# FREE YOUR FASCIA

RELIEVE Pain,
BOOST Your Energy,
EASE Anxiety and Depression,
LOWER Blood Pressure, and
MELT YEARS Off Your Body
with FASCIA THERAPY

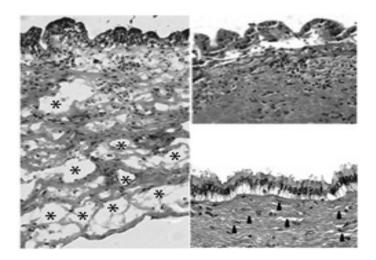
### AUDIOBOOK SUPPLEMENTAL MATERIAL

#### DR. DANIEL FENSTER



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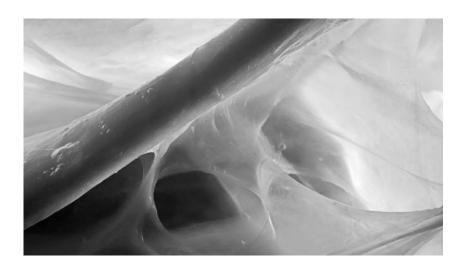
Left: Image of fresh-frozen bile duct; the dark bands are collagen bundles.

Upper right: Image of normally processed and fixed bile duct tissue from the same patient, showing that the spaces have collapsed and the collagen bundles have adhered to each other.

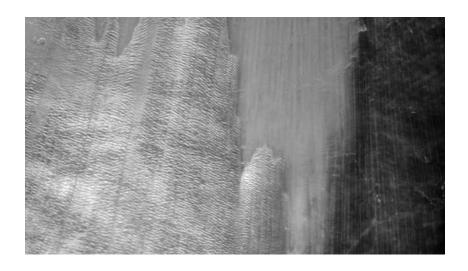
Lower right: Image of the fixed specimen, stained; the thin spaces between collagen layers (arrows) show fluid-filled spaces in the living tissue that are almost completely collapsed.



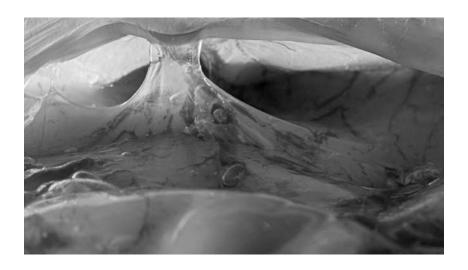
Fascia from a turkey knee © Fascia Research Society. Photography by Thomas Stephan.



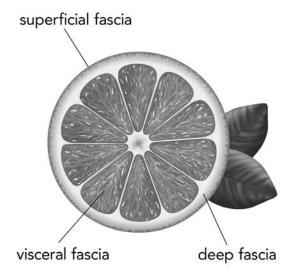
Fascia from a bull leg tendon © Fascia Research Society. Photography by Thomas Stephan.



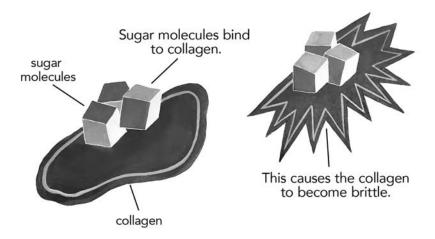
Fascia from a turkey thigh © Fascia Research Society. Photography by Thomas Stephan.



Fascia from a pig brain (meninges) © Fascia Research Society. Photography by Thomas Stephan.



Visualization of the layers of fascia



The process of glycation

### THE "FREE YOUR FASCIA" SELF-ASSESSMENT

Set aside some quiet time to do this test. Give serious thought to each question, and note the pattern of answers for each section.

#### **MEDICAL:**

For this section, choose the answers that best describe your health.

Have you ever sprained/strained a joint, torn a ligament, or broken a bone in a way that altered your function?

- A. Never
- B. A single time
- C. Multiple times

Have you experienced any other significant injuries?

- A. Never
- B. A single time
- C. Multiple times

Have you had any surgeries?

- A. Never
- B. A single surgery
- C. Multiple surgeries

Have you experienced emotional trauma or stress for a significant part of your life?

- A. Little to no stress
- B. Moderate stress
- C. Significant stress

What is your body composition?

- A. BMI of 18.5–24.9 and/or healthy body fat percentage
- B. BMI of 25–29.9 and/or unhealthy body fat percentage
- C. BMI of <18.5 or >30 and an unhealthy body fat percentage

Do you have pain anywhere in your body?

- A. I'm fully at ease
- B. I have a few minor aches and pains
- C. I have many regions of minor pain or some regions of moderate to severe pain

Do you have any structural abnormality such as scoliosis, arthritis in a joint, different lengths of limbs, or one shoulder higher than the other?

- A No
- B. A minor one that doesn't affect my life
- C. Yes, a significant one

Do you have any of the following conditions: fibromyalgia, an inflammatory disease, temporomandibular joint disorder, diabetes or prediabetes, or migraines?

- A. No
- B. No, but it runs in my family
- C. Yes

How is your blood pressure?

- A. Within normal range
- B. Slightly out of normal range, but managed without medication
- C. High

How is your range of motion?

- A. I move with ease
- B. I have no major restrictions, but I could be more flexible
- C. I have a restricted range of motion (with or without pain) and it significantly interferes with my everyday activities

What is your balance like?

- A. I move with grace and ease
- B. Normal, but could be improved
- C. I am clumsy, trip easily, and/or have poor balance

Do you experience urinary leakage when you cough, sneeze, laugh, or exercise?

- A. No
- B. No, but this was a past concern/is likely to become a future concern
- C. Yes

Is pain or limited range of motion interfering with your sex life?

- A. No
- B. No, but this was a past concern/is likely to become a future concern
- C. Yes

#### LIFESTYLE:

For this section, choose the answers that you relate to more.

Do you drink water throughout the day?

- A. I make a conscious effort to drink water every day
- B. I often forget to drink water

What is your usual diet like?

- A. I eat a high-nutrient diet rich in fruits and vegetables, low in processed food
- B. I occasionally eat processed food

Do you avoid sugar?

- A. I read labels and avoid products with added sugar
- B. Sugary treats are a normal part of my diet

How much sleep do you usually get each night?

- A. More than seven hours
- B. Less than seven hours

Do you take a nutritional supplement?

- A. I regularly take a full-spectrum supplement
- B. I take no supplements or often forget to take them

How much activity do you regularly get each day (include workouts, housework, yard work, etc.)?

