

The 'RING' factor

In order to achieve a pure 'ring' in the singing voice, a good understanding of a reliable, solid technique is first needed. **David Mason** tackles the nitty gritty of vocal technique to help you achieve a professional, ringing sound

WELCOME

WHILE IT IS CLEARLY IMPOSSIBLE TO TEACH SINGING VIA THE WRITTEN WORD, I HOPE TO PROVIDE

some information and ideas that will back up your own singing studies or, if you are

just setting out, may help you to bring your own informed input to the learning situation.

Remember that, as a singer, you are your instrument, so the more you are in touch with your own bodies and physical and aural sensations, the better. A word of

warning; although I may deal with specific technical points in isolation, it is important to remember that singing is a synthesis of various processes that should be realised in such a way that we never lose spontaneity of expression or the physical freedom that is central to the effective use of the voice.

RECENTLY OBSERVED A MASTERCLASS GIVEN BY FAMOUS SOPRANO MIRELLA FRENI, WHO URGED NEARLY ALL THE students to 'keep the tone forward'. Having had a naturally well placed voice herself, she was able to demonstrate what she wanted, but for the students it wasn't quite as simple as merely directing the

sound into some forward location. Nearly all schools of vocal pedagogy aim for a focussed, projected sound, but what we might describe as 'forward resonance' is actually something of an illusion. While the singer may have the sensation of resonance in the mask or the sinus region, any vibration felt by the singer in these loca-

tions does not actually contribute to the sound heard by the listener. The nasal cavity, once thought of as an important resonator, is essential only in the production of nasal consonants m, n, and ng, and the nasalised vowels. William Vennard cites an experiment carried out as far back as 1954 in which professional singers sang under normal conditions, and then with the nasal passages filled with cotton gauze. Expert listeners were unable to distinguish between the two conditions. A further experiment was carried out in which the singers had the maxillary sinuses more than half-filled with water. These are the largest of the sinuses, so if they were of any importance they would have changed the perceived tone quality when filled with water. Again, expert listeners noted no change in vocal quality. Some singers are surprised by the implications of these experiments, but they serve to demonstrate the often counter-intuitive nature of vocal technique. They also demonstrate that a head cold will not really affect the sound perceived by the listener, even if the singer's sensations are affected. (This is not to recommend that you *should* sing with any form of infection of the respiratory tract, unless you absolutely have to). But, if there aren't any useful resonators in the 'mask' or in the head, how are we to produce our so-called 'forward resonance' which, for the singer, can be a very strong and concrete sensation?

First, we must consider the source of our tone; the initial sound produced in the lar-



Mirella Freni and Luciano Pavarotti during a recording for the Decca label

ynx. The sound produced here cannot actually be directed to any specific place. Sound waves will travel wherever they can, with different resonators modifying and amplifying specific frequencies. If we plot the frequency spectrum on a graph, we see clear peaks, known as formants. There are five main formants which determine vocal quality. The two lower formants are responsible for determining the different vowels, while the other formants affect other aspects of our vocal resonance, such as changes of colour, depth and richness.

The primary resonators of the human voice are the pharynx, oral cavity and the larynx itself. While we can alter the shape of the pharynx and the mouth to alter the vocal colour, and indeed to produce different vowel sounds, if we do not initiate our sound efficiently, we deprive ourselves of the raw material and the full range of overtones which can then be modified by the various resonators. For that reason, work on achieving a totally clean vocal onset, with the larynx in the correct 'pre-yawn' position, should be considered a necessary first step in any student's technical work, without worrying too much about 'placing' the voice. Indeed, there are schools of singing which direct the singer's attention to the larynx, rather than directly seeking forward resonance. This sort of technique is easier for male singers, (famous examples being

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Mario del Monaco and Pavarotti) who, unlike their female colleagues, sing in the same register as their speaking voice. Another important aspect is the reduction of any tensions that may impede the free working of the larynx. Tension of the tongue and jaw can cause problems in many aspects of singing, and any tendency for the tongue to go back and press down onto the larynx should be avoided. Much of what goes on in the larynx we cannot actually feel; however, we can feel when the tone is emitted freely. Indeed, when the tone is emitted freely it will begin to come forward by itself.

Although, as described above, the voice will begin to come forward with a free, unimpeded emission, there is a crucial element that will ensure a ringing, carrying sound. This is what is commonly known as the 'singer's formant' or, in the Italian

PRACTICE TIPS

Practise descending scales on different vowels, taking care to keep the ring of the higher pitches as you descend.

Sing sequences of different vowels, starting with your most ringing one (usually EE or AH) and try not to lose any of the high overtones as you sing the sequence. A stable larynx and a lifted soft palate are necessary if you are to maintain the ring in all the vowels.

Incisive staccato figures can activate a certain amount of ring; also useful are PYA, PYE, PA, PI.

You will achieve a forward ringing tone more easily if you do not let your tongue go back. Vocalising on ya, yo, yu, can help train the tongue to maintain a forward position for the back vowels. You can vocalise using different consonants that will help keep the tongue agile, eg: L, T, TH, THR, RR.

Remember that developing the ring of your voice is about energy and intensity. To aim for as concentrated a tone as possible is a good way of directing all the energy to where it is needed. It is then unlikely that other unwanted muscular tensions will arise.

IMPOSTAZIONE DELLA VOCE/VOICE PLACEMENT

Inhale, imagining you are smelling a rose. Keep the inhalatory position; you should feel a sense of opening from behind the bridge of your nose to a high soft palate, together with a certain tonicity at the level of your larynx. Practise vocal onsets, while maintaining this tonicity. You can almost imagine the tone beginning in the olfactory region. By practising this type of attack, you are coupling a clean onset with the optimum balance of resonance, right from the start of the note. The result is a pure, perfectly focused, ringing tone.

