And even today we have to be careful in offering simple explanations. Instead, we may ask some new questions:

- What are the important layers we travel through on the way to the psoas and what is their structural and functional role?
- How do these intraperitoneal components relate to each other in space and in active or passive motion?
- How do their retroperitoneal neighbors have an impact on the function of the psoas?

There is plenty to explore, looking at the small details. We may look in detail at adhesions between the posterior wall of the peritoneum and the anterior part of the fascia of the psoas. We may include the streaming direction of the serous fluid. And there is also plenty to explore within the more global context: how is the psoas acting as a "spacer" between the peritoneal, subperitoneal, and retroperitoneal cavities? This question might guide us down a trail to a different appreciation of the psoas, seeing it not only to be functioning like a muscle, but also as a spacer. In this sense the psoas may be called a fluid bone that also works like a muscle. Anyway, the story of this fascinating area deep inside of our organism has yet to be written to its end.

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Rolf Movement Faculty Perspectives

The Role of Imagination in Structural Integration

By Kevin Frank, Certified Advanced Rolfer™, Rolf Movement® Instructor

Structural integration (SI) is founded on the notion that posture can change, and that the shape of the body in gravity can make a lasting change. But what shapes our physical body? What shapes our perceptive body? These questions in turn lead us to ask, what is the relationship of imagination to perceptive shape and body shape? Imagination is an important part of SI and turns out to play a key role in our best explanation for why SI works.

Imagination is closely related to perception. Our brain assembles bits of sensation into an experience, which we call a perception. Putting bits of sensory material together into a meaningful experience in the brain is also imagination. At the sensory cortex level, perception of a sensation is the same as imagining the sensation.

Our experience of the world is, effectively, an assembled representation of the world. We build a perception of the world – the world we inhabit is the one we build. As we build the shape of our perceived world, our body shape develops correspondingly.[1] Depending on how we imagine our world, and what we imagine as our body, our body shape expresses the result of that internal process.

The structure of our body and the structure of our perceptual processes are not normally plastic – they are not meant to change casually. Our welfare depends on reliability and consistency of perception, what Gibson calls invariant perception.[2] However, under some circumstances our perceptive possibilities can change. If our perceptive possibilities open to something new, and if something new is integrated into coordination, we have changed perceptive structure. Shifts in perceptive and coordinative structure in turn change body shape. SI is a means to do this.

Imagination is a skill.[3] Skill with imagination develops through a learning process. An example of this learning process is embedded in SI. We learn to differentiate the map of body and peri-personal space[4] – something we teach clients and students with fascia-oriented touch, and with movement, visual cues, and our own embodiment.

It should be acknowledged that imagination can be a confusing word. One might ask, "Isn't imagination just inventing anything in the mind?" Does "pretending" belong in the serious work of SI? Is talk about imagination a form of induction or, worse, an induction into a practitioner's pet cosmology or belief system? What specific kind of imagination is being referred to in the context of movement and SI?

To answer this question, it helps to talk about posture and coordination as a response of the body's movement system. "Movement brain" is a term that conveniently denotes the system processes of the body that guide our ability to move.[5] This system process doesn't depend on thinking about it. (In neuroscience terms "movement brain" or "movement system" is roughly equivalent to "body schema.") When a body expresses ease of posture, effective response to demand, when we see examples of successful movement, it is because the body movement system, the movement brain, is functioning well, functioning congruently and aligned to the welfare of the person.

Some forms of imagination "speak to" the movement brain (body schema) more than others. "Speak to" here means facilitate useful information flow to liberate movement from whatever thoughts, habits or inhibitions might be getting in the way, as well as inspire the movement brain to find new answers to meeting demand.

What forms of imagination speak to the movement brain? Helpful forms of imagination build a sense of location, differentiation of body map, and differentiation of the space around the body. For example, imagining a sense of weight in the body speaks strongly to the movement brain because a sense of weight is an essential part of the calculus for motor control. Feeling the location of a bony articulation is a refreshing of the body map; the map becomes clearer and more differentiated.

Imagining a direction, a vector in space, also refreshes the movement brain's map of the space around the body. When you imagine an arrow pointing up from the top of your head, or as an extension of one's tailbone pointing down and back toward the ground, you are imagining directions in space, you perceive imaginary vectors. These imagined arrows or vectors suggest to the movement brain a directionality, which in turn helps to organize movement. There are cells in the brain that are made to respond to directionality, place, and relational location.