- A. At least 60 minutes of moderate to intense activity every day
- B. Less than 60 minutes daily or only light activity

Do you frequently vary your exercise?

- A. I often try new activities or work different muscle groups
- B. I like routine and doing the same exercises

How often do you stretch each week?

- A. More than 10 minutes a day, at least three days a week
- B. Rarely to never

How often do you get bodywork (e.g., massage or acupuncture)?

- A. At least monthly
- B. Never to rarely

Do you practice stress-reducing activities (e.g., yoga or meditation)?

- A. Regularly
- B. Never to rarely

Do you cumulatively sit for more than 8 hours each day (include work, home, and driving time)?

- A. No, I am usually on my feet
- B. Yes, but I try to stand up every hour or two
- C. Yes, and I'm often stuck sitting for hours without a break

How do you hold your phone when you send or read text messages?

- A. I rarely look at my phone and/or consciously practice good posture while sending and receiving texts
- B. I'm not mindful of my posture, but I'm on my phone for less than a hour a day
- C. I'm craned over my phone all day

Do you often bend your neck to use your shoulder to hold your phone to your ear?

- A. No
- B. Yes, for occasional long phone sessions
- C. Yes, I'm regularly on my phone and usually bending my neck to keep it in place

How often do you play video games?

- A. Occasionally or never
- B. More than 10 hours a week, including marathon sessions

Do you wear high heels?

- A. Never or only for special occasions
- B. Yes, at least three times a week

How heavy is your regular bag?

- A. I carry no bag or a light bag that is easy to lift
- B. Heavy enough to feel it in my muscles when I set it down

If you have an everyday bag, how do you usually carry it?

- A. I regularly switch the arm or shoulder I carry my bag on
- B. I usually carry my bag on the same side

Do you regularly put things in your back pocket?

- A. No—if I do, I remove them before sitting
- B. Yes, I often keep bulky things, like my phone or wallet, in a back pocket

Where do you usually place your legs and feet when you sit?

- A. Feet planted on the floor—when I cross my legs, I alternate the top leg
- B. Legs crossed, with the same leg on top

Does your daily life require you to make the same repetitive motions each day (e.g., typing or caring for a baby)?

- A. No
- B. Yes
- C. Yes, and I have stress injuries due to this activity

Do you feel you are under a great deal of stress?

- A. No
- **B.** Sometimes
- C. Regularly

Do you smoke?

- A. No, never
- B. Sometimes (or previously)
- C. Regularly

What is your alcohol consumption in an average week?

- A. None
- B. Moderate (up to 7 drinks for women, up to 14 for men)
- C. Heavy (7+ drinks for women, 14+ for men; more than 3–4 drinks at any sitting)

When you exercise, what do you do when you encounter pain?

- A. Ease the intensity, perhaps pause to recheck form
- B. Push through it—no pain, no gain!

#### **SELF-REFLECTION:**

For this section, give yourself an A if you do relate to the sentence; B if you do not.

I have lots of energy and a spring in my step.

I am strong.

I am graceful.

I am flexible.

I have good posture.

I am aging well.

I am physically able to do everyday tasks with ease.

I am at peace with myself and the world.

#### TO SCORE:

If you answered C to any question at all, or if you have any medical problems not addressed here that significantly impact your health, you owe it to yourself to obtain a professional evaluation. I recommend going to a holistic clinic that can address your issues from multiple angles. You are extremely likely to have a significant fascia problem, and while self-help measures can be beneficial, they may not be sufficient.

Now, look at your pattern of B answers:

- If you have B answers in the medical section, it's a smart idea to have at least one consultation with a professional. However, there's a good chance that you can optimize your fascia largely through self-therapy, including lifestyle changes and exercise.
- If you have B answers in the lifestyle section, you can address every one of these issues with simple lifestyle changes, self-therapy, and an occasional bodywork session (for instance, a massage).
- If you have B answers in the self-reflection section, I
  recommend starting with self-help and with simple
  professional therapies such as massage, and then
  graduating to professional help if these measures don't
  adequately address your problem areas.

These guidelines are a good starting point. However, you're in charge of your fascia therapy, so choose what works best for you, your lifestyle, and your budget. There are dozens and dozens of different types of fascia therapy, and there's no right or wrong approach. They all work, because they all address the fascia. If you address your fascia in some way, shape, or form, you will make progress.

#### PART II

## THE "FREE YOUR FASCIA" PROGRAM

Whether you opt for do-it-yourself therapies or seek professional help, you'll have lots of fascia-oriented therapies to choose from. While the list is growing every year, here's a sampling of the many names you'll hear when you search out therapies that focus on fascia:

- Rolling
- Dynamic (Active) and Static Stretching
- John F. Barnes Myofascial Release Approach
- Stretch to Win
- Rolfing (Structured Integration)
- The Melt Method (created by Sue Hitzmann)
- Fascial Fitness
- Myofascial Trigger Point Therapy (Janet G. Travell method)
- Visceral Manipulation
- Fascial Manipulation (Stecco method)

- Active Release Technique (ART)
- The Graston Technique
- Feldenkrais
- The Stick
- Gyrotonic
- Alexander technique
- Yoga
- Pilates
- Tai Chi
- Massage
- Acupuncture/ Acupressure
- Vibration
- Trigger Point Injections
- Hydration (Quench)

#### **Important: Breathe as You Stretch!**

To get the most benefit from your stretches, you need to breathe deeply and regularly throughout them. If you're not used to deep breathing, practice it until it becomes a habit. Here's how to do it:

- Placing your thumbs at the lower edge of your ribs, spread the rest of your fingers over your belly. Relax your shoulders and face.
- Breathe in through your nose and out through your mouth, feeling the movement under your hands.
- As you inhale, consciously fill your belly with air like a balloon. Then, as you breathe out, pull your belly in toward your spine.





Expanding and contracting your belly as you breathe.

- Next, lengthen your exhalation so it's longer than your inhalation. This will enhance your relaxation.
- Occasionally, breathe faster for a minute or two. (This helps to build strength.)

As you're stretching, consciously monitor your breathing. Eventually, deep breathing will become a habit.



Stretch 1: Plantar Fascia Stretch

This is an excellent exercise if you've been diagnosed with plantar fasciitis or if you have pain in the plantar fascia (a thick band of fascia that runs along the bottom of your foot from your heel to your toes) when you first get up in the morning.

However, even if the bottom of your foot is not a problem, do this stretch daily. The bottom of your foot is where your kinetic chain (see Chapter 1) begins, and looser is better. Restrictions can translate into pain in other areas of the body, so this is a great preventive. If I were going to recommend one stretch for people with no issues, I would tell them to stretch their feet.

