

# Memorizing: brain, nervous system, & muscles

## Working for muscle memory

Repetition programs your muscles to be automated when it comes to getting a task done. Do you have to think about how to brush your teeth? When you are trying to learn a new way to sing that is different from your normal habits, it takes many conscious repetitions to overrule what your body knows. That's why, even though you've practice really well for 2 weeks before you perform, when you are under 'adrenaline' your body reverts back to older habits it's known for longer. Your voice training has to be constant and long-term, with good coaching. Seek for exercises that address your specific weakness and begins to build new abilities. For the most part, if you hear another singer doing something, you can too. If we all have the same physiological parts that work as they should, then what

differentiates a person who can sing a certain way from a person who can't? It is their muscle coordination. Isn't this a hopeful message? Each person has their own range and timbre, but aside from that, you can train your muscles to do what you want.

To prepare for a performance, you must seek muscle memory. All words, pitches, musical elements, staging, breathing and technical demands must be memorized to do your absolute fullest best. Decide what you are going to sing 30 days before your performance or audition date. 10 repetitions a day for a week before you perform will set you up to be successful. I do believe in resting from all singing and talking for 24 hours before performing so the body is rested and refreshed for a performance.

## Singing and the nervous system

Nerves are triggered by impulses from the brain. Nerves are amazing. They are capable of the tiniest feelings and they are even capable of 'feeling' things that aren't even real, like phantom pain. Your actual vocal cords do not have nerves on them. That would be really annoying if they did. When you say you feel things in your throat, it is from all the nerves near your vocal cords. You can feel muscles and tissue around the vocal cords, but not the actual cord. You are capable of feeling all the subtle movements within the task of singing. When you can begin to separate the feeling of different muscle movements, you will begin to hear a difference in

your singing. There should be no painful strain when you sing, although it will feel like you are working. Learning to relax unnecessary muscles and contracting only the muscles you need to efficiently sing will give you a very long and healthy lifetime of singing. We all like to sing loud sometimes, but also know how to sing in a natural, sweet and flowing way. The more your nerves are activated to do the same thing, the stronger the message it can send to your muscles. So, in terms of making changes in how your muscles and coordination work, the more sensitive you can be about the singing process, the quicker your learning will be.

## The brain and singing

There are two issues with the brain. First, what happens to your brain when you perform, and second, what your brain believes when you sing.

The brain has sections for different processes. When the brain becomes aware of an alarming situation, like when you step on stage, or while you are waiting for your turn to perform, it pumps adrenaline into your blood stream. The higher order reasoning part of the brain is diminished and the "flight or fight" response is triggered. If you choose to stay on stage, at least you didn't run away. Now that you are ready to "fight" for your performance, what you have burned into your organic pathways of your brain processes (muscle memory) is what comes out. When you are on stage performing, is not the time to be trying to remember those lyrics. Worrying about lyrics will take away your ability to sing your best. If you haven't had many successful performances, it's most likely because you haven't prepared well, not because you aren't good. If you feel like you sing your best while you are at home, that is your 100%, then when you get to lessons, you don't sing as well, say about 80%, finally, when you get on stage you are functioning at around 60%. Why? It's harder for your brain to work when

you're stressed or worried. When you learn a song, you go through different stages. To perform a song, it really needs to be in the 'overlearned' stage. To test if a song is in the 'overlearned' stage, (which means you've sung through the 'I'm sick of this song' stage) try doing something else at the same time, like emailing someone, making a sandwich, cleaning your room, whatever. If you can get through the whole song without thinking about it, then it's ready to perform.

Beliefs run throughout your body. If you believe you are a small person, you won't sing very loud. If you believe you can't get a vibrato, you'll always sing straight. If you believe you can't sing high, you won't. You are too caught up in your belief to release the tension that holds you back. Talk to your teacher about your fears and beliefs so you can work together to believe differently. Even if it takes many years to get what you want out of your voice, start with a belief that it is healthy and can function as it was designed to. Seek for people who can help you and believe in you. Singing is a journey that lasts for a lifetime. When you have a heart of a singer, you will suffer if you don't sing. So, believe in your voice, explore many different ways of singing, and share your voice. Now, go sing something.