Julius Kosleck's
School for the Trumpet

Revised and adapted to the study
of the Trumpet- à-pistons in F. as used in the orchestras
of England and America.

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PREFACE TO THE ORIGINAL WORK

Along and earnest study of an instrument, essential in the Orchestra, diverse in its use and employment, and now much neglected compared with former days, prompts me to place my experiences on record in this cornet and trumpet School, parts of which may and can be used for all the wind instruments. Many may consider it a risky proceeding to have striven to amalgamate the cornet and trumpet in one primer. I will however try to prove that, because both instruments were originally one and the same, it is only in some smaller details that they have acquired a double character later on, a difference which has now again almost disappeared. I have been fortunate in discovering an ancient work by Altenburg ("Essai on the Heroical Musical Art of the Trumpet and Timpani") (1795) which contains a good deal of information about the use of the trumpet by our ancestors, and I think it worth while to review it in this preface. It will elucidate many dark points for the musical student in reference to this instrument.

The trumpet is one of the most ancient instruments mentioned in history. Its invention is lost in the mist of Time and nobody can say which of the primeval nations used it first. We know however that the Egyptians used brass instruments in a twofold capacity. The trumpet was a sacred instrument which the priests alone were allowed to play at the religious services. This limited use of the trumpet to one "Caste" only caused similar instruments to be invented for the use of the people; instruments which everybody was allowed to play and which were capable of replacing the trumpet as far as possible. One can therefore take this for certain that in those days other brass instruments (Horns, Trombones etc.) were made. These ought to be considered as having been derived from the trumpet. It is well known that all brass instruments have this peculiarity in common with the trumpet: they can only produce natural or open notes, which means the tones which can be produced without the aid of valves.

We find trumpet playing highly developed and very common among the Greeks. History records the names of prominent trumpet players amongst the Victors in the Olympic Games. The trumpet with its bright tone, was considered indispensable at the festivities of ancient Greece and its fanfares gave the men courage in the heat of battle.

The trumpet became known in Germany during the Middle-Ages; the trumpeter was a feature at the tournaments of the nobility and it was reserved for the German trumpeters to attain such executive skill as to be even invited to Court functions. They were in great request at popular rejoicings no less than on the occasions of Imperial pomp and circumstance.

The general development of the Guild system in Germany of those days made it no more then a matter of course that the trumpeters should have their own Guild. The privileges, granted by Emperor Sigismund in 1430 were no small incentive to the growing prosperity of the "Güla of Trumpeters": Nobody but Members of the Guild were allowed to play the instrument and the way in which they gained proficiency was kept a profound secret by them. The appended apprentice's indenture of the "Güla of Trumpeters" may prove interesting.

When we have noticed that they had two ways of trumpet blowing there remains still a good deal left which is unexplained. They made a distinction between the "Principal or Military" style and the "Clarin or Solo" manner of playing. A warlike shrill "Herald" trumpet was used for military purposes and a more soft-toned instrument was employed to accompany the Singing of Church music in the Middle-Ages.

The decline of the "Güla of Trumpeters" coincided with the more general use of the trumpet, but the Guild kept its secret as regard how to play softly in conjunction with the voice.

We are filled with amazement at the skill of the trumpeters in the days of Bach and Handel as exemplified by the trumpet parts in those masters' works. We cannot explain how it was possible for them to overcome the enormous difficulties of those parts with their primitive and valveless instruments.

We often ask ourselves why our great composers Haydn, Mozart and Beethoven did not write for the trumpet in the same way as Bach and Handel. The only reason we can find is that in Haydn, Mozart and Beethoven's time the ancient Art of trumpet playing had been lost; "Clarin" playing had become extinct. It thus happened that they wrote for the trumpet in its one sided martial-dramatic character only and the lyrical treatment of this instrument became more and more a thing of the past.

For us the task is to emphasize again this double way of treating the trumpet and to improve upon the old methods if possible.

When we recollect that the inherent defects of the trumpet as an instrument, with which our forefathers had to contend, have now been removed by the invention of valves, there is no reason why we should not do better now than in former times.

However, several conditions will have to be fulfilled before we can hope to attain this end. In the first place we must find out the secret, lost through the breaking up of the Guilds, of playing brass instruments, as they used to do.

This secret amounts to this: "an artistic perception of the inner affinity which exists between blowing and singing."
APPRENTICE'S INDENTURE OF THE KNIGHTLY GUILD OF TRUMPETERS.