What other examples of imagination help with movement? One can learn to imagine sensations in the skin of one's hands and feet, or arouse an accelerated sense of distance or an accelerated sense of weight. It becomes easier to do this with practice. At first, the conscious experience is vague and intermittent. With time, the experience becomes stable, clear, and easier to arouse.

Sensation can be aroused with touch or with movement. In addition to the sensory value of touch, another aspect of imagination is aroused within the central feature of SI – fascial manipulation. Fascial manipulation is a way to inform the body's map of itself through its most efficient portal of information – the fascial net. When fascial manipulation is accompanied by client movement, even more information is imparted. Slow movement is most effective, and if preceded by imagined sensory and directional perceptions makes the information package especially attractive to the movement brain.

Helpful forms of imagination can also be, and often are, aroused from remembered experience. We may remember how it felt to be heavy someplace in the body. We remember the feeling of being touched physically, or "touched" expansively by the spacious night sky. When we evoke a memory of a sensory experience, our brain can bring it alive in present time, as a sensory event. Once aroused, the sensory experience informs the body at the subcortical level in the same manner as sense perception. It is, in fact, sense perception.

What's not helpful for movement? Not all forms of imagination are helpful to the movement brain. Some forms of imagination remain mostly in the realm of thinking. For example, as you shop at the supermarket, if you imagine items missing in your refrigerator, that doesn't inform the movement brain. It helps you get needed food items. It may motivate you to start moving more quickly with your shopping cart, but your quality of movement probably won't improve. Your movement might even look more effortful, as you concentrate on mental images of groceries. Usually movement that looks effortful is movement that is inspired by thinking about a goal or an image. Goal-oriented images are not the province of the movement brain.[6] They are they province of the thinking brain and they serve us in many important ways. We don't want to throw away goals and images, but we do wish to liberate coordination from their dominance.

At the same time, when we choose to pay attention to a sensation we are engaging in a cortical process. Choosing to direct one's perception is a cortical process. Cortical processes are not the enemy of movement.

When we use thought to arouse a remembered scenario, one that we feel positive about, or one that arouses a desired emotion, the theatre of our imagination can help change the meaning of a space or object. It is a multi-step process. We associate to a positive scenario and then feel the impression of that scenario. As we sense the effect of our imagined scene or object, our availability to movement changes. For example, if a client has trouble standing up from a chair, we might invite him/her to imagine a desirable object or person in the space. If the client takes the time to feel a sense of enticement in the path of movement, the coordination to stand up will benefit.

We also use cortical activity to recognize and record sensory experience in order to remember it, so we anchor a change in movement or posture. "What do you sense in your body?" is a request for the client to more fully inhabit a shift in coordination. Integrated memory (or explicit memory[7]) depends on cortical processes to put experience together and find a place for it within one's life narrative, so there is organization and coherence. Using our thinking mind to arouse imagination is an example of cortical activity that supports the subcortical activity in the movement brain. Usually the best use of the cortical brain in movement is when we choose what we pay attention to. We can choose how we use our imagination, in what circumstances, and we can choose the forms of imagination that best complement a movement inquiry.

Imagination is a mind/body skill. It is a skill that is learned with trial and error, and with repetitions. Our skill grows through finding pleasure in the results because it motivates us to practice.

It's helpful to experience how different forms of imagination speak more or less effectively to our movement brain. As practitioners we have the opportunity to experience how language supports a client or student in arousal of his or her imagination, in forms of imagination that help movement. We have the opportunity to learn what kinds of language inspire creativity and ease, and which kinds of words and imagination make it all harder.

The more richly we develop facets of our perceptive imagination, the more adaptive capacity we gain for meeting challenges in all aspects of daily life. Most of the coordinative skills involved in motor control, which help with core stability and ease in posture, rely on skills of imagination.

For more discussion on the perceptual components of SI go to: www.resourcesinmovement.com and choose Article Archive.

Endnotes

1. Frank, K., "Posture and Perception in the Context of the Tonic Function Model of Structural Integration," *The 2007 Yearbook Of Structural Integration*. Missoula, MT: IASI, 2007.

