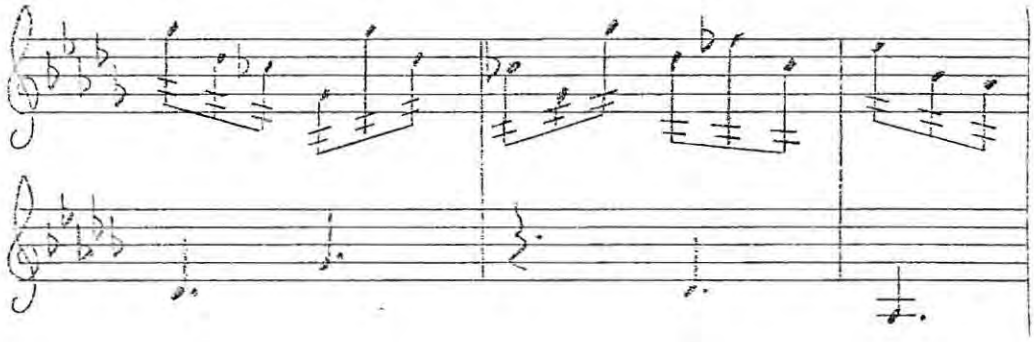
The fifth variation is marked "March-like" and consists of a melody line played in octaves (two octaves apart, i.e., on the first and sixth strings) with the accompaniment on the open inner strings:



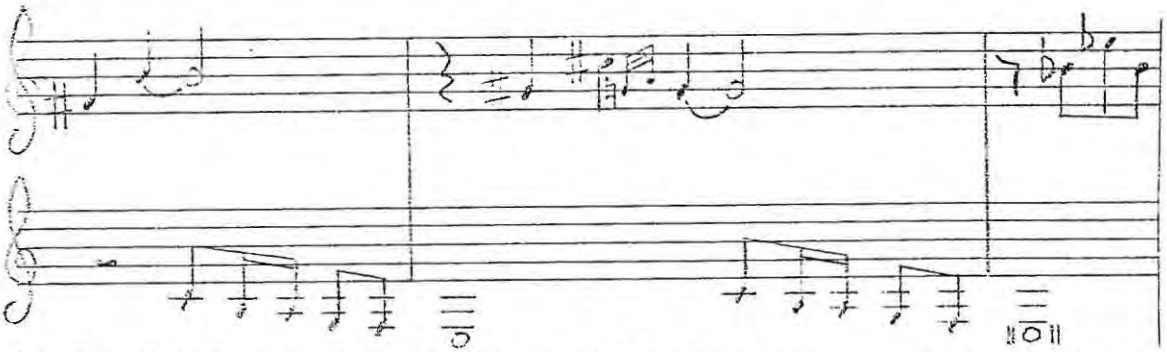
The sixth variation is again in a "dreaming" mood and is played mostly on harmonics but does contain some very expressive chord passages, e.g.:



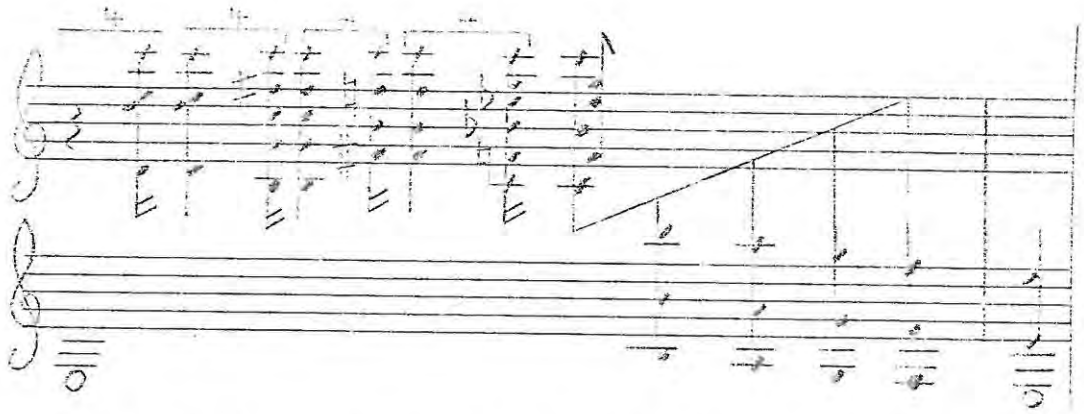
The seventh variation marked "Gently rocking" is written in two treble clefs as in the rest of the work from this point. The upper clef has the melody line played as a four note tremelo while the lower clef has the accompanying bass which is mostly on open strings:



