

# DEEP TISSUE MASSAGE TREATMENT

SECOND EDITION

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DEEP TISSUE MASSAGE TREATMENT, Second Edition

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# PREFACE

*“Skepticism is as much the result of knowledge, as knowledge is of skepticism. To be content with what we at present know, is, for the most part, to shut our ears against conviction; since, from the very gradual character of our education, we must continually forget, and emancipate ourselves from, knowledge previously acquired; we must set aside old notions and embrace fresh ones; and as we learn, we must be daily unlearning something which it has cost us no small labour and anxiety to acquire.”*

*-Theodore Alois Buckley*

According to the 2010 AMTA Industry Fact Sheet, 77 percent of massage therapists report offering deep tissue massage as one of the modalities they offer. Most schools have a portion of their curriculum dedicated to the application of deep tissue massage. This book was written to address the desire and need to better support the teaching and understanding of what deep tissue massage is and how to appropriately integrate it into the services massage therapists offer.

*Deep Tissue Massage Treatment* is comprised of two distinct and separate parts. The first four chapters are written to provide the reader with historical and theoretical backgrounds. It is necessary for the massage therapist to understand the how's and why's of application before the techniques can be applied in the most beneficial manner. The second part, which includes Chapters 5 through 10, reviews some of the basic anatomy of the body by region and some common pathological conditions experienced in each of these regions. Sample sequences are presented for a visual application of some of these techniques.

A few texts are available on the subject of deep tissue massage and many of these texts emphasize the techniques used. Few of these books emphasize the theoretical applications of these techniques. *Deep Tissue Massage Treatment* presents a review of the forces a massage therapist applies to the body, assessment approaches and a brief history on other modalities which are used to create a superior massage session for both the massage therapist and the client.

This edition has received several additions and updates. The theoretical and historical information in Chapter 1 offers a more detailed approach to the benefits and applications of deep tissue massage. The assessment section has more information and supportive documentation to aid you in the assessment of each client. The modalities presented in the first edition have been combined into Chapter 3 and updated with more information on each technique and approach to care. A chapter on proper tools and techniques (Chapter 4) has been added to help prevent stress and injury to the therapist. All the pathologic conditions presented in the first edition now include a brief background in the pathology and are sectioned off by body region rather than by condition. A brief overview of

the anatomy is included to help you understand how the body works as a whole and may contribute to a particular condition. New images and videos on the Evolve site have been added to support each sequence in this book. Anatomical images have been used in each chapter to help visualize the information being presented in this book.

This book will be a key resource to have in your office, massage room or at home. In the appendix, you will find quick resource guides for common charting forms, terminology and trigger point referral patterns. Chapter 2 focuses on assessments and documentation for a deep tissue massage therapist and is accompanied by blank forms in the appendix for your use with clients. Chapter 3 provides historical and theoretical overviews of common modalities and techniques used during a deep tissue massage session. Proper use of your hands, elbows, forearms and fingers can be found in Chapter 4 to help prevent stress and injury to you as a therapist and aid in a long and rewarding career in the massage industry.

This edition includes multiple appendixes designed for your use. They contain blank intake forms, assessment forms and a variety of charting forms that can be copied for your use in the office. They also have a quick reference chart of common trigger points and pain referral patterns for a visual guide.

This text also comes with the Elsevier Evolve site as an ancillary at <http://evolve.elsevier.com/Simancek/deeptissuemassage/>. The site includes an instructor's manual, a 200-question ExamView test bank, an Image Collection, the appendixes, and downloadable forms. For convenience, all the videos on the pathologic conditions have been posted to the Evolve website for easy access from your home or office, making it easier to reference important material when you need to.

Deep tissue massage therapy is a diverse and functional approach to addressing the chronic short muscles of the body. Postural muscles are under a lot of stress and are working hard through the day. Alleviating the tension in these deeper tissues will provide your client with relief and comfort. When applied properly, deep tissue massage relieves stress, tension and pain from the receiver. Strong knowledge in anatomy, physiology and kinesiology is important to a successful massage session. Using the most appropriate hand position and technique for the body part you are working will save your body from stress and hard work. Work through the layers of the muscle, do not force the tissue, be patient and let the body soften and allow you access to the deeper structures. Utilize this book and continue to practice and fine-tune your techniques and you will take your clients to a new level of pain reduction and stress reduction.

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## ABOUT THE AUTHOR

Jeffrey Simancek has been in the health and wellness industry for 20 years. He has worked as a personal trainer and managed health and fitness centers, practiced massage therapy as an independent contractor, taught massage therapy courses, and has written and managed curriculums for massage therapy. He has a Bachelor of Science in Health Science, with an emphasis in Exercise Science from Grand Valley State University. He is a NCBTMB certified Massage Therapist, California Certified Massage Therapist, and is a NCBTMB Approved Continuing Education Provider. He has worked in Physical Therapy Clinics, Fitness and Yoga centers, Chiropractic offices and still maintains his private practice and teaches for a local school.