To do this exercise, you'll need a yoga strap, belt, or bathrobe tie. Make a loop in the strap, belt, or tie and place the loop around the ball of your foot, holding the other end of the strap, belt, or tie with one hand. Point your toes down, then pull them up toward your head. Go back and forth 20 times each session, 10 to 12 times a day.





#### **Stretch 2: Low Back Side Stretch**

This exercise will help to correct an imbalance in the strength of your back muscles, which in turn will help to correct or prevent fascial restrictions.

Stand with your feet shoulder width apart. Place your right middle finger on the right side of your thigh and slide it down your leg as you bend to the right, contracting the muscles in the right side of your lower back. Be careful not to twist your body forward or backward. (If you're wearing pants with a side seam, slide down the seam.) Do 8 to 10 repetitions, and then repeat on the other side.



#### Stretch 3: Cobra Yoga Pose

This classic yoga position will help to release the fascia in the front of your torso and a muscle called the psoas (more on the psoas shortly) that's very important for good posture and gait. It's an essential stretch for those who sit.

Start on your stomach with your legs straight behind you and your chin touching the floor. Bend your elbows, and place your palms on the floor, as close to your body as possible. Take a deep breath in, and on the exhale, push up with your hands while pushing your pelvis into the floor. Concentrate on using your back muscles to lift your upper body. Hold this position for 10 seconds, and then lower yourself back to the floor. Repeat 8 to 10 times.





#### **Stretch 4: Psoas Series**

The psoas muscles flex your hips and help to stabilize and support your lower back. These are some of the most important muscles for steady upright standing and walking. Stretching them can improve your alignment and protect against fascial restrictions in your back and hips.

For the first part of this exercise, lie on a bed with your lower legs hanging down. Lift your right leg with your knee bent, and hold it up with your hands on the front of your shin, just below your knee, as shown. Straighten your left leg, pulling your foot down so you feel the stretch in the front of your hip. Be sure to keep your left knee straight and your left foot off the floor. Hold for 30 to 90 seconds. Return to your starting position and switch legs. Repeat three to four times on each leg.



For the second part of this exercise, remain on the bed. Keep your right leg down and pull your left knee up toward your head, hands behind your left thigh. Point your left toes away from your head, then point your toes toward your head, pushing your left heel away from your body by pushing your left hip down. (Visualize your waistline dropping on your left side.) Hold for 30 to 90 seconds. Do 3 to 4 repetitions on each side.



For the third part of this exercise, kneel on the ground. Your right knee should touch the floor, your left leg bent in front of you so your left foot is flat on the ground. Raise your right hand toward the ceiling and then bend your torso all the way to the left. Do four or five 20-second repetitions and then repeat on the other side.



#### Stretch 5: Three-Part Neck Stretch

This stretch focuses on three different sets of neck muscles: the muscles at the front, side, and back.

First, use the muscles of your neck to tilt your head to the right side. Then, with your right hand on top of your head, pull your head farther to the right. Hold for a long count of one, then go back to the center. Do 10 stretches, and then repeat on the other side.



Now turn your head 45 degrees to the right and tilt it slightly backward. Then place your right hand on the top of your head, and gently pull on your head to increase the tilt. Be sure your torso stays still so your neck is doing the work. Your head is the only thing that should move. Do 10 stretches, and then repeat on the other side.



Now, holding your head at the same 45-degree angle, move your head forward using the muscles of the neck. Then place your right hand on top of your head, and gently pull your head farther forward, pushing your ear toward your right armpit. Again, be sure your torso stays still. You should feel the pulling from the base of your skull right into your shoulder blade. Do 10 repetitions, and repeat on the left side.



#### Stretch 6: Cat Curl Yoga

This stretch works wonders for the fascia in your back and core. Start on your hands and knees, with your back straight. Taking a deep breath in, bring your back into an upside-down "U" shape by lifting your abdominal muscles, tucking your pelvis in, and pushing your nose toward your pelvis. Now, breathe out as you bring your spine into a right-side-up "U" by dropping your abdominal muscles, lifting your buttocks, and lifting your head in the direction of your buttocks. Keep your arms straight and stable so your body does not rock forward or back.

Note: If you find this stretch challenging, you can do a "half cat curl." To do this, simply do either the first or second part of the exercise—not both—and then return to a neutral position.





#### **Stretch 7: Hip Stretch Series**

This five-part stretch will give the fascia in your hip a good workout. Do five repetitions on each side. Be sure not to bend your spine during these stretches; the motion should originate from your hip.

First, lie on the floor. Using a yoga strap or belt, make a loop, and wrap it around the ball of your right foot. Now, holding the strap or belt in your hands, lift your right leg straight up in the air, giving it a gentle pull toward you at the top of the motion. Repeat on the opposite side.



This time, again using the strap or belt, lift your right leg and pull it toward your left shoulder. Use one or both hands on the strap or belt to guide your leg. Again, give the leg a gentle pull at the top of the motion. Repeat on the opposite side.



Now, holding the strap in your left hand, move your right leg toward the left side of your body at a 45-degree angle from the floor. Again, give the leg a gentle pull at the top of the motion. Repeat on the opposite side.



Next, holding the band in your left hand, lift your right leg straight up; then, moving your left arm out from your body, pull your right leg toward the left side of your body. Again, give the leg a gentle pull at the end of the motion. Repeat on the opposite side.

For the final stretch, you will not need the yoga strap. Lying on your back, bend your right knee. Now move the knee toward the opposite shoulder. Grabbing the knee with both hands, pull it gently toward the shoulder. Repeat on the opposite side.





#### **Stretch 8: Erect Sitting Tall Head Posture**

When you sit, you have a tendency to let your head jut forward. When you sit a lot, your myofascia contracts and adapts to that position.

This exercise is meant to stretch the myofascia to help reshape it, as well as to strengthen the muscles of the back of the neck to prevent that jutting forward. This is a great exercise to do in front of your computer; after you're done, try to maintain the tall posture when you resume your work.

Begin by sitting with your back off the chair and your butt as far forward as possible, which will roll your pelvis forward. Your feet should be flat on the floor. Your knees should be directly in front of your hips, not flared out, and should be bent at a 90-degree angle. Your hands should be relaxed and placed on your thighs.





Sit as tall as possible, with your abdominal muscles engaged—remember to breathe! (Use the belly breathing that you learned on page 65.)