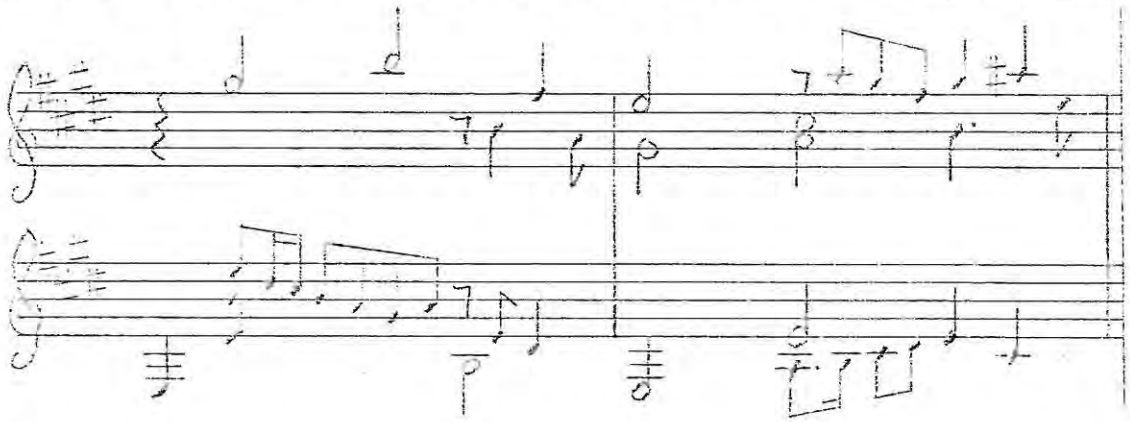
The final variation is a "Passacaglia" with the repeated bass line coming from the alto part of the original song:



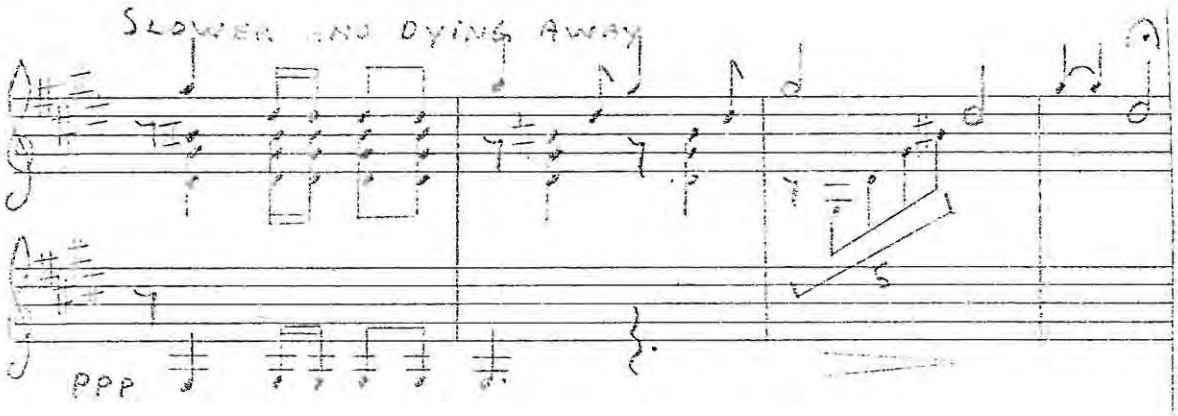
This is the longest variation and builds up to a magnificent climax with the upper clef being written in full chords and the bass line at one stage in three notes, each an octave apart:



Finally, the theme is introduced. It is marked "Slow and quiet" and is the most tonal section of the work:

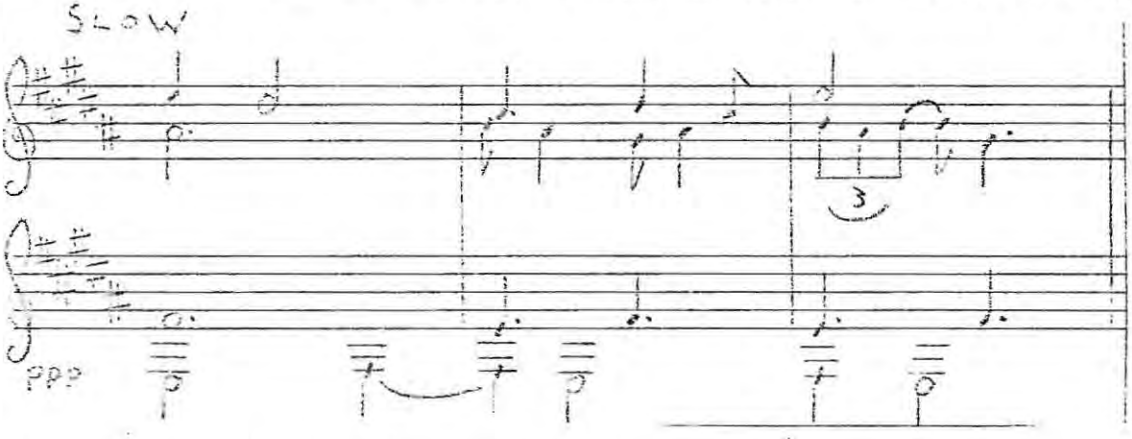


The theme ends in a most fascinating way. In the middle of the movement is a section which begins in G sharp major and eventually modulates back to E major. The work ends with what at first sounds as if it is going to be a repeat of the section starting in G sharp major, but, in fact, the music slowly dies away on the G sharp harmony as if sleep has intervened:



Britten also composed and arranged works for voice and guitar and Bream describes his Op. 58 "Songs from the Chinese" as one of the finest guitar scores he has ever seen. The work is in the form of a cycle of six songs based on Chinese texts (translated into English) that are amusing and satirical. The six songs are "The Big Chariot", The Old Lute", "The Autumn Wind", "The Herd Boy", "Depression" and "Dance Song".