## CHAPTER

# THEORY

### OUTLINE

*Theoretical Approach*

*Forces Applied to the Body*

*Compression*

*Tension*

*Torsion*

*Shear*

*Bend*

*The Nature of Tension and*

*Discomfort*

*Emotions and Deep Tissue Massage*

*Approach to Deep Tissue Massage*

*Benefits of Deep Tissue Massage*

*Summary*

### KEY TERMS

*bend*

*compression*

*deep tissue*

*gravitational forces*

*homeostasis*

*mechanical forces*

*modalities*

*pain-spasm-pain cycle*

*shear*

*stress*

*stressor*

*tensile force*

*tension*

*torsion*

### OBJECTIVES

- 1 Discuss definitions of *deep tissue massage*.
- 2 Understand what is meant by *deep tissues*.
- 3 Explain the forces that act on the tissues of the body.
- 4 Understand how tension works.

**D**eep tissue massage therapy is one of the most frequently requested services in the massage profession. Many massage therapists recognize this and offer this modality. **Deep tissue** massage is commonly misunderstood and it can be unclear whether clients are requesting a deep tissue massage session or are asking for a massage with stronger pressure. Many clients often associate deep tissue massage with pain, hard or strong pressure, and often invasive massage techniques. Although there is a level of truth to this association, a good deep tissue session should not cause pain or discomfort. There may be a delayed onset of muscle soreness; however, any type of massage approach can cause this. Many schools often teach deep tissue massage as a technique that uses increased pressure to access the deeper layers of the tissues, often inadvertently overlooking the diverse applications of deep tissue massage techniques.

In this book we explore approaches to the applications and approaches to accessing the deeper tissues of the body. In Part 1, we explore the theoretical approaches like force, nature of tension, and pain and benefits of deep tissue massage.

We also look at the importance of postural, functional, and gait assessments as well as some of the common **modalities** that are important to deep tissue massage. Part 1 ends with an overview of the tools and techniques used during deep tissue sessions. Part 2 breaks the body down into smaller regions and addresses common pathologic conditions experienced in those regions for which a deep tissue approach may be beneficial.

## THEORETICAL APPROACH

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As a modality, deep tissue massage focuses on addressing the muscular complaints that are rooted in the deeper layers of the musculoskeletal system. Deep tissue massage should not be viewed as a separate modality, but rather as the use of several different techniques of therapeutic massage to enhance the overall outcome of the session. Deep tissue massage is a mindset, an intention, and an approach using the tools and talents possessed by a therapist to address specific musculoskeletal complaints (Figure 1-1).

Deep tissue massage is one of the most versatile and effective techniques for musculoskeletal complaints. It integrates techniques from Swedish Massage, Therapeutic Touch, Neuromuscular Techniques, Myofascial Techniques, and Structural Integration to address all levels of the body. A deep tissue session uses



FIGURE 1-1 ■ Deep tissue massage.

techniques from these foundational approaches to work through the layers of the body as needed to reach the target muscle. Deep tissue integration is effective because it is an outcome-based approach and uses the techniques necessary to reach a desired outcome. Knowledge and understanding in anatomy, physiology, and kinesiology is extremely important in deep tissue approaches.

## FORCES APPLIED TO THE BODY

Kinesiology and pathology are important tools to understand some of the causes for the muscular pain and holding patterns expressed by the client. Understanding the forces that play on the body helps in the application of the proper techniques to help with pain management and aid in the restoration of **homeostasis**. There are two primary classifications of forces that play on the body. These are *fields* and *mechanical forces*. Fields are forces like magnetic and electrical forces, which we have limited control over. **Mechanical forces** such as resistance and gravity are forces we have some control over. These forces can be the cause of the injury, but can also be applied to the body to remove the restrictions and tension that is causing the pain. Five main types of mechanical forces are applied to the body: compression, tension, torsion, shear, and bend.

### COMPRESSION

**Compression** occurs when two or more structures are pushed together. This occurs with most massage strokes, but it also occurs in everyday life and injuries. Compression as a force can be beneficial or detrimental to the body (Figure 1-2).