Once you're in position, do this:

Part 1: Glide your head backward on your spine. It's important that you simply glide gently here. Gliding backward will make your chest puff out, which is fine. The goal of Part 1 is to have your head in back of your torso.

Part 2: From the backward glided position, tilt your head 10 or 15 degrees upward (looking skyward) by contracting the muscles of the back of the neck. Hold for 15 to 20 seconds. Repeat 10 times.

#### **Stretch 9: The Doorway Stretch**

This exercise will stretch the muscles and fascia of your chest and shoulders. In addition, it will help you build and maintain core strength.

Stand in a doorway and place your hands on either side of the doorframe at a comfortable height at or above shoulder level. Take an approximately six-inch step backward out of the doorway to reduce strain on your chest and upper back. Your feet should be shoulder width apart. Engage your abs, and keep your head and chest lifted. Now take a deep breath. As you exhale, lean against your hands, making sure you do not let your pelvis come forward. You could think of this as a Standing Plank.

Breathe naturally, and hold the stretch for a count of 20. Over time, increase the count to 60 seconds.

After the Doorway Stretch, you will feel open in your chest.



#### The Wall Exercise

This exercise will reorient your nerves and muscles to normal posture, strengthen your spinal muscles so they can help your fascia support an upright posture, train your abdominal muscles so they can work with your fascia to support correct posture, and strengthen the muscles on the back of your neck so you can hold up your head better.

To do the Wall Exercise, you need to have an empty area of wall with no pictures or knickknacks on it. Stand with your back to the wall. With your feet parallel and shoulder width apart, bring the back of your heels, your buttocks, and—if you can—your shoulders back to touch the wall. Make touching your shoulders to the wall your goal, even if you cannot do it yet.

If you can, also bring the back of your head back to touch the wall. Just be sure not to lift your nose. Your gaze should be straight on and your head level. If your head does not touch, that's okay; don't alter the angle trying to get your head to touch the wall.

If it's easy to get your head to touch the wall, do the advanced version of the Wall Exercise. If it's a struggle, do the basic version. In addition, apply a gentle, constant pressure to move your head in that direction. As you continue to do this exercise over days and weeks, eventually your head will touch. If your heels and buttocks cannot both touch the wall, step your heels an inch or two away from the wall.





BASIC: Hold the position against the wall, then take a deep breath in and let your belly inflate like a balloon. (You can also put your hands below your belly button and use your inhale to fill your hands with your belly.) On the exhale, pull your abdominals in and toward the wall. Breathe in through your nose and out through your mouth to release tension. Remember to keep your head touching or close to the wall. Do this for 10 breaths at first. If 10 repetitions is easy for you, do 20. If 20 repetitions is easy, move to the advanced version of the exercise.

ADVANCED: Follow the instructions for the basic exercise and add pushing your head into the wall without moving your torso. This activates the muscles in the back of the neck.

#### The Superhero Exercise

This exercise will strengthen the muscles of your lower and upper back so they can work with your fascia to create good posture, and strengthen the muscles at the back of your neck so you can hold up your head with more ease.

Lie on your stomach on the floor. (You can also do this exercise on a bed, but the firmness of the floor is preferable unless it causes you discomfort.) Place your chin on the floor, as far forward as possible, and make a T shape with your upper arms. Bend your elbows and bring your hands in line with your ears. Your legs should be parallel, with your feet spread shoulder width apart. From this position, take in a deep breath. Then, on the exhale, lift your head, legs, and arms, squeezing your shoulder blades together.

Continue normal breathing while you are holding this position, with no extraneous movement. You should feel your back muscles working to hold you up.

To start, hold the lift for a count of 10. As you get stronger, hold it for a count of 20, then 30, and so on. The goal is to eventually build up to 60 seconds. If you feel the Superhero Exercise is strenuous, build up the time very slowly. Three to four repetitions of 60 seconds is an excellent goal.



#### The Forearm Plank

This exercise will strengthen your core and back muscles so they can work with your fascia to promote good posture. In addition, it will strengthen your body overall so you can stand upright with ease.

Start on the floor on all fours. Lower yourself to your elbows, and rest your forearms and palms flat on the floor with your torso in a straight line. To begin, you may stay on your knees. As you get stronger, lift your knees and place your weight on the balls of your feet.

Hold the plank position for a count of 20 initially, and build to a count of 60. Do this just once per day.

TIP: Be sure to pull in your abdominal muscles, and don't collapse. After doing the Forearm Plank, you will feel that you worked your core, abs, and back. If you feel tension in your neck or jaw, consciously relax those muscles.



#### The Elbow Pushup

This exercise will open your chest, strengthen your midback, and bring your head behind your chest (which is especially useful if you need to reverse a collapsed posture).

Lie flat on your back with your legs straight. Push your elbows into the floor, bending them so your hands are pointing up toward the ceiling. Make sure your weight is evenly weighted and you are not leaning to one side or the other. From this position, take a deep breath and lift your chest to the ceiling by pressing your head and elbows into the ground. Your butt, feet, and head should stay on the floor.

**BASIC:** To begin, do one lift and hold it for a count of 20. Over time, build up to 60 seconds.



**ADVANCED:** Lift your arms into the air and balance on the back of your head and sacrum.

After doing Elbow Pushups, you will feel very open in your chest and feel that you have worked your upper back.







BAND EXERCISE VARIATION: Place the center of the band under your left foot and stand with feet shoulder width apart. Hold the ends of the band in your right hand, with your elbow at shoulder level and forearm parallel to the ground. Bending slightly at the waist, retract your right shoulder blade and raise your right elbow until the band is fully taut. Return to your starting position.

Do 10 to 12 repetitions, maintaining good form, and then repeat on the opposite side.

#### The Shoulder Opener

This exercise will counter a collapsed posture by opening your chest and shoulders and aligning your spine. It will also strengthen smaller muscles in your shoulder so they can work with your fascia to promote good posture. In addition, it will help you determine if one arm is weaker than the other and give you a means to remedy the disparity.

Stand with your feet shoulder width apart. Put a band under the inside of your left foot. Hold the other end of the band in your right hand, elbow lifted to shoulder height and forearm parallel to the floor. (Your left arm will simply rest on your side.) Now, rotate the arm holding the band so your hand is pointing straight up. Do ten repetitions on each side.