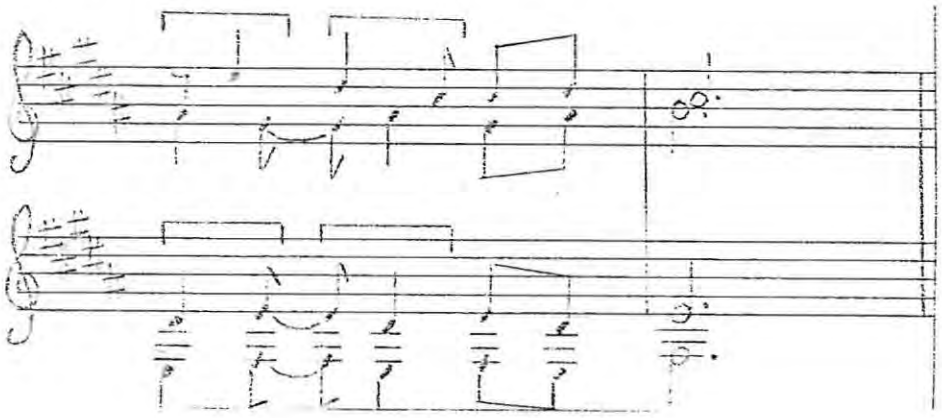
The songs have contrasting moods and the guitar plays an important part in illustrating and intensifying the meaning of the text. The melancholy introduction to "The Old Lute";



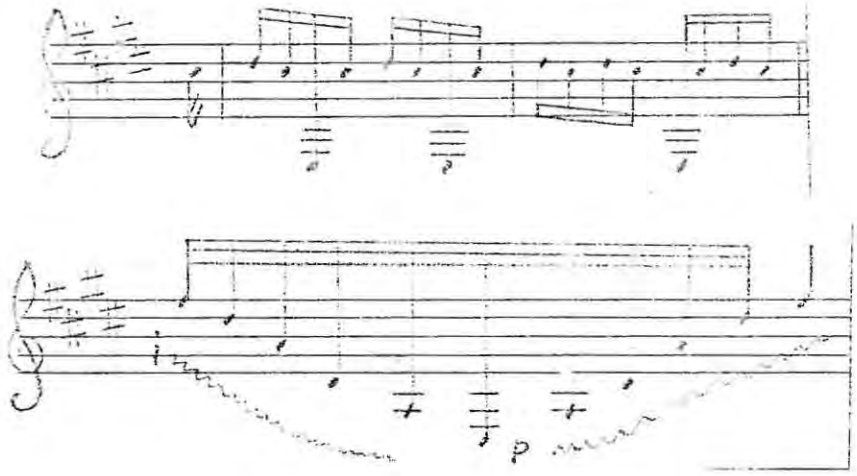
creates the mood for the text to follow:

'Light and colour are faded from the jade stops;
Dust has covered the rose red strings,
Decay and ruin came to it long ago',

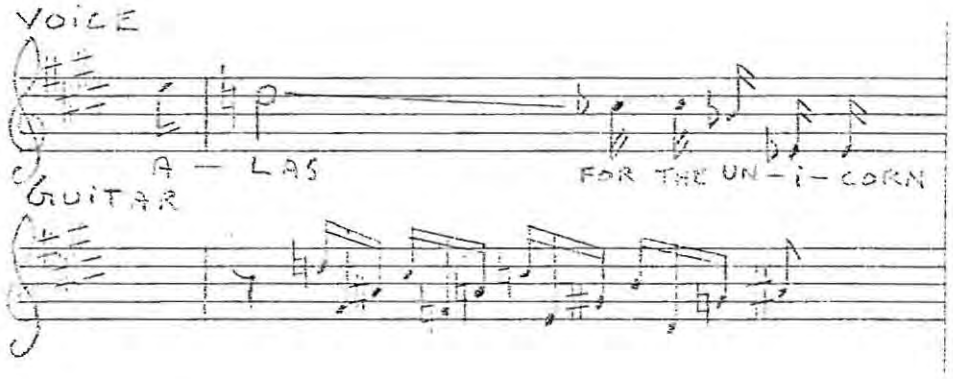
These words are accompanied by very expressive dissonant harmonies;



"The Autumn Wind" is accompanied on the guitar by a fast moving line and other effects such as harp-like arpeggios, all of which give the impression of the "autumn wind rising" and the "white clouds flying":