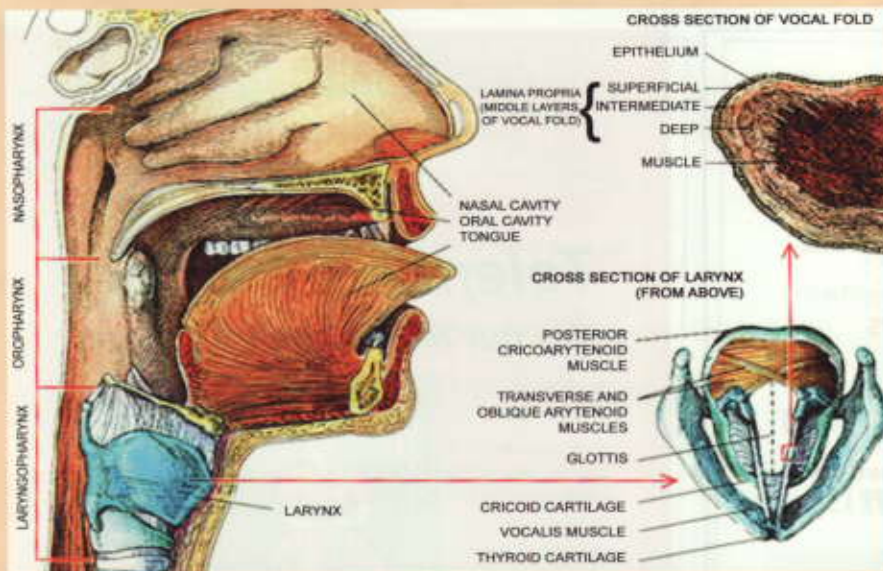
tradition, 'squillo'. The resonator of this frequency is actually found in the larynx itself, in the space above the vocal folds, known as the aryepiglottic sphincter, or 'collar of the larynx.' The use of this space as a resonator requires a well functioning vibrator, with a certain amount of tonicity of the larynx itself, though without this tension becoming an unhealthy constriction. An over-relaxed vocal emission, especially if the closure of the vocal folds is not complete, will prevent the development of this essential component of the vocal tone. Without this ingredient, it will not be possible for a singer to sing comfortably in a large space, or indeed with an orchestral accompaniment, (no orchestral instrument produces such a high frequency). With plenty of resonance, your voice sounds louder, and although an untrained voice without this formant may actually be technically at the same volume, the trained voice will project over an orchestra, whereas the untrained voice will not be heard.

If the idea of training your voice to produce this resonance seems to you to be unnatural, then you would be right. The human voice by nature is a far from perfect instrument, even in the case of those lucky enough to have musical and vocal talent. Even the most naturally gifted have to work to improve certain aspects, and also to maintain the condition of their instruments.

DEVELOPING THE 'RING'

YOU CAN ACTIVATE THIS FORMANT DIRECTLY BY MAKING SOUNDS SUCH AS THE NEIGHING OF A

horse or the baa-ing of a sheep. A slightly aggressive and momentarily nasal 'NYAAH' will usually release this high frequency. If you make any of these sounds in a resonant space you will hear the frequency quite clearly. The same frequency can be heard in certain styles of traditional singing, for instance the so-called 'open throated' Bulgarian singing, or the extraordinary 'tenores' of Sardinia. It is interesting that these and many other types of traditional singing developed with outdoor performance in mind, hence the importance of a vocal quality that will project well. The same is obviously true of the sounds produced by animals, which can also communicate over a long distance. A baby's screaming also has a high concentration of these high overtones, thus communicating considerable emotional intensity. Listen also to the greatest singers and to the 'ring' in their tone. By recognising and listening to sounds which have this ringing formant, we increase our 'aural databank' and thereby the ability to produce it ourselves. The innate capacity to assimilate different frequencies and reproduce them is demonstrated in the way we acquired the exact articulatory positions of the vowels of our first language. From all the babbling sounds uttered as babies, we were able to extract those sounds that



The diagram above provides a detailed illustration of the vocal anatomy. Pay particular attention to the positioning of the nasal cavity, oral cavity, larynx and pharynx

matched exactly the vowel sounds of our parents, completing the process, in most cases, by the age of 18 months.

Teachers often urge their pupils not to listen to themselves, so that they don't over-control and thereby inhibit total vocal freedom. While

it is not possible to hear what a listener in the auditorium is hearing – indeed it is advisable not to try – you can learn to listen to the different sounds inside your head. One of the most important steps to make in a teacher-pupil relationship is to relate what your hear and

feel internally to what your teacher deems to be the optimum sound. In the case of developing the ring of the voice, you will also have to come to terms with the fact that what sounds ringing to the listener does not always produce the nicest sound in your head. It is probably true to say that if your voice sounds rich and warm in your head, outside it will be rather woolly and may well not project in a big hall. A slightly aggressive, momentarily nasal 'NYAAH', declaimed and then sung will usually release the high frequency sound that is most commonly desired. This vocal gesture is an expression of annoyance, not of 'niceness', and often the more 'ugly', or sometimes 'thin' it sounds in your head, the more effective the sound. Of course the finished sound may be rounder and have more depth, but it should always contain a degree of the 'singer's formant'.

Finally, it is also important, in aiming for a forward ringing sound, to keep the soft palate lifted. Alternating nasal and non-nasal sounds can help activate the palate.

David Mason will be teaching at the 1st Curso Intensivo de Canto; Barcelona from 23 to 29 August 2010. www.cursocantobcn.es