His Royal Majesty of Poland and Elector of Saxony, &c for the time being, declares herewith to Field-Trumpeter N.N. and on the strength of this indenture to all who may read or hear, that the bearer: N.N. born in so and so in Saxony has prayed and requested me to become an apprentice to the noble Knightly Guild of Trumpeters, paying — as is customary — 50 Thalers. I have not refused this, but have rather adopted and incorporated him in the presence of honorable comrades on June 25th 1714 for two years — according to trumpeters customs — to be taught the noble art as far as God may grant us grace so to do, and as it behoves an honourable youth to learn. That besides me, the other comrades should give him lawful pleasure and secure his well being. That I have been fully and duly paid the promised "articles" of one hundred Thalers, and having proposed him on the strength of a declaration of the honorable Field-trumpeter and Army Drummer, have decreed, after hearing him play his learned Field-pieces — according to Trumpeter custom — that he shall be acknowledged and passed as an honorable Trumpeter wherever Knightly Free-Art is practised. However with the following proviso and interdiction: that he shall not from this day onwards adopt or teach another youth until after seven years and before he has accomplished and completed his three campaigns: and that he shall also abstain from playing pieces not belonging to the Noble Art. After having faithfully promised to me and to the whole comradeship to hold all this steadfastly and sacredly I now command all and sundry, high and low, according to their social rank to give N.N. their respect and homage. This I again desire from every body according to his social status so that this, my indenture should have all the more force. I have therefore (as a tax to Truth) signed this warrant with my own hand and mark of bona fide scat next to those of the comrades.

Thus given in camp near Warsaw June 25th 1716

HERE FOLLOW THE SIGNATURES.

PREFACE TO THE EDITION PUBLISHED FOR ENGLISH STUDENTS

The object of this treatise is, to supply a good practise book for the Trumpet in F, as now used in the orchestras in England and America. The work originally written by Herr Julius Kosteck of Berlin being eminently suited to the purpose, has by request, been revised and a few additions made by the revisor, who has however kept as closely as possible to the original plan of the work.

It is hoped that this book will encourage the study of the real Trumpet, as distinct from the Cornet à pistons, which frequently replaces the Trumpet; but as regards beauty of tone, inadequately. Small Trumpets in B♭ are also frequently used. These however are no better, if so good as the Cornet in tone; but as they are made to look long, they are often mistaken for the real thing.

A student will find the trumpet in F a very interesting instrument: and once he gains proficiency will discard the Trumpets in B♭. He must not be discouraged at the beginning by the apparent difficulty of the Trumpet; study and practise will amply repay him for his work.

This work will also be of use to Cornet players who desire to study the transposition of Trumpet parts; and it is also hoped, encourage them to adopt the real Trumpet for orchestral work.
ORIGIN AND DESCRIPTION OF THE TRUMPET.

Trumpets seem to have been originated by someone discovering that sound could be produced by blowing into the opened end of the horns of animals, spiral shells, or hollow reeds, and on the use of metals being known trumpets of silver, copper, and brass were made in the form of horns and spiral shells. The chatotzeroth of the Hebrews and the Egyptians was a straight conical tube; the salpinx of the Greeks likewise. The schophar and leren of the Hebrews were horn-shaped, and the buccina of the Romans was made after the fashion of a spiral shell. Judging from the conical shape of these instruments one naturally comes to the conclusion that they were not musical. They would emit only one sound—a terrific blare—which was of no doubt useful for giving signals, calling an assembly, or striking terror in the heart of an enemy, &c., but there was no music.

It would take a very long time to refer to the many shapes in which these instruments from time to time came to be made and the different materials used in their manufacture; but as the object of this paper is to treat of the trumpet as an orchestral instrument I will ask the reader to take a long skip over many centuries.

In the sixteenth century the trumpet had increased in length to eight feet, experimentalists having found that by lengthening their metal tubes, also by making the body of the instrument cylindrical instead of conical, they rendered it capable of producing some musical sounds as distinguished from mere noise. It was made up as follows: A mouthpiece, a cylindrical tube, about three-eighths of an inch in diameter, with two bends, thus forming three lengths placed triangularly, the latter fifteen inches gradually widening to a diameter of four inches in the shape of a bell. It was capable of producing the following scale or series of harmonics:

\[
\begin{array}{ccccccccc}
1 & 2 & 3 & 4 & 5 & 6 & 7 & 8 & 9 \\
10 & 11 & 12 & 13 & 14 & 15 & 16 & 17 & 18
\end{array}
\]

It is technically called a scale, although it is not a "regular succession of notes proceeding by tones and semitones."