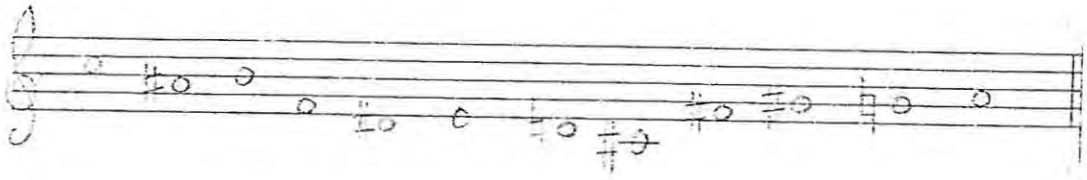


In the "Dance Song" the words "Alas for the unicorn" are accompanied by a descending glissando in the voice part and a descending accompaniment in broken chords on the guitar:

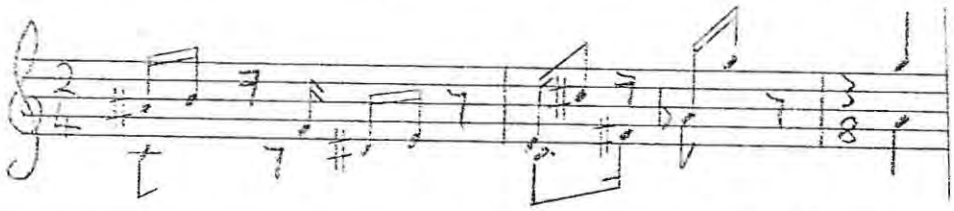


The final group of composers to be considered are those who compose in an atonal medium and use the twelve tone method of musical organization in place of the diatonic system. These composers include Ernst Krenek (born 1900), and Hans Erich Apostel (born 1901).

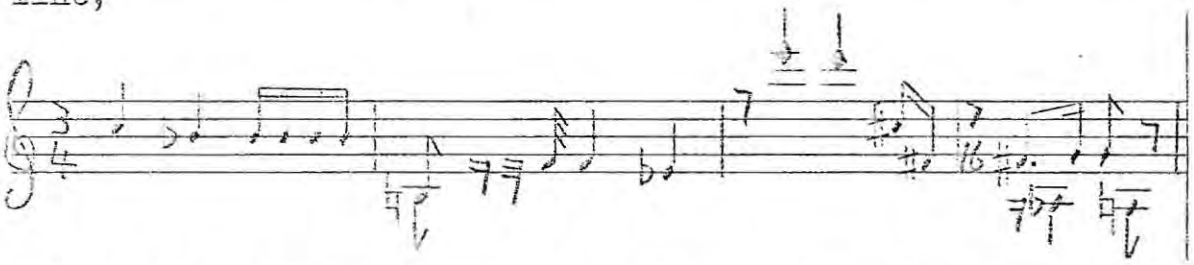
In 1857 Krenek wrote his "Suite" for guitar and this work is a good example of how the twelve tone row is used. The work is in five movements and is constructed from the following row:



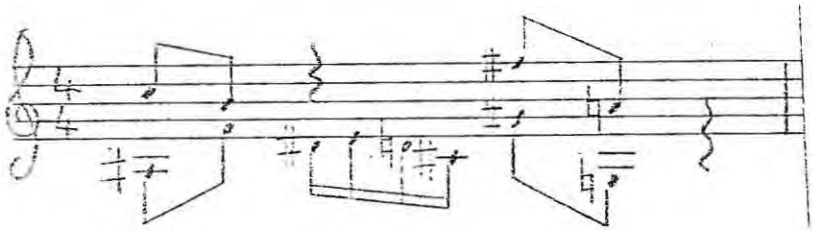
The first movement begins with the row arranged as follows:



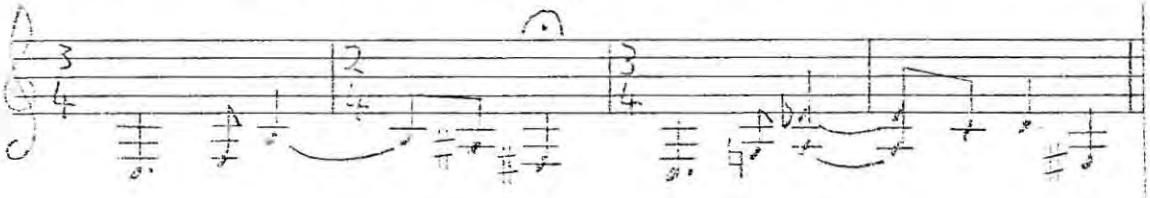
The second movement has the row more strung out in a single line;



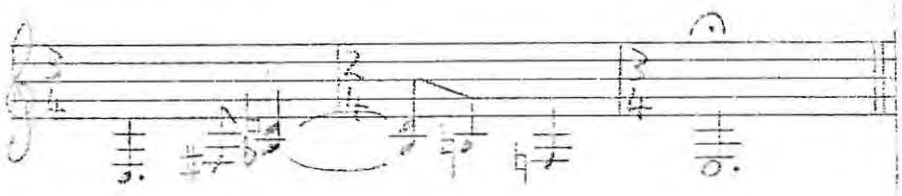
and in the third movement it is again more chordal and condensed:



