

Receptivity, Gentleness, and Learning

Lately I have noticed in some students a habit of criticizing themselves while attempting to learn something. Frustrated that they have not managed to play the phrase or bowing or note or intonation they wanted to play, or that I have asked them to play; frustrated at not getting it the first time around, or frustrated at having tried several times to get it right but still missing it, some students curse at themselves under their breath (“*Merde!*”) each time they do something imperfectly. I try to be gentler with them—my attitude is that they can always try again, and if that fails, again and again.

One thing I try to communicate to students is: simply *noticing* that some detail of the music has not come out the way you intended, or were asked, to play it—simply noticing that difference—is such a huge component of the learning process, that students should feel happy to realize that they are learning (through that *noticing*) rather than frustrated at the fact that they still have more to learn. It’s the classic problem of whether the glass is half full or half empty. Yet even though I am advocating the view that students should view the glass as half full (noticing that there is a difference between what I play and what you play fills the glass halfway), there is no denying that the glass is half empty as well (the phrase/rhythm/note is still incorrect). The question is whether to get frustrated and angry at that incompleteness, that imperfection, or not.

I find that frustration, like guilt and other self-attacking emotions, actually hinders the learning process. Any psychologist, trainer, yoga teacher or self-help guru will tell you this. The reason I think frustration hinders learning is that negative emotions, especially those having to do with feelings of inadequacy (at being “not good enough” in any way, which includes not doing a new skill right the first time) take time and conscious and unconscious attention away from what is needed to master a new skill, whether that is the attention needed to move the body in a specific new way, or the attention needed to understand (or hear or see properly or notice) what is being asked and how it differs from what you already know or know how to do. Frustration is wasted energy and attention better spent on simply learning.

Some people believe frustration, or prodding, or goading, or yelling, can help the learning process by giving the student a push to work harder or a reason to succeed, something to overcome. Frustration, or swearing at yourself, or anger, is seen as a way of competing with yourself, having higher expectations of what you are capable of so that there is a clear goal. I say: noticing where you are and being aware of what you want is enough to chart a path, along which you don’t need frustration to push you. Perhaps frustration does succeed in motivating some students to try harder, but that difference is more than made up for by the drawbacks: frustration and other stresses cause everyone to lose their cool, think, see, and hear less clearly,

make more mistakes, etc. Relaxing, clearing the mind, breathing, can all help you find the solution to a problem you've been banging your head against unproductively.

But I think the main reason frustration cannot help or speed up the learning process in the long run is that learning is by definition change, and change by definition takes time. For any new skill there are hundreds of smaller sub-skills that need to be learned, and then coordinated. To play the violin, you have to learn to use the bow and to learn to place the fingers of the other hand on the strings in the right place. To learn to use the bow, you have to develop the muscles in your arms, wrists, fingers, etc., to be able to use precisely the right amounts of weight and pressure and speed to get the sound you want. You have to coordinate different speeds of movement; the extension and contraction of the arm, the notes produced by the other hand, and many other detailed skills, including hand-ear coordination, a sense for rhythm—all of which take time to learn correctly. And it is very hard to keep track of all of them at once, especially at first. If you have learned how to use the bow or fingers in one kind of music, the differences in technique could in some cases prove to be greater obstacles than a blank slate. Everyone has different starting points, and so there is no sense in comparing your learning speed with that of someone else. Everyone also has different internal blocks.

We can compare learning a new skill to writing a computer program in your mind (and there is some justification for this comparison in the computational theory of mind). You have to teach many different parts of your mind how to coordinate, and that requires many different steps. There is no shortcut to following those steps; as mysterious as knowledge and learning may seem to someone who has not thought about how they are acquired, it is very clear that any skill can be broken down into many parts *all of which* need to be learned and put together. When re-writing the skills into your memory (ear memory, intellectual memory, muscle memory), the overall program is so complex that any student will frequently encounter “bugs” in the program, which produce mistakes. Computer programmers may get angry at the bugs in their program, but deep down they know that the anger has absolutely no effect on the solution of the problem. The computer and the program do not understand anger. They only understand the commands they are given. The anger won't help the programmer because he simply has to figure out which component of the program is not connecting properly to which other component, and fix it. Stephen Pinker, in discussing something else, gives a beautiful example in *How the Mind Works*: “Who isn't tempted to throw a shoe through the computer screen when it responds to the command **pritrn file** with the error message **pritrn: command not found ?**” (p. 105). Does anyone doubt that the answer is to correct the word, rather than throw the shoe? And that throwing or not throwing the shoe has no effect—the only thing with an effect is the correction? You may respond “a computer doesn't understand anger, but *we* do,” but not every part of the mind understands anger; the part of the mind designed, for example, to decide “similar or different” about two sounds understands *that* only—it operates like a simple program, and the complexity

of the whole mind and its programs is built out of many many simpler parts like that. The complexity of an operation being programmed into a computer cannot be avoided, wished away, or beaten into submission. The same is true when you are trying to reprogram your mind to learn a new instrument, a new kind of music, a new language. A “bug” is simply information about some other sub-skill you have neglected or haven’t learned yet. The “bug” is the guide to your next practice session.