The first is called the "generator" and is produced by blowing with very loose lips into the instrument sufficient wind to fill the whole tube. A very large mouthpiece is required to produce this note, much larger than is generally used, and a player would be unable to ascend to the higher notes with such a mouthpiece. The note exists but it is never used. By compressing the lips a little so that the column of air only reaches half-way through the instrument the octave will be produced, by more pressure the third harmonic or fifth above the second C, and so on by increasing the pressure all these natural sounds can be emitted. Nothing has been written higher than the eighteenth, although it is possible to go beyond. These harmonics are not all correct in intonation—the seventh is flat, the eleventh is sharp, and the thirteenth flat.

In spite of the imperfections of these notes, they were freely written by the old masters, and played by the trumpeters of the time. The latter, with highly practiced lips, could manipulate the faulty notes and make them fairly tolerable. Though all these notes exist, they are not all available for one player. To produce the lower notes a large mouthpiece is necessary; for the middle notes, one a little shallower; and for the high notes, one shallower still. Consequently the old players were arranged thus: First trumpet, second trumpet, and third or principal trumpet, the last often playing an independent part; and in an old instruction book for the trumpet, by a German named Wirth, mouthpieces of different sizes are prescribed for the different parts to be played.

It was about the year 1607 that trumpets were first used in orchestras, and from that time trumpet playing reached a high point of excellence—in Germany particularly—a guild of trumpet players being established there, who preserved as secrets their methods of manipulation. From this guild, doubtless, sprang the fine players who were able to execute the difficult tasks set down for them in the works of John Sebastian Bach.

Judging from the trumpet parts written by Purcell, Handel, and Bach, the key of D seems to have been the key that trumpets were made in; and the higher harmonics, from the eighth to the eighteenth, seem to have been much admired, both on account of their brilliancy of tone and because they proceed by consecutive tones, enabling the players to execute florid passages. This can be seen by examining the score of Bach's Mass in B minor, in which scale-passages and trills abound.

To modern musicians, accustomed to correct intonation, without taking into consideration the enormous difficulty of these parts, it seems incredible that they were ever played on trumpets; in fact, many still refuse to believe it. Others, convinced that they were played, say: "then the art of trumpet playing is lost." I believe that they were rendered on the plain D trumpet, with all the imperfections of intonation, and that the art is not lost, but the style has fallen into disuse on account of the difficulty and uncertainty of manipulating these high notes. Then we have it as a fact in history that the high trumpet part in Purcell's Te Deum was rendered by an artist named Shaw, who, Dr.
Bridge informs me, was a friend of Purcell's. Then there is a record of another phenomenal player named Valentine Snow, for whom Handel wrote special parts. He was the first to interpret the well-known obbligato to "Let the bright seraphim" and "The trumpet shall sound."

THE SLIDE TRUMPET.

During the latter half of the eighteenth century, great changes in making trumpets took place. Composers wished to use trumpets in keys other than C and D, consequently shorter instruments were made, generally about sixty-seven inches in length, giving the harmonics in the key of F. In France they were and are made shorter still, to produce the harmonics of G. But if a trumpet is shorter than sixty-seven inches it loses its distinctive quality of tone. Then there were additional tubes called crooks, because of their shape, enabling the performer to put his trumpet in E, E flat, D and C, and by combining crooks in B, B flat, and A. These three, however, were very unsatisfactory.

A change also took place in the manner of writing trumpet parts about this time: the use of the harmonics above the twelfth being abandoned, doubtless on account of their practical difficulty and faulty intonation; and if one examines the scores of Haydn, Mozart, and Beethoven harmonics above the twelfth will seldom, if ever, be found. Composers seem to have admired the middle notes, probably on account of the fulness and grandeur of tone, as well as the more facile practicability of this part of the instrument. Since then it would appear that players of the old hard parts could not be found. To improve the tone of the middle and lower register larger mouthpieces were used, which rendered the high notes extremely difficult; therefore if any of the old works were performed the trumpet parts had to be re-written or modified. Mozart modified the part in Handel's "Messiah," Mendelssohn re-wrote the trumpet part of the "Dettingen Te Deum," and Franz did the same with many of Bach's works—the "Christmas" Oratorio and Bach's "Magnificat" particularly. Then I have taken part in performances when the first trumpet part has been played on C clarinets, producing a very curious effect, the second trumpet part, played on a trumpet proper, being very prominent, the first and higher being completely lost. We have said that the eleventh and thirteenth harmonics were very incorrect. In consequence of this players began to look round for a means of remedying these faults, and towards the end of the eighteenth century an Englishman named John Hyde conceived the idea of adding a slide to the trumpet after the manner of the trombone slide, the only difference being that it was placed at the second bend of the tubing instead of the first. This slide, when drawn out two inches and a half, of course adds five inches to the length of the tube, and its effect is to lower all the harmonics a semitone, and by drawing it out its full length a whole tone; so now we have the harmonics tripled, with one exception. There is not sufficient length of slide to lower the sixth harmonic a whole tone; this is a pity, because being so intolerably sharp it renders so many passages unplayable. It could, however, be used as E sharp in a passage like this:—