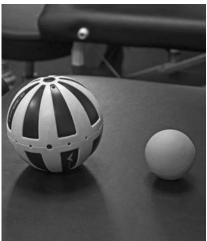




Incorrect posture

Correct posture

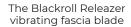




The Stick (in two different lengths)

The Hypersphere vibrating ball and a lacrosse ball







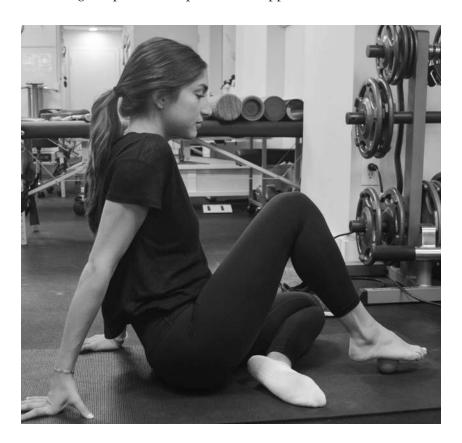
Three different types of patterned rollers



Four smooth rollers; the one on the left vibrates

## For Your Plantar Fascia (Ball)

Plantar fasciitis responds very well to rolling. For this exercise, use any small ball (a tennis ball works well). Sitting in a chair or on the floor, place the bottom of your right foot on top of the ball. Roll the sole of your foot forward and backward on the ball, gradually increasing the pressure. Repeat on the opposite side.



# For Your Plantar Fascia (Stick Roller)

While sitting down, lay the stick on the floor, and run the sole of your right foot forward and backward over it. Repeat with your left foot.



## For Your Plantar Fascia (Mini Roller)

Sit in a chair with the mini-roller under your foot, leaning forward so you put pressure on the bottom of your foot. Roll the mini-roller back and forth, exerting pressure onto the roller. When you find painful areas, stay on each spot for 15 to 20 seconds. Repeat on the opposite side.





#### For Your Calves (Foam Roller)

Sit on the floor with your left leg extended straight in front of you and the roller under your calf. Rest your right foot flat on the floor with your knee bent. Using your hands to press your hips off the floor, roll alongside the back of your calf, from your ankle to just below your knee. Next, do this exercise with your leg rotated in at a slight angle, then rotated out at a slight angle, so you can roll along both sides of your calf. Repeat on your right calf.

For deeper pressure, do this exercise with your legs crossed.





## For Your Calves (Stick Roller)

Sitting on the floor with your knees bent, place the stick roller under one calf. Holding the stick with your palms facing up, roll up and down the back of your calf. Next, slightly angle the stick so you can roll the inside and outside of your calf. Repeat on the other side.



## For Your Quadriceps (Foam Roller)

To work these muscles in the front of your upper legs, lie face-down on the floor with a long foam roller underneath your thighs. With your body weight on your forearms, roll yourself back and forth from the tops of your knees to your pelvis. Keep your feet off the floor the entire time.



## For Your Quadriceps (Stick Roller)

While sitting or standing, hold the stick across the front of your thigh and roll it up and down. Repeat with the other thigh.





# For Your Hamstrings (Foam Roller)

Sitting on the floor, place your upper thighs over the foam roller. Lifting your hips off the floor, shift your weight to your right leg. Roll over the roller, moving from below your hip to above the back of your knee and back. Repeat on the left side.



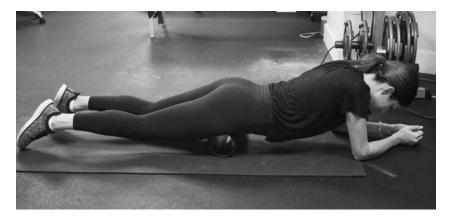
# For Your Hamstrings (Stick Roller)

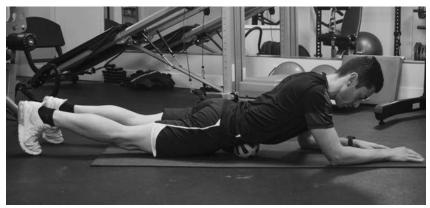
Sitting on the floor, hold the stick roller across the back of one thigh. Roll up and down, then repeat on the other side.



## For Your Hip Flexors (Foam Roller or Ball)

Start on your hands and knees, with the foam roller or ball placed under your hips. Lower yourself until your hip flexors are lying on the roller or ball. Now lean to your right side, placing pressure on your right hip flexor. Your right leg should be straight and raised slightly off the ground, while your left leg should be bent at an angle. (Keep your left foot on the floor to provide stability.) Roll up and down for 20 seconds. Repeat on the left side.





## For Your Iliotibial (IT) Bands (Foam Roller)

This is a great exercise if you're a runner and have problems with your IT bands, which run along the outsides of your thighs. Lie on your right side with the foam roller under your right hip. Cross your left leg over your right leg and rest your left foot on the floor with your knee bent. Using your right forearm to move your body up and down, roll along your outer thigh from your outer hip to just above your knee. Repeat on the left side.



## For Your Piriformis Muscles (Ball)

The fascia surrounding and infiltrating these flat, band-like muscles in your butt is a common site for restrictions and adhesions. To release them, try these exercises.

Lie on your back with your legs straight. Place a ball high on one side of your buttocks just below your waist. Lie on the ball for at least 20 seconds; longer is better. Repeat on the opposite side.



Sit with the ball under your right hip, right leg outstretched so that only the side of your right foot touches the ground. Bend your left knee, keeping your foot flat on the floor for stabilization. Lean onto your right side, and roll forward and backward along your outer hip and butt. Repeat, rotating your hips right and left as you roll. When you find a trigger point, stay on it for a full minute. Repeat on the opposite side.



For Your Piriformis Muscles (Stick)

Kneel with your left toes and knee touching the ground, right foot flat on the ground. Roll the stick up and down your butt from your waist into the midbuttock. Switch sides.



## For Your Lower Back (Foam Roller)

Note: If you have lower back injuries, do not do this exercise. Place a soft foam roller under your lower back. Roll your body up so the roller is under your hips. Use your legs to pull yourself up and down so you roll the area between your hips and upper back. Next, tilt your body to one side so you can work the sides of your back as you roll. Repeat on the opposite side. Roll for at least 30 seconds, working up to a minute each time.



## For Your Lower Back (Stick Roller)

Place the stick behind you at the small of your back and roll it slowly up and down.



For Your Lower Back (Ball)

Lie on your back with your right leg outstretched, left leg bent, and left foot flat on the floor. Place the ball under your left hip and lie on it for 20-30 seconds.



## For Your Upper Back (Foam Roller)

Place the roller under your shoulders and raise your arms over your head. Your knees should be bent, and your feet should be flat on the floor. Raise your hips off the floor so they form a straight line with your upper body. Roll up and down over your shoulders and upper back.