My main point here is that frustration cannot substantially speed up the process, because jumping over steps (caused by the haste of frustration) simply creates more problems/bugs/mistakes that will need to be fixed later. Another student may have less re-programming to do than you to learn a particular skill, but that doesn’t make that student *better* than you as a person or even as a student. It simply means that at some point in his or her life history he or she has already programmed in more of the necessary sub-skills than you have. Or they have found more efficient ways of organizing those sub-skills. But our minds are so complicated and the memories and experiences and modes of perception recorded in them are so diverse, that it is not always easy to see at first glance what will help you and what won’t. So part of learning any new skill is trial and error. When there is error, the answer is to try again or try something different, not to get angry at the error.

A component of the learning process that is often difficult to uncover is our style of learning. Some elements of learning style are universal, and have to do with how the brain and mind process information, how sense perception relates to representations in the mind and how they correspond with each other. These things we have in common not only with each other, but with mice or any other living thing with neurons. However, we do a substantial amount of learning-how-to-learn (one of the most basic elements of culture) when we are young. Do we learn by repetition? Do we learn better with visual or sound cues? We pick up on how our parents and teachers teach us, whether that is through incentives, punishment, encouragement, discipline, free-association, or whatever combination of methods—and *we tend to believe implicitly through our lives that whatever-it-is is the correct way for us (and everyone else, including our neighbor’s kids) to learn.* Perhaps it is, but on the other hand, it is possible at any point in life to re-learn how to learn. “Bugs,” or “mistakes,” or an inability to get it right after trying repeatedly, are all useful information. If you are unafraid to question your learning style, mistakes can be very valuable as a way of revealing problems in it, which you might not be able to get at otherwise. Back to my first point: *simply noticing* that there might be something improvable about your learning style is a big step.

Frustration not only doesn’t help us, it hinders us in other ways that might not be so apparent at first. In learning something, we cannot discount elements of our psychology. We do not simply think, we feel. We tend to shy away from things that make us feel bad, and be attracted to things that make us feel good. Learning requires us to uncover and change elements of our mental and physical processes, but because emotions are such a big part of our operation, certain components (or sub-

skills) we are trying to uncover or change may be linked to positive or negative emotions in our memory. A negative linking may cause us to avoid something specific (and that avoidance may be entirely unconscious to us), causing a “block” in learning or understanding. The brain/mind is almost infinitely flexible, and any skill learnable by one person is almost definitely learnable by everybody. The differences in apparent abilities to learn probably have more to do with differences in emotional blocks (and everyone has lots of them, in different places).

Past negativity can be difficult to uncover and deal with in the learning process, but frustration in the present makes it even more difficult to uncover those past blocks (we approach them judgmentally, as something wrong, and that makes us want to avoid them even more, since there is already discomfort in that area). Even worse, frustration add more blocks. If we swear every time we get something wrong, we will become unconsciously afraid of doing something wrong, which may make us afraid to try something difficult or new. If we get angry every time the bow makes a funny sound, we may begin to associate bowing with anger, which will make our bowing more tense, less smooth, and ultimately less beautiful.

Practicing is based on repetition, on the fact that anything we repeat becomes more deeply ingrained in our thoughts, memory, habits, the more we repeat it; becomes linked to more and more different areas of our mind, and more accessible from different places. If we repeat anger or frustration, we are practicing it, and linking those feelings with whatever skill we are trying to learn while we are frustrated. Difficulty in learning or executing something new is just a way of looking at it: in reality, what we perceive as difficult is merely something that requires more steps and more practice. Difficulty is a psychologically created perception of those multiple steps, specifically, multiple steps we haven’t attained yet. We create the perception of difficulty in our own minds by repeating frustration—by finding those multiple steps somehow intolerable, greater than our patience. The more we practice frustration, the more it becomes a habit, and the more it is present when we use that particular skill. So the question is, why are we learning music (or Spanish, or golf)? Probably the first reason is that there is something about it which attracts us, which we find beautiful, which we enjoy. Music is utterly unpractical; its entire content and meaning is centered around enjoyment of some kind. So why turn it into something unenjoyable by getting frustrated at ourselves for a major percentage of our time spent doing it (practicing, taking lessons)? And does anyone think that the frustration/ anger/ resentment/ self-criticism/ inadequacy they feel while practicing and learning won’t seep into their performing and jamming time?

With music, at least, the *way* in which a musician learns has a big effect on his or her ultimate performance, because those (often unconscious) learning habits are repeated and ingrained just as much as the specific skills being practiced. When specific technical skills are utilized in performance, the feelings associated with their acquisition are linked in the musician’s mind, and the audience can feel it too (even if

they don't recognize what it is they are feeling or noticing). If you learn in a fun way, performing will be fun. If performing is fun, the audience will find your performance fun. If you learn in a strict way, performing will be strict. If you learn in a frustrating way, you will be frustrated at every step, whether it is practice, performance, or teaching other students. Not everyone realizes that they have a choice of how to learn, and not everyone realizes that the teacher is only providing part of that framework in the context of lessons. As teacher, I can point out your learning habits if you manifest them in the context of our lessons (which means I won't even see all of them), but I can't go inside your head and change them for you, even if you want me to.