The slide enabled players to perfect the eleventh and thirteenth harmonics. This is the scale:

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\[\text{music notation}\]
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This is the instrument used for so many years, and with so much admired effect by the two Messrs. Thomas Harper, father and son. Their rendering of the obbligato in Handel's works is something to be remembered, the younger especially.

THE VALVE TRUMPET

[Also called Ventil Trumpet, Trompette-à-pistons, or Trompette-à-cylindres.]

About the year 1814 the piston, as applied to brass instruments, was invented by a Silesian named Bluhmel; and a contemporary Saxon, named Stölzel, invented the cylinder. The piston has a vertical, the cylinder a rotary action. The results, however, are the same; both add tubing to the trumpet. There are usually three pistons or cylinders attached to an instrument. The middle one on being pressed down opens an extra tube about five inches long, which lowers all the harmonics a semitone in exactly the same manner that the slide of the older trumpet does. The piston nearest to the mouthpiece opens a tube about ten inches and lowers the harmonics a whole tone. The third opens a longer tube and lowers them a minor third. Then by pressing two or three pistons down at one time as occasion requires each harmonic is lowered six semitones, corresponding with the six shifts of the trombone. We now have a complete chromatic scale of two octaves and a fifth, and any passage within a given compass is practicable.

The valve trumpet was generally adopted in Germany, but not in England; the tone of the slide trumpet being considered superior. This idea is perfectly true, the many unavoidable acute angles in the valve trumpet causing the tone to deteriorate, but not much, and when we come to consider the advantages gained, of correct intonation and the chromatic scale being available, it is difficult to understand why this instrument was not adopted here, especially as composers, no longer tied down to the use of natural harmonics only, have written parts for this instrument.

THE CORNET-À-PISTONS.

About the year 1832 a new sort of trumpet appeared under various names—e.g., the small stop trumpet, cornopean, or cornet-à-pistons. This is a small trumpet about fifty-four inches in length, giving the natural harmonics of B flat, with three pistons having the same power of lowering these harmonics six semitones, as in the case of the valve trumpet already mentioned.

The cornet has an agreeable tone and is comparatively easy to manipulate. It very quickly became popular, and its popularity has not declined; on the contrary, it has caused the trumpet proper to become almost obsolete.
Students perceived that showy results were easy of attainment and forsook the study of the trumpet. Experienced players of the older instrument, when they were called upon to play parts written for the valve trumpet, instead of adapting themselves to the valve trumpet resorted to the cornet. Consequently, the cornet has crushed the trumpet out of the orchestra altogether. One rarely hears the sound of a real trumpet now.

I am often asked by persons seeking information, what is the difference between the trumpet and cornet, and why do you so strongly maintain that it should be used? So-and-so plays on the cornet and produces a good trumpet tone.

My answers to these questions are: First, the difference between the two is in point of length. A tube a given length has a characteristic tone. The tones of the C, D, E flat, and F trumpets are rich and full. Above the key of F a tube loses its distinctive trumpet character, therefore when the tube is shortened to B flat the tone has been left far behind.

My answer to the second part of the question is obvious. Every player of an instrument likes to produce a good tone, and if the tone of the trumpet is superior, then he should play that instrument and not use one of an inferior quality of tone.

The assertion that the cornet can be played with a trumpet tone is good, and remains good until the two are heard at the same time, and under equal conditions, then, I think, the comparison will be in favour of the trumpet.

Most of the good cornet players I have known during the last thirty years, having arrived at proficiency on that instrument, have at some time or other "taken to the trumpet," thinking that their already acquired ability in cornet playing would make trumpet playing comparatively easy; but after a very short trial, usually about two months, they have abandoned it as too difficult, or because they have not sufficient time to study. It is a pity that they exercise so little patience and perseverance. A man who calls himself a trumpet player should endeavour to master the whole subject of trumpets, and not be satisfied with a little tawdry popularity by playing weak cornet solos. There is much excuse for men who are very busy and really have not time to study a new instrument, but young students should make themselves acquainted with the trumpet before they get too busy, and fit themselves to fulfil the duties of a trumpet player when called upon.