## For Your Upper Back (Stick Roller)

Hold the stick behind you at a diagonal, grasping the top of the stick with your right hand and the bottom of the stick with your left hand. Roll slowly back and forth over and around your shoulder-blades, in the direction of the stick. Repeat on the other side.





## For Your Chest and Triceps (Foam Roller)

Lie on your stomach with the foam roller next to one side. Place your arm over the roller so it's resting under your armpit. Slowly roll outward and back. Repeat on the opposite side.

Next, place one arm palm up and roll along the back of the upper arm. Repeat on the opposite side.





## For Your Lats (Foam Roller)

Lie on your side on the floor (preferably on a yoga mat) with the foam roller under your armpit and perpendicular to your body. Extend your bottom arm straight above your head. To provide support, bend your top leg about 90 degrees. Lift your core, and roll slowly from your armpits to the bottom of your ribcage. Repeat on the opposite side.



## For Your Forearms (Ball)

Place a ball on a flat surface such as a table or the floor, and position your right forearm over it, palm down. Roll up and down from your wrist to your elbow, as well as in a circular motion. Then turn your arm palm up and roll the outside of your forearm. Repeat with your left forearm.





Pettibon Cervical Stretching: This chiropractic stretch is very effective for relieving neck and jaw pains.





Cupping equipment and marks left by cupping



Taping the back to promote upright posture

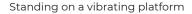


Taping the leg to reduce IT band pain

#### **VIBRATION**

One popular myofascial technique is whole-body vibration, which involves sitting, standing, lying, or doing exercises on a vibrating platform. The vibration puts all of your myofascial system in motion, giving you a head-to-toe workout. It's great for balance and circulation, and it's popular with athletes because it can improve balance and agility and help to prevent or treat muscle soreness after workouts. (As a bonus, vibration helps with building bone, which is why astronauts use vibrating platforms to counteract the bone-thinning effects of being in space.) Therapists might also use vibrating foam rollers or a vibration gun to target trigger points. Here is a vibrating platform we use at our clinic.







A lunge stretch on a vibrating platform



A forward stretch on a vibrating platform



Two different types of orthotics

# **APPENDIX**

# Fascia-Friendly Recipes

Feeding your fascia can be delicious! I asked Liana Werner-Gray, a nutritionist at our clinic and the author of *Cancer-Free with Food, 10-Minute Recipes,* and *The Earth Diet,* to share some of her favorite fascia-healing foods. Here they are:

## **CLASSIC GREEN SMOOTHIE**

Total time: 5 minutes • Makes 2 servings

1½ cups nut milk or filtered 1½ cups blueberries water (your choice) 1½ cups blueberries

2 cups kale 1 cup spinach

1 serving of chlorella or chlorophyll supplement

Put all the ingredients in a blender and mix until it reaches a smooth consistency.

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#### **GREEN LEMONADE**

Total time: 10 minutes • Makes 1 serving

2 apples 1 (roughly) thumb-size

1 large cucumber piece of ginger

1 large celery stalk ½ large lemon, peeled

Put all the ingredients in a juicer. Juice and drink.

Serve over ice cubes, if desired.

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#### **BERRY GREEN JUICE**

Total time: 10 minutes • Makes 1 serving

1 cup blueberries 1 handful of kale

1 cup strawberries 1 handful of fresh cilantro

1 small cucumber ¼ lemon, peeled

1 large celery stalk

Put all the ingredients in a juicer. Juice and drink.

TIP: Juice a 1-inch piece of turmeric with the other ingredients to boost the juice's anti-inflammatory properties.

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#### CHOCOLATE CAULIFLOWER SMOOTHIE

Total time: 10 minutes • Makes 1 serving

1 tablespoon cacao powder 1 cup frozen cauliflower 1½ cups almond milk 1½ large frozen banana

3 seedless dates or 1 tablespoon Pinch of sea salt

honey Dash of vanilla extract

Put all the ingredients in a blender and mix until it reaches a smooth consistency.

#### TIPS:

- Try adding a scoop of protein powder.
- To cut down the sugar intake, substitute an equal amount of frozen cauliflower for the frozen banana. (I prefer to use half cauliflower and half banana.)

#### **ENERGY TEA**

Total time: 10 minutes • Makes 2 servings

4 cups filtered water 1 teaspoon ginseng root or

1 teaspoon dried green tea leaves

powder

1 small handful of fresh

mint or 1 teaspoon dried mint

Boil all the ingredients in a saucepan for 5 minutes.

Strain the liquid as you pour it into teacups. Drink warm.

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#### **MEDITERRANEAN OMELET**

Total time: 10 minutes • Makes 4 servings

2 tablespoons extra-virgin 1 small handful of fresh parsley

olive oil 1 teaspoon minced garlic

8 eggs Handful of organic cheese

¼ cup olives, slicedor nutritional yeast1 cup spinachPinch of sea salt

1 small tomato, sliced

Heat the coconut oil in a large pan.

Whisk the eggs in a bowl, then pour them into the pan.

As the egg mixture starts to firm up, top it with the olives, spinach, tomato, parsley, garlic, cheese (or nutritional yeast), and sea salt.

When the bottom of the omelet is cooked and firm, use a spatula to fold it in half. Let cook until interior is at desired consistency.

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#### **ULTIMATE SUPERFOOD SMOOTHIE**

Total time: 10 minutes • Makes 2 servings

2 cups almond milk or ½ teaspoon mangosteen powder tigernut milk 1 teaspoon pomegranate powder

1½ teaspoons pure vanilla
½ teaspoon bee pollen

extract
½ cup blueberries
½ teaspoon spirulina

½ cup kale ¼ teaspoon cacao powder

½ cup broccoli sprouts
1 teaspoon coconut oil
1 teaspoon hemp seeds

1 tablespoon goji berries 3 seedless dates 1 teaspoon chia seeds

3 figs 1 teaspoon flaxseeds

½ teaspoon turmeric powder 2 cups ice

½ teaspoon maca powder

Put all the ingredients in a blender and mix until it reaches a smooth consistency.

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#### PROTEIN BALLS

Total time: 10 minutes • Makes 15 balls

7 tablespoons almond butter 3 tablespoons hemp seeds, ½ cup almond meal plus extra for topping

<sup>1</sup>/<sub>4</sub> cup collagen 3 tablespoons pumpkin seeds

5 tablespoons raw honey

or maple syrup

Mix all the ingredients until they are moist enough to stick together. If the mixture feels too dry to mold, add more water.

Form the mixture into balls, then roll in hemp seeds.