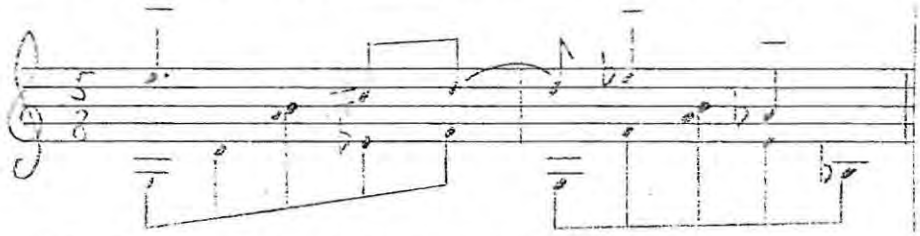
The "Sechs Musiken" Op. 25 by Apostel give us an example of the different forms that may be used. It is in six movements and each has a title which acts as a reference to the character of the movement. The first movement is titled "The Tone E". The E (sixth string open) is used as an organ point to support each phrase all through the movement:



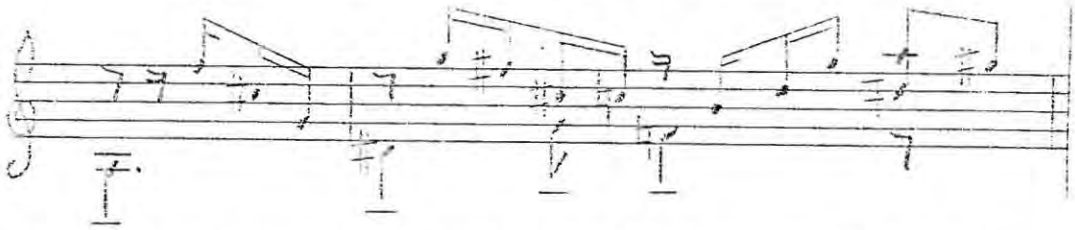
The texture of the writing thickens as it progresses and in the middle of the movement is a short cadenza. After this the formal development is in retrograde to the first section and the final bars are, therefore:



The second movement is titled "The Melody" and is in the form A B C B A. In the A section the melody is on top and all the rest is accompaniment, e.g.:



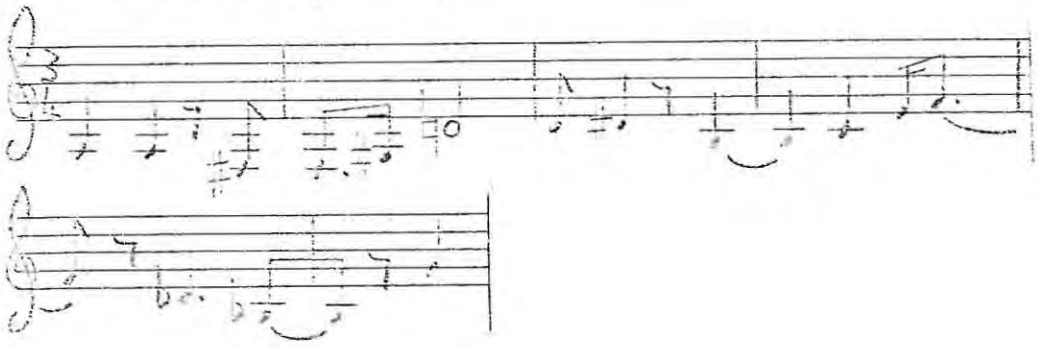
In the B section the melody is in the bass, e.g.



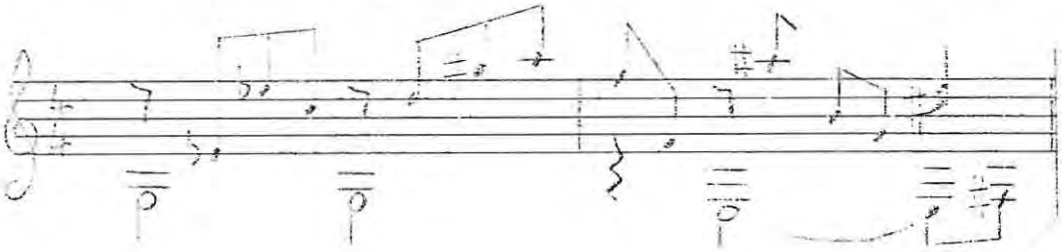
and in the C section it alternates between the two.

The third movement consists of six note chords and runs in the form A B A C A.