There is an idea prevalent that practising the trumpet has an injurious effect on the lip for cornet playing; this is fallacious—it will improve the lip, as well as the ear and intellect. A good trumpet player can always be a good cornet player; a good cornet player cannot play the trumpet without much practice. My advice to students is to practise the latter assiduously, it will be to their ultimate benefit.

There is one thing I would advise them to guard against, it is this: some cornet players have tried to play the trumpet and for certain reasons have given it up. Feeding some qualms of conscience that the cornet does not look well in a symphony orchestra, or in the performance of an oratorio, they have adopted what is called a "trumpetina"—a sweet name. This is an instrument of the exact dimensions of a cornet—that is to say, a tube fifty-four inches long; but instead of having four bends, it has only two, and thus has something of the appearance of the trumpet, but is in reality only a cornet. It is excused by saying that it has a trumpet bore, but even this cannot make a short tube give a tone equal to the longer. I have tried it and had it tested by persons qualified to judge. Get an F valve trumpet and practise. A satisfactory result is attainable, and is worth working for.

The principal difficulty to overcome is the pitch. This is difficult, but having become accustomed to it, the rest is easy. One other error I would like to warn students from falling into—that is, trying to play the trumpet with a cornet mouthpiece. The tone of the instrument is at once destroyed by this, and the upper notes flattened. It is also very hard to sustain power, say through a long symphony. The cup of a trumpet mouthpiece should be hemispherical, not conical like the cornet. And the cup should not be less than five-eighths of an inch in diameter, measuring from the inner rim. I have known many young players use mouthpieces much smaller than this, for the purpose of obtaining high notes; but by so doing they sacrifice the tone of the lower part of the instrument, and in a few weeks they find, after playing on it some time, that the mouthpiece chokes, there not being room in the cup for the lips to vibrate.

The Bach Trumpet.

I should like to say a few words about a species of trumpet with which my name has become particularly associated. I mean the Bach trumpet, “so-called” as the papers put it. This is a straight trumpet nearly five feet in length, with two pistons. It therefore corresponds with the cornet in A. The tone of this instrument is beautiful in the higher register, but, being only the same length as the cornet, is poor in the lower register. Having condemned the “trumpetina,” I suppose I ought, in common justice, to explain why I use this “cornet in A.”

Purists, when criticising this instrument, with a shake of the head, say “Ah, I do not like the tone so well as the slide trumpet.” Then I try to explain to them that it is not intended to supplant the real trumpet, but, in the words of advertisers, “is to supply a long felt want.” It is constructed to accomplish what the slide and valve trumpets and trumpetina have for upwards of a hundred and fifty years failed to do—that is, to play the high parts written by Jozef Sebastian Bach. This it is capable of doing with equal intonation, good tone, and some certainty, which I think is sufficient reason for its use.

It may be in the remembrance of many here that at a festival performance of Bach’s Mass in B minor, given by the Bach Choir at the Royal Albert Hall, a gentleman from Berlin, named Herr Kosleck, played the first trumpet part. A story got about that he had discovered an old trumpet in a curiosity shop at Heidelberg, made in the time of Bach, and that it was the sort of trumpet used to play the high trumpet parts. We were all in a high state of excitement to see this trumpet and hear it played, and to hear this first trumpet part which we considered impracticable on any system of trumpet which we knew. I had the pleasure of playing the second trumpet part.
I was delighted with Kosleck's performance and resolved to do my best to imitate him. My first feeling on seeing his trumpet was that of disappointment, for two reasons: First, it had two pistons, and pistons were not invented in Bach's time; secondly, it stood in A, and all Bach's trumpet parts were written in C and D (more often in D). His trumpet, I had no reason to doubt, was as old as he said; also, it was used in Bach's time, but not in Bach's music, nor was it capable of rendering such parts as he wrote without the aid of pistons, which, as we have already said, were not then invented.

I have some extracts from a work on trumpets written about the year 1795, by J. E. Altenburg, of Halle, in which two of these A trumpets or posthorns were used in combination with D trumpets and two kettledrums. In these works only the natural harmonics are used, and only nine of them. The parts of Bach could not have been played on that instrument. Besides, we find the D trumpet was written for, and the natural harmonics properly belonging to that key—ergo, Bach knew what he was writing.