#### **BLUEBERRY CHIA SEED PUDDING**

Total time: 10 minutes • Makes 2 servings

1 cup fresh blueberries, plus 2 tablespoons honey or

extra for optional garnish maple syrup

2 cups almond milk ¼ teaspoon sea salt

½ teaspoon vanilla extract ½ cup chia seeds

Blend all the ingredients together except the chia seeds and garnish.

Add the chia seeds and then set in fridge for 9 minutes so the pudding can gelatinize. Check the consistency, and if it is not at desired doneness, let it set for an additional 20 minutes.

Serve with fresh blueberries, if desired.

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#### **ENERGIZING FIVE-INGREDIENT GREEN SALAD**

Total time: 10 minutes • Makes 1 serving

1 avocado 1 cup broccoli

1 cup fresh parsley leaves sprouts
1 cup fresh cilantro leaves 1 lemon

Chop the avocado into cubes. Place the cubed avocado, parsley, sprouts, and cilantro in a bowl. Squeeze the lemon over the salad, and mix gently.

#### TIPS:

- Add sea salt and pepper to taste.
- Include the stems from the parsley and cilantro for added nutrients.

#### SUPERFOOD KALE SALAD

Total time: 10 minutes • Makes 3 servings

1 bunch of kale, center ribs and stems removed (save the stems and ribs for juicing or eating

later)

1 avocado

1 tablespoon apple cider vinegar

1½ tablespoons flaxseed oil

34 teaspoon sea salt

4 tablespoons nutritional yeast

4 tablespoons sunflower seeds 3 tablespoons pumpkin seeds

½ teaspoon garlic powder

Tear the kale leaves into small pieces and place in a large bowl. Massage the avocado into the pieces of kale with your fingers, covering the kale with avocado.

Add the remaining ingredients to the bowl and stir, or continue to massage the mixture with your fingers, until everything is well combined.

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## CHICKPEA CUCUMBER CUMIN SALAD

Total time: 5 minutes • Makes 4 servings

For the salad:

1 cup chopped kale ¼ cup chopped spinach

1/4 cup chopped broccoli sprouts

1 large cucumber, cubed

One 14-ounce can organic

BPA-free chickpeas

For the seasoning:

1 teaspoon cumin ¼ teaspoon sea salt

Cracked black pepper, to taste

Smidgen of turmeric powder

1 tablespoon black seeds

For the dressing:

Juice of 1 lemon

2 tablespoons olive oil

Divide the kale, spinach, broccoli sprouts, and cucumber among 4 salad bowls. Drain the chickpeas and add those on top of the greens.

Mix the seasonings in a bowl and sprinkle evenly over each salad.

Mix the lemon juice and olive oil for the dressing. Pour over the salads and serve.

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#### ORANGE ARUGULA AVOCADO SESAME SEED SALAD

*Total time: 10 minutes • Makes 2 servings* 

#### For the salad:

1 orange, peeled and sliced 1 tablespoon roasted sesame seeds 2 cups arugula, torn into pieces

½ teaspoon black seeds 1 slice of purple onion, in wafts

Garnish with fresh parsley, 1 avocado, peeled and sliced cilantro, and ½ cup broccoli 34 cup snap peas

sprouts

#### *For the dressing:*

1 teaspoon sesame seed oil Juice of ½ lemon

2 teaspoons olive oil 1 tablespoon orange juice

Dash of sea salt and pepper

Layer the salads on 2 plates, starting with the orange slices. Then add the arugula, followed by the onion, the avocado, and the snap peas.

Make the dressing by whisking the ingredients together in a bowl and pour over each salad.

Finish by sprinkling the salads with the seeds, fresh herbs, and broccoli sprouts.

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# GRATED BEET AND CARROT SALAD WITH SUNFLOWER DRESSING

Total time: 10 minutes • Makes 2 servings

For the salad:

4 carrots 1 tablespoon fresh basil

1 small beet

*For the dressing:* 

3 tablespoons apple cider vinegar

1 tablespoon Sunbutter (sunflower seed butter)

Peel and grate the carrots and beet by hand or with a food processor. Slice the basil and add to a bowl along with the vegetables.

Mix the apple cider vinegar and Sunbutter in a separate bowl and whisk until thick and creamy. (You can also use the food processor for this step.) Pour over the salad and toss until well coated.

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#### KIDNEY BEAN SOUP WITH WATERCRESS AND KALE

Total time: 15 minutes • Makes 4 servings

1½ tablespoons coconut oil 2 cups kale, diced

1 brown onion, chopped 2 cups watercress, diced

1 teaspoon garlic powder ¼ teaspoon cumin 3 cups filtered water Black pepper to taste

1 cup vegetable broth Handful of broccoli sprouts

Two 15-ounce cans organic kidney beans, rinsed and

drained

Heat the oil in a large saucepan over medium-high heat. Add the onion and garlic powder and cook for 1½ minutes.

Add the remaining ingredients and cook for another 12 minutes. Season to taste with cracked black pepper.

Serve and top with broccoli sprouts.

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#### TURMERIC CUMIN QUINOA BOWL

Total time: 25 minutes • Makes 3 servings

1 tablespoon cumin One avocado, chopped into

½ teaspoon turmeric powder cubes

1 teaspoon sea salt One large cucumber, chopped

into cubes

1 teaspoon extra-virgin coconut

oil, extra-virgin olive oil, or ½ cup cilantro

sesame oil ¼ cup broccoli sprouts 1 teaspoon black pepper Strawberries, for garnish

1 teaspoon black pepper Strawberries

Dash cavenne pepper if you like (optional)

Dash cayenne pepper, if you like 4/2 lemon

Add the quinoa and  $2\frac{1}{2}$  cups of filtered water to a pot. Bring to a boil over high heat.

Reduce the heat to low, cover, and simmer for 15 minutes. The quinoa will absorb the water during the process.

Add the remaining ingredients and continue to cook, stirring occasionally, for another 3 minutes, or until the quinoa is soft and all the flavors are well combined. Add quinoa to bowls.

Place the avocado and cucumber alongside the quinoa in a bowl. Sprinkle with cilantro and broccoli sprouts, as well as strawberries if desired.

Squeeze lemon over each bowl, and it's ready to enjoy!

#### BAKED WALNUT-CRUSTED SALMON

Total time: 35 minutes • Makes 4 servings

1 cup walnuts, blended 1 teaspoon thyme

to a meal 1 egg

1 teaspoon sage 1½ pounds of skinless salmon,

½ teaspoon sea salt cut into 4 pieces

Handful broccoli sprouts

Preheat the oven to 380°F.