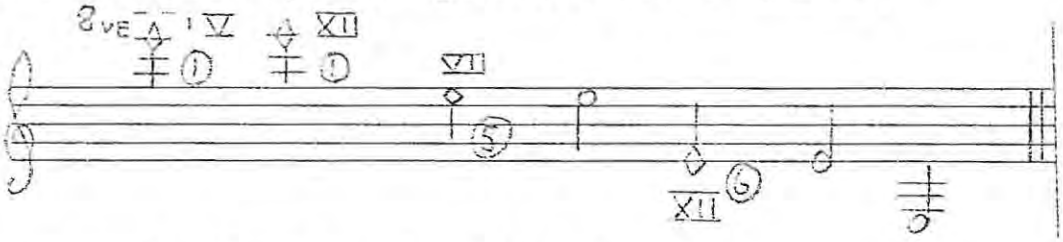
The fourth movement is in the form of a passacaglia in that it begins with the statement of the twelve tone row in a fixed rhythm form:



This line is then presented throughout the movement in different forms (at different levels and in augmentation, etc.) and the rest of the composition flows around it, e.g.:



The fifth movement is titled "Fantasia" and is free in form and thematic treatment and the final movement is again titled "The Tone E" but this time the E occurs in all the different registers possible on the guitar:



The formal scheme is A B A C A.

This new musical language is also accompanied by other attempts to break away from traditional musical style. Rhythms have become much more complex and dynamic indications have become more frequent and accurate. A greater variety of unusual effects are required from the guitarist such as sudden changes in tone colour or the "bending" of a string to obtain further pitches within the semitone, i.e. quarter-tone. Other works indicate whether a slow or fast vibrato is required. In the work "Ultima Rara" by Bussotti, the guitarist has to brush his nails along the bass strings to obtain a hissing effect and in another section he moves a hard object up and down the strings while playing them, thus getting a slide effect. Snare drum effects are produced by crossing over the two bass strings and then tapping them and composers, such as P. Tate, include the playing of tremeloes on the wood of the guitar with the right hand fingers.

The twelve tone technique will be a dominating force in music in years to come. More and more of the younger composers are working in this atonal style and many older and established composers have adopted it to varying extents. However, it is still too early to predict the lasting power of the technique as far as the more distant future is concerned.

B I B L I O G R A P H Y

1 T. Baines - Musical Instruments through the Ages, Galpin Society: Penguin Books (1961).

2 G. Bazin - A Concise History of Art. Part I, Thames and Hudson: London (1964).

3 A. Bellow - Illustrated History of the Guitar, Colombo Publishers (a division of Belwin/Mills), New York (1970).

4 H. Berlioz - Treatise on Instrumentation, Paris (1848), London (1858).

5 V. Bobri (i) - "A Gallery of Great Guitars" Guitar Review, No. 30.

(ii) - The Segovia Technique, Macmillan.

6 P.J. Bone - The Guitar and Mandolin, Schott and Co. Ltd: London (1972).

7 G. Brace - The Story of Music, Wills and Hepworth Ltd: Loughborough (1968).

8 M. Carcassi - Complete Guitar Method Part I, Schott & Co. Ltd: London.

9 G. Chase - Music of Spain, Dover Publication: New York (1959) (2nd ed.)

10 A. Mason Clarke - The Violin and Old Violin Makers, William Reeves: London.

11 N. Coste - Metode Completo para Guitara, Ricordi (1943).

12 J. Duarte - "Rationale of Guitar Duo form", Guitar Review, No. 31.

13 L. Elorriaga - "The Guitar", Guitar Review, No. 8.

14 Encyclopaedia Britannica.

15 Encyclopaedia Britannica, Extension service - The Guitar.

16 F.W. Galpin - Old English Instruments of Music, London (1910)

17 A. Gilbert - "Spanish Luthiers", Guitar Player, Vol. 7, No. 3.

18 F. Grunfeld - Art and Times of the Guitar, Macmillan Co.: London (1970).

19 D.J. Grout - A History of Western Music, J.M. Dent & Sons Ltd: London (1962).

20 P. Hamlyn - The Ancient World.

21 D. Heartz - An Elizabethan Tutor of the Guitar, Galpin Society Journal XVI (1963)

22 G. Heck (i) - The Birth of the Classical Guitar and its cultivation in Vienna reflected in the works of M. Giuliani.

(ii) - "The role of Italy in early History of Classical Guitar". Guitar Review, No. 34.

23 F. Hofmeister - Lautënmusik: J.S. Bach. T.N. 4035.

24 T. Hofmeister (i) - "Is there a School of Tarrega?" Guitar Review, No. 1.

(ii) - "Torres - The creator of the Modern Guitar", Guitar Review, No. 16.