No doubt Kosleck on finding that he could obtain these high notes—and it only required the addition of two pistons to enable him to play the scale of D on his A trumpet—carried his idea out. He told a friend of mine that it took him six years to practise the first trumpet part of Bach's Mass, and I believe him. All honour to him for his determination culminating in success, for in my opinion he has succeeded in introducing an instrument capable of rendering these parts even better than they were played originally, with as much quality of tone and correct intonation.

Scarcey any composers now will be tied down to the plain trumpet giving the natural harmonics only. So we can pass on from that to the slide trumpet, which a very few words will dispose of. This instrument is rarely seen in a orchestra; about two players have an affection for it and like to use it in the old works, but it is looked upon with more curiosity than appreciation, and no composer's trouble to write for it now. Twenty years ago they did, and I have a pleasant recollection of the glorious slide trumpet parts my friend Professor Prout used to write, notably in his cantatas "Hereward" and "Alfred." They are the sort of parts a trumpeter loved to play.

In Professor Prout's Primer on Instrumentation, when speaking of the trumpet in paragraph 127, he finishes by saying: "In writing, no account need be taken of the different varieties of mechanism." And he is right. He puts the whole matter in a nutshell. You may write anything you like within a given register, say from

\[ \text{\includegraphics[width=0.5\textwidth]{image.png}} \]

and you will get it played. Some composers write their trumpet parts always in C—that is to say, they treat it as a non-transposing instrument. Well, that system is a safe and easy one, as even amateurs are accustomed to read from pianoforte scores, and soon learn to transpose. But I am afraid that the system will not encourage the use of the trumpet proper, as people, to avoid even the trouble of that little transposition, will resort to the cornet in C, which is an abomination.

German composers now-a-days nearly always write for the valve trumpet in F; it is a very brilliant instrument, and capable of playing any semitone from

\[ \text{\includegraphics[width=0.5\textwidth]{image.png}} \]

and if parts are written for that instrument much will be done to encourage its use.

The system of changing the trumpet to D, C, E flat, B flat, and A could very well be done away with, much to the advantage of players and the success of works to be played. It is very difficult even for experienced men to be constantly changing the intervals of transposition from one note to a minor third, a fourth, or a fifth. You will find that neither horn nor trumpet players use any crooks but the F and E, and I advise composers to keep to these keys. If the E flat, D, and C crooks are written for they will never be used by players of horns or trumpets. Having three pistons, enabling the player to proceed chromatically from one note to another, other crooks than the F and E are considered by players to be unnecessary. All scales, major and minor, are available, also chords in arpeggio form.
INTRODUCTION

The preliminary and elementary remarks on music usually given in such a work as the present, are here omitted; it being better for a student to obtain some little proficiency on another and more facile instrument (say, the Pianoforte) before attempting to play on the Trumpet, and he is referred to treatises on such an instrument for information in the rudiments of music: so prepared, he will find the road to practical trumpet playing comparatively easy; but, without previous musical knowledge, his progress in it must be slow and attended with many obstacles.

THE TRUMPET.

The Trumpet is usually made of brass amalgamated with an extra amount of copper (termed mixed aetal). The Trumpet in general use is a tube seventy two inches in length from mouthpiece to bell, with three pistons attached enabling the player to lower the open notes at will, a semitone, a tone, a minor third, a major third and a fourth a diminished fifth.

THE MOUTHPIECE.

The Mouthpiece is of greater importance to a performer than is generally supposed. With a good mouthpiece it is possible to play on a badly constructed instrument; with a badly proportioned Mouthpiece, it is impossible to produce a good tone or play with any degree of certainty. The cup should be hemispherical with a slight depression in the lowest part of the bowl. The diameter inside the rim not less than five-eighths of an inch. Some players use a mouthpiece of smaller dimensions in order to produce high notes with more facility. This is true for a short time, but the lower notes, and the tone of the middle register suffer. With a cup five-eighths of an inch in diameter a player can produce his high middle and lower register notes with ease and a good tone.

POSITION OF THE PERFORMER.

The performer should stand or sit in an upright position, to give freedom and ease in respiration. Grasp the trumpet round the lower end of the pistons with the left hand firmly; the first three fingers of the right hand, slightly bent on the top of the pistons. Place the mouthpiece to the centre of the lips, and at the same time introduce the tongue between the teeth, the tip just touching the upper lip; about one third of the mouthpiece on the upper lip. In all cases keep the mouthpiece above the red part of the lip; tighten the lips across the teeth; draw breath on each side of the mouth, withdraw the tongue from the lips with a jerk, and at the same time allow the breath to pass into the instrument. Do not blow hard, no sound will come; breathe strongly and probably C will come; if not, it is recommended to begin on that note, and sustain it a convenient length of time.