2. Gibson, J., *The Senses Considered as a Perceptual System*. Westport, CT: Greenwood Press, 1983.

3. Mabel Todd, who wrote *The Thinking Body*, founded the study of Ideokinesis, which is the skill of body imagination. Todd was a major influence on Ida Rolf. [*The Thinking Body: A Study of the Balancing Forces of Dynamic Man* (reprint of 1937 original, with a preface by Lulu E. Sweigard). New York, NY: Dance Horizons, 1972.]

4. Our body map includes the peri-personal space around the body. The brain has many maps of the body at a sensory and motor level and they inform the movement brain about the potential for movement. The more differentiated the map, the more options for

movement and the more opportunity for optimized and nuanced movement.

5. Frank, K., "Body as Movement System: A Premise for Structural Integration." *Structural Integration: The Journal of the Rolf Institute*, June 2008.

6. To be sure, all movement requires the function of our body schema / movement brain. When we construct a movement with a dominance of thought, however, we make the distinction that we have interrupted some of the executive function of the schema with image.

7. Explicit memory is memory in which an event has been integrated at a conscious level. Implicit memory doesn't require that the experience has been integrated at the conscious level. Daniel Siegel is a good source for information about how this works in his books and audio about brain development. Trauma therapy is an example of helping to integrate implicit memories so they become explicit.

HOW WE DEVELOP AS ROLFERS™ – AT OUR SCHOOLS

Becoming a Rolfer:

An Instructor's Overview, a Student's Project, and Mentoring

Introduction

The following collection of articles offers insight into part of the current process of training Rolfers at the Rolf Institute® of Structural Integration (RISI). The starting point was a Phase II project by then-student Vivian Gettliffe. Her instructor, Thomas Walker, suggested that she write up her class project to submit to *Structural Integration: The Journal of the Rolf Institute*.

The timing coincided with our theme on professional development, and we encouraged Gettliffe, her instructor, and her mentor Darrell Sanchez to develop an article giving us not only Gettliffe's project but also a window into the broader context of the educational objectives of the Phase II projects and the optional mentoring chosen by some Rolfers-in-training during their studies at RISI.

Anne Hoff, Editor-in-Chief
Robert McWilliams, Managing Editor

An Instructor's Overview of Phase II

By Thomas Walker, Certified Advanced Rolfer™, Rolfing® Instructor

Phase II of the Rolfing Structural Integration (SI) training is entitled "Embodiment of Rolfing and Rolf Movement® Integration." The purpose of the class is to learn at a beginning level about "the Recipe," theory, touch, therapeutic climate, movement, etc. that make up all that we do in Rolfing SI. As an instructor, one of my main purposes is to not only teach these technical aspects but also how to *be* a Rolfer. In what ways do practitioners need to transform within themselves to be able to be most authentic and efficient in our work? As many of you remember, the format of four days per week for eight weeks makes the class very intense, not only because of the amount of material, but also because of the intrapersonal and interpersonal "uncoverings" that can occur. Students are giving and receiving thirteen sessions in seven weeks, which is something few of us would do in our private practices.

In addition to the classroom learning, students are also given outside assignments intended to enhance their understanding of the work. After the conclusion of Phase II, students must write a paper about the Ten Series and the three movement sessions learned in Phase II. This assignment helps deepen their understanding of what is occurring during the series and movement sessions, how the principles of Rolfing SI apply to each session, how the functional goals of each session reinforce the structural goals, and how the sessions build on each other and flow together.

Students are also asked to give an in-class presentation during Phase II relating to one of three topics – diaphragms, tonus, or the feet. At times, students may ask to research and present something of special interest relating to our work that is outside of these topics. The purpose of these presentations is to clarify the anatomical information learned during Phase II, develop critical thinking skills, and give students the experience of doing oral presentations to a group, a valuable skill for practice building. The presentations let instructors see how well students articulate their knowledge and experience of the class, embody the series, and express just what is it that we do in Rolfing SI sessions.

The following is a summary of such a presentation by Vivian Gettliffe, in which she researched what she calls the "trans-structural" aspects of the students' experiences of receiving the work. The inquiry that Vivian undertook and presented was very informative, and I encouraged her to publish it in *Structural Integration: The Journal of the Rolf Institute*. Much of what Vivian presents is understood by experienced practitioners, but she has added information from a quantitative survey to verify what each of us has experienced in our own beings and those of our clients.