25 R. Huyghe - Larousse Encyclopaedia of Byzantine and Medieval Art.

26 H.E. Hutting - "The Guitar Maker and his Techniques", Guitar Review.

27 A. Jacobs - A New Dictionary of Music, Penguin Books (1970).

28 K. Joffee - "Harmony in Solo Guitar Music of Heitor Villa-Lobos", Guitar Review.

29 M. Kasha - "A New Look at the History of the Classic Guitar", Guitar Review, No. 30.

30 R. Keith - "The Guitar cult in the courts of Louis XIV and Charles II", Guitar Review, No. 26.

31 G. Kinsky - History of Music in Pictures, Dover Publications Inc.: New York (1951).

32 S. Lloyd - The Art of the Ancient Near East, Thames and Hudson: London (1964).

33 C. Muller - Silvio Leopoldo Weiss", Guitar Review, No. 27.

34 T. Muller - Sculpture in the Netherlands, Germany, France and Spain 1400 - 1500.

35 A. Parrot - Sumer, Thames and Hudson: London (1960)

36 D. Poulton - John Dowland, University of California Press: Berkley & Los Angeles (1972).

37 R.C. Purcell - "Mario Castelnuovo - Tedesco and the Guitar", Guitar Review.

38 M. Prynne - "A Surviving Vihuela de Mano", Galpin Society Journal No. XVI (1963).

39 E. Pujol - The Dilemma of Timbre on the Guitar, Buenos Aires (1960).

40 Reader's Digest - "The Growth of Civilisation", Great World Atlas.

41 G. Reese (i) - Music in the Middle Ages, J.M. Dent & Sons: London (1941).

(ii) - Music in the Renaissance, J.M. Dent & Sons: London (1954).

42 C. Sachs - The rise of Music in the Ancient World, New York (1943).

43 W. Sasser - "In search of Sor", Guitar Review.

44 P. Scholes - The Concise Oxford Dictionary of Music, Oxford Univ. Press: London (1952).

45 A. Segovia - "Guitar Strings before Albert Augustine", Guitar Review, No. 17.

46 A.P. Sharpe - The Story of the Spanish Guitar, Clifford Essex Music Co. Ltd: London (1962).

47 J. Silva - "A note on the Preludes of Manuel Ponce", Guitar Review, No. 7.

48 A. Skira - Egyptian Painting.

49 I. Sloane - Classical Guitar Construction, Dutton & Co. Ltd: New York.

50 D. Stevens - A History of Song, Radius Book/Hutchinson & Co.: London (1971).

51 C.S. Terry - "Bach's Orchestra", Oxford Univ. Press: London.

52 T. Usher (i) - "The Spanish Guitar of the Nineteenth and Twentieth Centuries". Galpin Society Journal IX (1956)

(ii) - "Humour your Guitar", Guitar Review, No. 17.

(iii) - "The Elements of Technical Proficienty", Guitar Review, No. 15.

(iv) - "Tone and Tonal Variety", Guitar Review, No. 16.

53 J. Wolf - Handbuch der Notationskunde, Vol. I (1913) and Vol.II (1919)

54 G. Wade - Historical Perspective of the Guitar Duo, Guitar Review, No. 31.

M U S I C A L R E F E R E N C E S (PART III)

C H A P T E R I

1. J. Dowland: (i) International Anthology,
Colombo Publications (1969).

(ii) 18 Lieder,
Musikverlag Hans Sikorski No. 558,
Hamburg (1968)

(iii) Air and Gigue,
Universal Edition No. 12669 (1957).

(iv) "Lachrimae Antiquae Pavan",
Ricordi Americana, Buenos Aires.

(v) 2 Galliards,
Universal Edition No. 12247 (1954).

(vi) Melancholy Galliard and Allemande,
Universal Edition No. 12472 (1956).

(vii) Air and Galliard,
Universal Edition No. 12402 (1955).

(viii) Seven Pieces,
Schott & Co. Ltd., London.
Guitar Archives (1963).

2. M. de Fuenllana: (i) International Anthology,
Colombo Publications (1969).

(ii) 2 Songs,
"De Antequera sale",
" Duelete De Mi", No. 20029-4 .

3. Luis de Milan: (i) International Anthology,
Colombo Publications (1969)

(ii) Hispanae Citharae Ars Viva,
B. Schott's Söhne, Mainz,
Guitarren-Archiv 176.

(iii) 3 Pavane,
Editions Max Eschig, Paris (1960).

(iv) Song, "Toda mi Vida",
Editions Max Eschig, Paris (1955).

(v) Song, "Con Pavor Recordo",
Union Musical Española, Madrid
(1958).

(vi) Song, "Durandarte", H.S. 200/8.

4. A. Mudarra: (i) Hispanae Citharae Ars Viva,
B. Schott's Söhne, Mainz,
Gitarren Archiv 176.

(ii) Fantasia II, Harmonia-Uitgave,
Hilversum (1970).

(iii) "Romanesca", Schott & Co., London.
Guitar Archives 159 (1939).

(iv) Song, "Triste Estaba El Roy David",
Union Musical Española, Madrid (1958).

(v) Song, "Claros y Fresco Rios",
Union Musical Española, Madrid (1965).

5. L. de Narváez: (i) Hispanae Citharae Ars Viva,
B. Schott's Söhne, Mainz.
Gitarren-Archiv 176.

(ii) Song, "Mille Regretz",
Union Musical Española (1970).

