

VOICE LESSON #4

Sound Production or Phonation: Creating the Sounds of Singing

PHONATION (Sound production) is the act of producing vocal sound in either speech or singing. It involves the vocal folds (also called vocal cords), as well as the breathing mechanisms already discussed [see *Illustration # 1* from lesson 4]. Relaxation of the tongue and throat are crucial in allowing your “best” voice to sing.

I) The purpose of vocal folds or cords:

In addition to protecting the trachea (windpipe) and respiratory system from foreign matter, the vocal folds close with varying levels of tension to produce the different pitches on which we sing or speak. When the vocal folds are closed properly for singing, there is a great degree of freedom and relaxation in the vocal apparatus.

Sound starts with the breath from the abdominal area as the abdominal muscles move the air up and out, across the vocal folds. Nerve impulses originating in the abdominal area help the vocal folds to close properly for singing or speech.

Thus, the sound must start with the breath from the abdominal area as the abdominal muscles lift the air up and out across the vocal folds. The process is fourfold:

1. Inhalation, or breathing in
2. Suspension, a brief interlude after inhalation
3. Exhalation, or breathing out
4. Recovery

Phonation occurs in step three, exhalation, and the start of the sound is called the *initiation* or *onset*. In singing, the most important word of a phrase is the first word, which requires a proper initiation of air and sound.

Phonation must begin with the initiation occurring deep in the breathing apparatus, not in the throat.

In order to initiate sound properly in singing, we must leave the vocal folds and throat area open and relaxed during inhalation, suspension, and the beginning of exhalation, in one continuous process. We use the abdominal and breathing muscles, rather than the throat, to begin the sound. As with any other technique for good singing, we must practice using the proper mechanisms for phonation and attacks in order to understand how they feel when they work correctly. It takes sufficient practice and focus to make these seemingly complex techniques become second nature, but it’s worth it!!

II) Exercises That Help the Singer Begin Proper Sound Production

Remember to stand in correct singing posture and to breathe properly (refer to Lessons 3 & 4). Keep in mind that you want to achieve the correct method of phonation, placing the sound on the column of air that has already begun deep in the chest and abdomen.

Exercise 5.1

Think about blowing out birthday candles. Begin to blow and then turn the breath into an "ooo" sound on a comfortable pitch. Feel the tone begin in the breathing muscles.

Repeat.

Exercise 5.2

Hiss a familiar song, such as Happy Birthday, using no words or tones, just hissing.

Exercise 5.3

Any sound that starts with "H" helps the singer begin exhalation before phonation. Start with two short blows (on "H"), then sing two short "ha" sounds on a comfortable pitch.

Repeat.

Now repeat again, singing one step higher. Continue in this manner. Follow up immediately with the following exercise.

Exercise 5.4

The following exercise is a musical means of practicing the coordinated onset and release. Observe the note values precisely. Repeat on different pitch levels and with other vowels. Avoid glottal attacks. Your onsets should be smooth and quiet. Begin by starting with a small "H" for each. Continue to reduce the "H" sounds until they are virtually silent. The silent "H" onset for initial vowels is a crucial skill for proper sound production.

The image shows two staves of musical notation for Exercise 5.4. The first staff is in treble clef with a common time signature (C). It contains nine measures, each with a single note on a different pitch level, starting from a low G and ascending to a high G. Below each note is the word "Ah". The second staff is also in treble clef with a common time signature. It contains 15 measures. The first 10 measures each have a note with a short, sharp onset, followed by a longer, smoother onset. Below each note is the word "Ah". The final 5 measures (11-15) show a continuous, flowing melodic line with a smooth onset, followed by the word "Ah (etc.)".

The next lesson (Number 6) picks up after the onset of the sound and discusses resonance which means getting the fullest, warmest sound and the most vibrations from your singing mechanism.

III) Keep it Smooth! Legato: The *Default* Method of Singing

Legato is the act of singing a smoothly connected sound on a continuous column of air. A good legato is essential for every singer. What follows are some informal reflections on legato singing. This is meant to help the student remember some of the concepts covered in the other lessons and how they apply to a smooth, seamless sound.

Legato is affected by several things, among them:

- 1) Breathing - every singer should continually strive to achieve a well-developed and efficient breathing mechanism. This is explained in detail in Lesson 4.
- 2) Diction or Articulation (See Lesson 7). Consider the following:
 - a) Dwell on vowel sounds. Create a feeling of a continuous string of vowels. The vowels are the clothesline and the consonants are the pins clipped to the line.
 - 1) Practice by speaking the text in an exaggeratedly elongated way.
 - 2) Sing just the vowels of the words and leave out the consonants.
 - b) Make the final consonant of one word and the beginning consonant of the next word touch as follows:

O tell me why the stars do shine.

O te--llme why the star--sdo shine.
 - c) Avoid stray H's. They use up too much air and break the line.

Common examples to avoid: Lor-hor-hord have mercy / A-ha-ha-ha-men
- 3) A clear sense of direction in every phrase. This is achieved by:
 - a) Good breath support (again and always).
 - b) Being aware of the structure of the musical phrase (high points and low points).
 - c) Singing *through* each note (or word). Each note (or word) should feel like it is *growing* or *reaching* into the next.
- 4) Now go to the liturgy and start applying these principles to the litany responses or the long Amen (at the end of the liturgy). These short familiar melodies will allow you to focus on using your best technique while not worrying about notes or rhythm.

Important Note: As much as possible while journeying through this course, treat the melodies of the liturgy like they are "NEW" to you. In other words, make sure that old habits don't creep in. This is always a danger when singing old familiar melodies. Go back to the drawing board and practice every part of the liturgy, no matter how seemingly easy. While practicing, keep reminding yourself of the elements of good technique. Try recording yourself to be sure that you are doing what you think you are doing (This is a valuable practice for any musician.).