When practising, the tongue must not return to the lips until the sound has left the instrument.

To produce a loud tone, a strong accent with the tongue must be given, and a proportionate amount of breath will naturally follow. Great exertion is quite unnecessary.

Upon the proper use of the tongue, depend a good style, brilliancy, and fulness of tone, rapidity and neatness of execution. Do not allow the breath to remain in the mouth, let it proceed direct from the lungs into the Trumpet.
PART I.

Rhythm.

The measure of time or movement by regularly recurring sounds. The disposition of the notes of a composition in respect of time and measure: the measured beat which marks the character of the music. Take the following six crotchets and try how many changes of rhythm they are capable of.

Exercises for the attack, production of tone; and to establish a sense of rhythm. Without pistons

Slow time (Count four 1.2.3.4.)

No 1.

No 2.
PART II.

The use of the Pistons.

There are usually three pistons attached to a trumpet. We are already acquainted with the open notes of the instrument. By pressing the middle one down, we open an extra tube which lowers all the open notes a semitone. The one nearest to the mouth piece, a whole tone, and the third a minor third. The first and second combined are equal to the third. The first and third combined lower the open notes a fourth; all three combined a diminished fifth. It will be seen that pistons have exactly the same effect as the slide of a trombone; that is to say, they lower the whole of the open notes six semitones at the will of the player.

There are higher notes written for the trumpet by some of the old composers, for which a special trumpet is used now. An advanced player will of course find this out for himself.

The notes in brackets ( ) are not in tune as open notes, and must be made with pistons; but it is well for the student to know that they are there.

Without pistons.

2nd Piston.

1st Piston.

1 or 3

The same with 2nd Piston, (a half tone lower as for Trumpet in E)

The same with 1st Piston, (a whole tone lower, as for Trumpet in Eb)

The same with 1st & 2nd Pistons, (a minor 3rd lower, as for Trumpet in D)

etc.

etc.
Three times in a breath.

Very light and not too loud.
No. 1.

Very quiet and sustained.

No. 2.

cresc.
Canon

Vivace.

two in one in the unison.

Durante.
Attack and hold the syncopated notes firmly.

A tempo ordinario.

Handel.
Common Chords with inversions.

C Major

A Minor
Exercise on major and minor scales.

Moderato.
Scale study for transposition.

Trumpet in C.

Trumpet in Db.

Trumpet in D.

Trumpet in Eb.

Trumpet in E.

\( a \text{ Moderato.} \)

\( b \)

\( c \)

\( d \)
Coda.
Loreley.

Volklied.

No. 1.

Slow and sustained.

Thüringer Volklied.

No. 2.

Slow.

Wiegenlied.

W. Taubert.

No. 3.

Slow.

Mein Lieb ist eine Älplinerin.

Volklied.

No. 4.

Moderately slow.
Long ago.

Oh! wert thou in the cauld blast.

Moderato.

Moderately quick.

Irish song.

Duett.

Mendelssohn.
The double tongue and slur.

To double tongue on the Trumpet is a most necessary acquisition. Rapidity and neatness of execution demand it. It is obtained by attacking one of a group of notes with the tongue as it pronounces the syllable ku very shortly. It is advisable to begin to practise it, one in four thus! tu tu ku tu. It should be practised slowly, and no attempt should be made to do it rapidly until strength and equality of articulation are acquired. Due attention to these qualities cannot be given if it is attempted quickly at first. The writer has known absolute failure by being too fast at first. By slow practise failure is unknown.

To slur from a low note to a higher, the syllables ta - ee should be in the mind of the student.

The Double tongue, and slur.

No. 1.

No. 2. 2nd Piston 1st Piston 1st & 2nd Pistons

No. 3. 2nd Piston 1st 1st & 2nd 2nd & 3rd 1st & 3rd 1. 2. 3.

No. 4.

2.5.4.6.0
The same in $\frac{3}{8}$, $\frac{3}{4}$ and $\frac{3}{2}$ times, as indicated in the following.
Military March.

No. 7.
Transpote this as for Trumpet in E, Eb, D and C.

Trumpet in E.

Trumpet in Eb.

Trumpet in D.

Trumpet in C.
Moderato and quicken the time.