6. D. Pisador: (i) Hispanae Citharae Ars Viva,
B. Schott's Söhne, Mainz.
Gitarren-Archiv 176.

(ii) Song, "De los Alamos",
Union Musical Española (1965).

(iii) Song, "La Mañana",
Union Musical Española (1958).

7. E. Valderrabano: (i) International Anthology,
Colombo Publications (1969).

(ii) Hispanae Citharae Ars Viva,
B. Schott's Söhne, Mainz,
Gitarren-Archiv 176.

(iii) Song, "Donde son Estas",
Union Musical Española, Madrid,
(1965).

(iv) Songs - "Ay di Mi" and
"Ya Cabalaga Calanos",
Union Musical Espagnola,
Madrid (1958).

(v) Sonatas XV and XX,
Editions Max Eschig, Paris (1968).

C H A P T E R II

1. J.S. Bach: Lautenmusik - J.S. Bach,
Verlag F. Hofmeister, Hofheim am Taunus,
F.H. 4035.

2. F. Corbetta: Renaissance and Baroque,
Colombo, New York.

3. R. de Visée: (i) International Anthology,
Colombo Publications, New York (1969).

(ii) Suite in D. Minor,
Universal Edition No. 11322,
Wien (1944).

4. G. Sanz: (i) "Tournoi et Bataille",
Edition Max Eschig, Paris.

(ii) "Canarios",
Edition Max Eschig, Paris (1955).

(iii) "Gallardas and Pavanas", Les Guitaristes Espagnols du XVIIe siècle, No. 1004 (1923).

(iv) "Pasacalle",
Edition Max Eschig, Paris (1955).

(v) Clarions Royaux, Clarions et Trompettes, La cavalerie de Naples.

(vi) "Espanoleta",
Edition Max Eschig No. 1049.

C H A P T E R III

1. A. Diabelli: 3 Sonatas,
Schott & Co. Ltd, London. G.A. 57.

2. M. Giuliani: Sonata Op. 15,
Universal Edition No. 11320 (1943).

3. F. Sor: (i) Duo for two Guitars, Op. 34,
Osterreichischer Bundesverlag, Wien (1958).

(ii) 19 Composiciones,
Ricordi, Buenos Aires.

(iii) Variations on "O Cara armonia" by Mozart,
Schott & Co. Ltd, London.
Guitar Archives 130.

C H A P T E R IV

1. M.E. Apostel: Sechs Musiken,
Universal Edition 13605.

2. B. Britten: (i) "Nocturnal", Op. 70,
Faber Music Limited, London (1965).

(ii) Six Songs,
Boosey & Co. Ltd., London (1959).

3. M. Castelnuovo-Tedesco: (i) Quintette,
B. Schott's Söhne, Mainz.
G.A. 198 (1959).

(ii) Concerto in D,
Schott & Co. Ltd, London.
(1954).

(iii) "Platero Y Yo",
Edizioni Musicali, Bèrben,
Ancona (1972).

(iv) "Concerto sereno" in Do,
B. Schott's Söhne, Mainz,
G.A. 240 (1968).

(v) "Serenade", B. Schott's Söhne, Mainz. G.A. 167 (1956)

4. E. Krenek: Suite für Gitarre allein,
Verlag Doblinger, München (1961).

5. M. Llobet: Folk Arrangements,
Union Musical Española, Madrid (1964).

6. M. Ponce: (i) Suite in La Maggiore,
Edizioni Berben, Ancona (1964).

(ii) Sonata Romántica,
Schott & Co. Ltd., London. G.A. 123,
(1929).

(iii) Sonata clásica,
Schott & Co. Ltd., London.
G.A. 122 (1929).

(iv) Valse,
B. Schott's Söhne, Mainz.
G.A. 153 (1937).

7. E. Pujol: (i) "Tonadilla",
Editions Max Eschig, Paris (1929).

(ii) "Troisième Triquilandia",
Editions Max Eschig, Paris,(1965).

(iii) "El Abejorro",
Ricordi Americana, Buenos Aires.

8. J. Rodrigo: (i) "Fantasia Para un Gentilhombre" for
Guitar and Orchestra, Schott & Co.
Ltd., London. G.A. 208.

(ii) "Concierto de Aranjuez", Madrid (1959).

9. F. Tarrega: Tarrega Album,
Musikverlag V. Hlady, Wien (1960).

10. F.M. Torroba: Sonatina,
Ricordi Americana, Buenos Aires.

11. J. Turina: (i) "Hommage à Tarrega",
B. Schott's Söhne, Mainz (1963).

(ii) "Ráfaga",
B. Schott's Söhne, Mainz.
G.A. 123 (1958).

12. H. Villa-Lobos: (i) "Bachianas Brasileiras No. 5",
Associated Music Publishers Inc.,
New York (1954).

(ii) "Preludes" Nos 1 - 5,
Editions Max Eschig, Paris (1954).

(iii) "Suite Populaire Bresilienne",
Editions Max Eschig, Paris (1955).

(iv) Douze Etudes
Editions Max Eschig, Paris (1953).