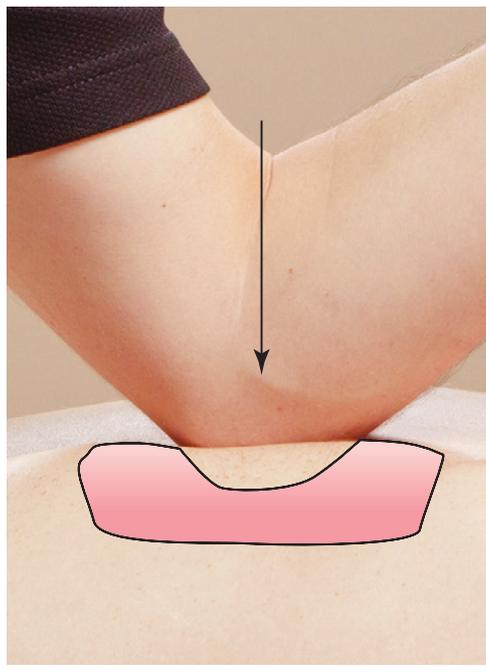


FIGURE 1-2 ■ Compression.

Many structures are susceptible to the effects of negative compressive forces. Nerves may become impinged between bone and muscle or compressed between muscles. The vertebrae are under constant compressive forces when standing and because of poor posture. Whether structures are pinched between bone and muscles, bone and bone, or by a narrowing of the passageways they travel through, the end result can be numbness and tingling or potential degenerative and compressive disorders.

Compression may be applied in beneficial ways as well. Ischemic compression is often applied to help dilate the vessels to encourage local circulation. Direct static pressure is used to help with muscle release and local congestion and is found in modalities like zone therapy, reflexology, trigger point therapy, shiatsu, and others.

## TENSION

Although **tension** is often synonymous with **stress**, this is not the only manner in which it affects the body. Tensile forces are experienced throughout the day and in every activity. A **tensile force** is when the ends of the object are being pulled in the opposite direction from each other (Figure 1-3).

This is the force that is applied during any elongation or stretching motion. Injuries such as sprains and strains are examples of tensile forces applied to the body in a sudden or extreme manner. The sudden elongation or hyperextension of the area can result in ligamental, tendon, muscle, or bone damage.

When tension is applied properly, it can be used as a preventative, rehabilitative, or general health approach. When working the ends of the range of motion, we are applying tension to the muscle to encourage its elongation potential. Static stretching, postisometric relaxation, reciprocal inhibition, and proprioceptive neuromuscular facilitation are some techniques that use tensile forces to increase function and range of motion.



FIGURE 1-3 ■ Tension.

## TORSION

**Torsion** is the application of a twisting or turning force to an object. This twisting force most often involves movement in one direction at one end of an object and stability or movement in the opposite direction at the other end (Figure 1-4A). During this movement both tensile and compressive forces act on a specific area at the same time (Figure 1-4B).

Twisting force applied to a structure that is not as pliable, such as a bone, may result in spiral fracture. If torsion is applied to a joint such as the knee, it may result in damage to the meniscus or tears to the ligaments.

When applied with appropriate force, torsion can be a beneficial technique. Many kneading techniques use torsion forces to help loosen and soften the muscle tissue.

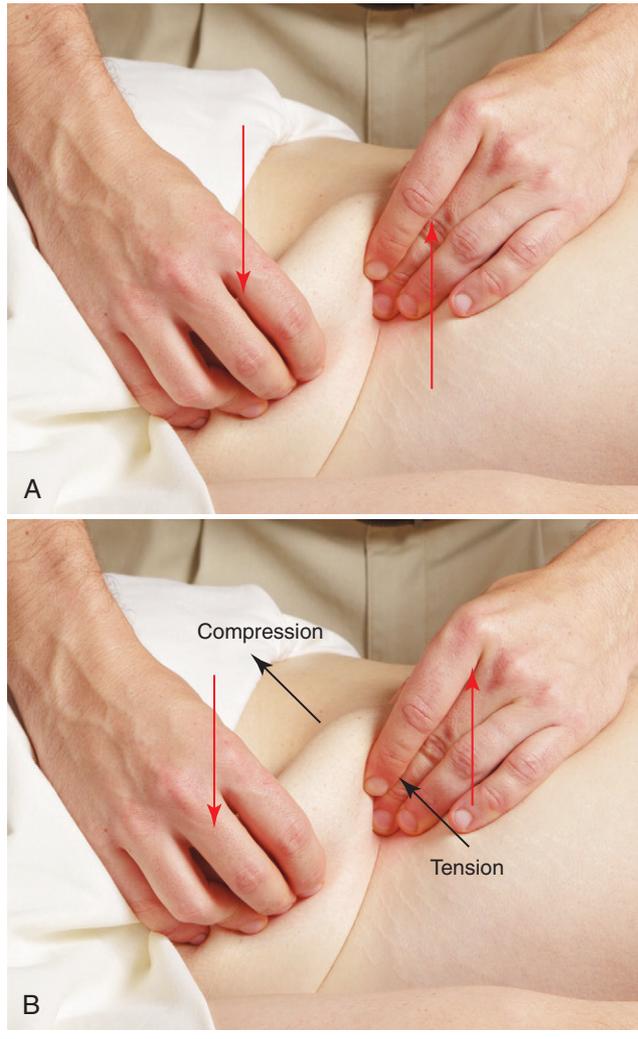


FIGURE 1-4 ■ A and B, Examples of torsion.