Prepare a baking sheet with parchment paper or a thin coating of coconut oil.

Mix the walnut meal, sage, sea salt, and thyme in a bowl. Beat the egg in a separate bowl and dip each salmon fillet into the egg. Press each fillet into the walnut mixture to coat on both sides. Place the coated salmon on the baking sheet.

Bake for 7 minutes. Turn the salmon over, and bake for another 7 minutes, or to your desired doneness.

Serve with a sprinkle of broccoli sprouts.

#### ZUCCHINI PASTA WITH BROCCOLI SPROUTS PESTO

Total time: 20 minutes • Makes 4 servings

4 zucchinis ½ teaspoon sea salt

1 cup fresh basil ½ cup spinach

½ cup broccoli sprouts 2 cups raw walnuts

Juice of 1 lemon ½ cup extra-virgin olive oil (or 4 garlic cloves more for smoother mixture)

Make thin strips of zucchini using a vegetable peeler or pasta machine. Set aside.

Place the remaining ingredients in a blender and blend until the pesto mixture reaches desired consistency. Add more olive oil, as desired. Set aside.

Distribute the zucchini evenly among 4 plates.

Pour the pesto sauce over the zucchini pasta and serve.

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#### MASHED CAULIFLOWER

*Total time: 15 minutes • Makes 4 servings* 

1 head of cauliflower, cut into bite-size pieces

1 tablespoon olive oil or coconut oil

Sea salt and pepper, to taste

Bring a large pot of water to boil. Add the cauliflower and cook until very tender, about 10 minutes.

Drain the water, then transfer the cauliflower to a food processor. Add the oil, sea salt, and pepper and process until smooth. (You could also mash the cauliflower by hand the traditional way, but a food processor will make sure the mash is extremely creamy.)

Add filtered water, more oil, or almond milk, until you reach the desired consistency.

TIP: Replace half the cauliflower with 1 to 2 white potatoes for Potato-Cauliflower Mash.

#### **BONE BROTH**

Total time: 30 minutes prep, 24 hours cooking • Makes 9 cups

Bones from 2 chickens (approx. 2½ pounds of chicken bones) or 2½ pounds of grass-fed

beef bones

2 tablespoons apple cider

vinegar

1 teaspoon sea salt

1 teaspoon turmeric

½ teaspoon black pepper

½ inch ginger root, peeled and

chopped

1 medium onion, peeled and quartered

½ head of broccoli, chopped into chunks

2 celery stalks, cut into thirds

2 carrots, peeled and halved

2 garlic cloves, smashed

1 bay leaf

2 rosemary sprigs

1 tablespoon dried oregano or oregano essential oil

20 cups filtered water

Add all the ingredients to a large pot and bring to a boil. Once the liquid is boiling vigorously, lower the heat, cover, and simmer for 24 hours.

Check the broth every few hours and stir. You will know it's cooked when you poke the bones with a fork and they fall apart and break.

When the broth is done, strain it through mesh so you are left with just the liquid. Discard the solids.

#### TIPS:

- You can also put the ingredients into a slow cooker and let the broth cook for 8 to 12 hours.
- Some people like to roast their chicken bones before boiling them for a smoky flavor. You can also buy two organic rotisserie chickens instead of roasting your own.
- If you store bone broth in the fridge, it will set hard, which is a good sign that the marrow nutrients came out of the bones. It will become liquid again once heated.
- Store in the fridge for up to 6 days or in the freezer for up to 4 months. If freezing, allow extra room in the container, as it will expand when frozen.

# RECOMMENDED RESOURCES

#### **Videos**

The Mysterious World under the Skin

A fascinating 42-minute documentary, free on YouTube, that explores state-of-the-art fascia research.

Fascia Research Congress

Enter the search term "Fascia Research Congress" in YouTube, and you'll discover a wealth of free videos by leading researchers in the fascia movement.

#### **Books**

Fascial Fitness: How to Be Vital, Elastic, and Dynamic in Everyday Life and Sport, by Robert Schleip (with Johanna Bayer), Lotus Publishing, 2017

A fun, easy-to-read book by one of the leading researchers in the fascia community.

Fascia in Sport and Movement, edited by Robert Schleip, Handspring Publishing, 2015

An outstanding guide for athletes, coaches, trainers, and therapists.

Anatomy Trains, by Thomas W. Myers, Churchill Livingston, 2014 An excellent resource for professionals who want an in-depth look into the anatomy and physiology of the fascia.

Fascia: What It Is and Why It Matters, by David Lesondak, Handspring Publishing, 2017

A good next step for both lay readers and professionals who want a deeper understanding of the fascia.

The MELT Method, by Sue Hitzmann, HarperOne, 2013

A step-by-step guide to Sue's method (for more on the MELT Method, see page 129).

Quench: Beat Fatigue, Drop Weight, and Heal Your Body through the New Science of Optimum Hydration, by Dana Cohen, M.D., and Gina Bria, Hatchette, 2018

An eye-opening look at why dehydration is epidemic and how it affects all areas of the body, including the fascia.

The Earth Diet (2014), Cancer-Free with Food (2019), and 10-Minute Recipes (2016), by Liana Werner-Gray, Hay House

Three highly recommended resources for readers interested in optimizing their health—including the health of their fascia—by making smart food choices.

A Headache in the Pelvis, by David Wise and Rodney Anderson, M.D., Harmony, 2018

An absolute must-read if you are one of the millions of men and women suffering from unexplained pain in the pelvic region.

#### Websites

Jean-Claude Guimberteau, M.D. www.guimberteau-jc-md.com/en/

Robert Schleip, Ph.D., Somatics www.somatics.de/en/schleip

Tom Myers, Anatomy Trains https://www.anatomytrains.com

Aaron Mattes, M.S., Stretching USA https://www.stretchingusa.com

Alice Norton, MPH, low-oxalate diet https://sallyknorton.com

Antonio Stecco, M.D., Hands on Seminars https://www.handsonseminars.com/our\_team/dr-antonio-stecco

Sabrina Atkins, D.C., Orlando Sports Chiropractic www.orlandosportschiropractic.com/meet-dr-sabrina

Ida Rolf Institute https://rolf.org

Environmental Working Group (EWG). (Check out their "Dirty Dozen" and "Clean Fifteen" lists, as well as the Skin Deep Database.) https://www.ewg.org

#### Conference

The Fascia Research Congress meets regularly to disseminate the latest findings in the field. For information, see https://fascia congress.org.

# **ENDNOTES**

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