No. 16.  
A third time in a breath

No. 17.  
A twice in one breath
B twice in a breath
C twice in a breath

Studies in double-tonguing.

No. 1.  
A tu tu ku tu
B tu tu ku tu ku
C tu tu ku tu tu ku tu
D tu ku tu tu tu
E tu ku ku ku
Moderato, and gradually increase speed as strength of articulation increases.

No 2.
No. 5. Moderato, and gradually faster.

Moderato, and gradually faster.

tu tuku tu

rit. a tempo
Trumpet Solo from the "Dessauer" March.

1st Post.
Maestoso.

Trumpet in Eb
PART V.

Expression and Phrasing.

Expression is the power or act of rendering music so as to make it the vehicle of deep and pure emotion, the spirit of music, as opposed to the mere mechanical production of sound. Its principal demand being attention to marks of expression such as, crescendo, diminuendo, piano, forte, etc. The first rule is, that ascending passage increase in loudness, and descending passages decrease.

Phrasing is the art of dividing music into grammatical sentences, as literary matter is divided by comma, semicolon and period. Thus:

Loreley.

Volkslied.

„Mein Lieb ist eine Älperin."

Also attention to slurred and tongued notes. The following may be said to be phrased in various ways.
Graduation of Tone.

No. 1.

Slowly, and gradually faster.

The same with varied phrasing and rhythm.
Tempo di Mazurka.

N° 11.

Tempo di marcia.

N° 12.
Allegro moderato.

Variations on a song. "What is life's greatest joy?"

Allegro. 3

Cadenza
Allegro moderato.

No 18.
Trumpet in F, E♭, D and C.

Moderately quick.

No. 19.

Trumpet in F, E♭, D and C.

No. 20.
PART VI.

On legato, (smooth) playing and Intervals.

Intervals in music can be defined, as the distance from one note to another. Intervals are counted inclusively and by the number of notes they contain. Thus from C to D, is a second; from C to E a third; C to F a fourth and so on. Intervals greater than an octave are called compound intervals.

Breathe at the comma.
In thirds.
Slowly, then quicker until the scales can be played in one breath.

In fourths.

In fifths.

In sixths.

In sevenths.

In octaves.
In ninths.

In tenths (compound thirds).

In elevenths (compound fourths).

In twelfths (compound fifths).

Thirds.
Slowly, and increase speed as the study is well learned.
Ninths.

Tenths.
Very slowly.

No 1.

The same.

etc. etc. etc. etc. etc. etc.
Very slowly.

The same.

As for Trumpet in E
As for Trumpet in E♭
As for Trumpet in D
As for Trumpet in C

etc.
etc.
etc.
etc.

The turn takes one fourth of the minim preceding it, thus:

Very slowly.

25460
Major and Minor Scales.
The Trill.

There are two methods of trilling on the trumpet; with the pistons, and with the lip. The first can be considered easy. The latter is very difficult and can only be used in the upper register where the notes are only a tone apart. In both cases the trill should be practised slowly in order that the two sounds may be equal. Trills are best played in tempo on the trumpet, that is to say in semiquavers or demisemiquavers, and only the number of such notes as the note on which the trill is to be made contains, thus:

The student is urged to practise the lip trill assiduously, but slowly as it is calculated to give the lip strength and flexibility.

Preparatory studies for the lip trill.

Four times each section.

No. 1.

No. 2.

No. 3.

No. 4.
Allegro.

No. 8.

Trumpet in F.

Trumpet in E♭.

Trumpet in D.

Trumpet in C.

etc.

etc.

etc.

etc.
Lip trills are possible on the following notes of the piston Trumpet in F.

The Trumpet in D, now fallen into desuetude, could trill on all notes of the scale, and in works by Bach and Handel they will be found written frequently. But a special trumpet is now used for these extremely high parts.

Piston trills.
Daily Studies for Trumpet in F.

Very slowly.

Very slowly and only mf

25460
Allegro.

The same study to be transposed.

etc. etc. etc. etc.
Allegro.

No. 3.

mf

f
decresc.

decresc.
Very slow.

No. 7.

The same in E etc.

The same in Eb etc.

in D etc.
Allegro.

The same.

tu tu tu tu tu etc.
Allegro.

No. 10.

tu tu ku tu tu ku etc.

cresc.
f

rit. a tempo
Variations on a theme by Hummel.

No. 14.

Andante.

Var. I.

Var. II.

Var. III.

etc.
Moderato.

No. 22.

\[\text{Music notation}\]

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