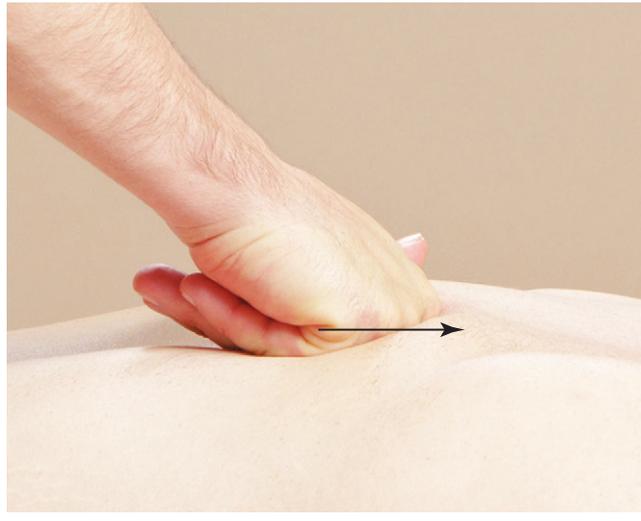


FIGURE 1-5 ■ Shear.

## SHEAR

**Shear** forces are common throughout everyday activities. The act of squatting to pick up a box, walking downhill, and many sports involve shear forces. A shear force is when two structures slide across each other and create friction. This force, if repeated often, can result in adhesions or fibrosis within structures such as tendons (Figure 1-5).

Many common pathologic conditions result from repetitive shear forces such as tendonitis and inflammatory disorders. If shear force is applied suddenly and in excessive amounts, ligament and joint tears may occur. Anterior cruciate ligament tear is an example of damage caused by shear force.

Massage therapists apply shear force in many of their techniques. Most gliding, stripping, and friction strokes use shear forces to help break adhesion and realign fibers. Depending on the depth of pressure and direction of application, shear forces can have a diverse array of effects.

## BEND

**Bending** forces are also a result of compression and tension combined in one action. Bending involves an external force that is applied perpendicular to the axis of the object. Much like torsion, a compressive force is applied to one side of the object while the other side is exposed to tensile forces (Figure 1-6).

The main difference between bending and torsion is in the directions of the application of force. Bending is a linear force, whereas torsion is more of a rotational force. Many kneading techniques involve the application of bending because soft tissues are not as susceptible to the dangers of this force. Proprioceptors like Golgi tendon organs and muscle spindle cells are receptive to this force.

Bending forces are more dangerous to the more dense structures like bone. Many causes of bone breaking are attributed to a bending force. Many lateral and medial collateral ligament tears and ruptures are attributed to bending and shear forces combined.



FIGURE 1-6 ■ Bend.

## THE NATURE OF TENSION AND DISCOMFORT

To better assess and treat musculoskeletal pain, there must be an understanding of where the discomfort and pain originate from. Many of the complaints that clients experience originate from the deeper musculature that are primarily used for stabilization and posture. Our daily activities and lifestyles tend to put demand on our musculoskeletal system, which often leads to chronic patterns of tension and stress. Workers who sit at a desk all day often experience shortening and tightening of the hip flexors, mill workers experience repetitive stress to the shoulder, and tennis players experience repetitive stress to their elbows.

Naturally occurring forces like gravity create stress and tension throughout the body, especially on the joints and musculature that support and stabilize the body. Sitting in front of a computer with one's head leaning forward and increased kyphotic curvature forces the deep erectors of the spine to work harder to maintain the position and compensate the load being applied to the body (Figure 1-7A). The same can be seen with people who wear backpacks over one shoulder or women carrying heavy, large purses (Figure 1-7B & C). These changes in position are due to the **gravitational forces** on the body and the muscular compensation to maintain balance. Prolonged exposure to these positions trains the deep postural muscles to be hypertonic.

Another cause of muscular tension results from chronically contracted muscles and the neurologic patterns that they create. Constant contraction or repetitive movements result in shortened muscles, which can lead to pain and restricted motions, and can create postural holding patterns. These neurologic and muscular changes are a natural defense mechanism of the body to defend itself from further injury and perceived threats. As muscle tension builds, pain and stiffness increases. With this increase, people stop moving the area or compensate to try to stop the pain. This process is often referred to as the **pain-spasm-pain cycle**. The lack of movement decreases the circulation to that area, which affects the transportation of nutrients and removal of waste products, which may delay the healing process.