What I'm saying is that, as a musician, whatever you make your practice about is what you will make your performance about, even if you don't realize it. But there is no reason to despair! Anyone has the ability to change any habit through practice and repetition. I have been talking about what I believe students should *avoid* during the learning process: frustration, anger, self-criticism, impatience, but it's helpful with bad habits to have something to replace them with, rather than just trying to get rid of them.

I believe the internal attitudes of receptivity and gentleness to be the most valuable to the learning process. The point about receptivity is that we don't always know what is the best *way* to learn, we don't always know what is the best *thing* to learn, we don't always know where our gaps may be. Mistakes are actually teaching us something. If we are receptive to and grateful for them, we will learn more from our mistakes, because we will really accept the information they contain.

But music isn't just about getting it right, anyway. It's about having a good time. If you can have a good time even when you've done something "imperfectly," then your music will give other people a good time. You will also be able to hear the good things in other people's music, and not let the imperfections get to you. Music is a shared experience among performers, between performers and audience, and among audience members; and so internal attitudes inevitably communicate externally. Cultivating an attitude of inclusivity in one's own playing (accepting the good and the bad together) can spread outwards to develop the same feeling in audience members. Receptivity is an important element of music because it encourages a multi-channel flow of communication, which is at the heart of music's value to us.

Gentleness toward yourself while learning accomplishes several things: first, it makes learning and practicing more enjoyable, which makes you more likely to spend time doing it. Second, it allows you to look at yourself unjudgmentally, which will enable you to uncover mistakes more easily and evaluate them more neutrally, calmly, and with a clearer mind. Third, it brings gentleness and ease to your playing and performance. Fourth, since learning gentleness can be a component of altering your

learning style, it will seep into other aspects of your life. We are always learning new things, learning about new people, every moment of every day, whether we realize it or not. Learning is a major component of our internal processing of the world outside of us. The mind is constantly taking in new sensory data, categorizing it, and making decisions based on it. In a sense, gentleness and receptivity go hand in hand. What you learn, you will teach; *how* you learn you will teach.

I'm sure many people agree with the basic idea I am presenting: *be more patient with yourself when learning something new*—but still get frustrated with themselves a lot. It is a habit, like the way you tie your shoes, the brand of cigarettes you smoke, how you talk to your parents, or how many sugars you put in your coffee. Learning about your own habits can be enlightening—and in that sense, learning some new skill can be a way of exploring the relationship you have with yourself. It brings out the ways in which you treat yourself—if you are kind to yourself, patient with yourself; it shows you the ways in which you can acquire new knowledge and the ways in which it is difficult for you to learn. You can use learning a new skill as a way of teaching yourself how to learn, and teaching yourself the attitudes you wish to develop in yourself. You can use it as a way to figure out your reasons for and priorities in acquiring new knowledge or skills, and your priorities regarding the use of those skills once you acquire them.

As for me, I teach music because I love it, and when I teach music I do not merely wish to teach the skills involved in executing music properly. I want students of music to cultivate their joy in music, and that cultivation takes every bit as much attention as does practicing bowing or scales or intonation or rhythm. I can do my best to communicate my own enjoyment of music, but I cannot cultivate it in someone else. I can simply provide a gentle environment for an hour or two a week in which students can choose to enjoy themselves—or not. And what a small percentage of your time that is!

So to all of my students: please be gentle with yourselves, and forgive your mistakes. They won't hurt you. You can always try again to get it right, but if you are angry with yourself for getting it wrong, some part of your mind may record that anger into memory, especially if you do it again and again. Of course, that's okay too—forgive yourself for being unforgiving toward yourself (noticing the problem fills the glass halfway), and you will release much pent up anger and frustration. Just try again. Enjoy your mistakes, listen to them, learn from them. Perhaps there is the germ of something beautiful in them—a skilled improviser can gracefully make use of unintended notes, and can be receptive to new ideas as they float up in consciousness, or as they are passed back and forth among musicians.

Here is some advice I wrote to a friend a few years ago:

Do not be afraid of playing out of tune.

Allow yourself to play (and play and play); sometimes you will play in tune, sometimes

out of tune.

Listen to your playing, and pay attention.

Enjoy the fact that you are playing, enjoy and listen to every sound you make.

Do not judge the sounds, do not judge your playing.

Enjoy the mistakes you make along the way—it will add richness to your playing, and you will learn to sound good even when you are out of tune.

Never force yourself to play in tune—only listen.

The more you play and listen, the more you will become aware of in-tune-ness. The more you become aware of that, the more your playing will gravitate toward it, without being forced.

Don't underestimate your mind's ability to learn something without your having to consciously force it. Just because you got it "wrong" several times, don't assume

your mind hasn't learned something anyway.

Just keep playing and making mistakes. Don't be overly concerned about correcting mistakes—the more you listen, the more they will correct themselves.

You may not know well enough what is a mistake. Try not to decide prematurely.