

introducing
"Gold
Needle"
acupuncture:
the lamina points,
the facet points,
and a method
for needling them

By Mary J. Rogel, PhD, LAc

The purpose of this article is to introduce "Gold Needle" Acupuncture, to formally name two sets of experience points, and to describe a method for using them. "Gold Needle" Acupuncture is a treatment method for the tendons and ligaments more so than the meridians or the muscles. It is based on the idea that the body is a remarkably flexible structure, capable of twisting and reshaping itself along the pathway of least resistance to the most efficient form possible, given a particular pattern of physical restrictions. The primary reason for calling this type of acupuncture "Gold Needle" Acupuncture is that the main tool used is the #8 Seirin needle, the "gold" needle. Two sets of experience points that I am calling the "Lamina Points" and the "Facet Points" are most effectively treated with the "gold" needle, and I will explain a particular technique for needling these points to restore lost function, reverse painful structural compensations, and treat orthopedic as well as general medicine problems.

The spinal column is a rich motherlode of acupuncture points. In addition to the Governing Vessel points and *hua to* points, both Bladder lines are nearby. There are two other sets of points along the spine that I wish to formally introduce and name. They are best identified by their anatomical locations. The Facet Points are located at the facet joints, and the Lamina Points are located on the laminae of the vertebrae, near the spinous processes. Alon Marcus refers to both of these sets of points by their anatomical locations (1), and Matt Callison identifies the Lamina Points as motor points in his classification system (2). These points, especially the Lamina Points, are very powerful points for affecting structure and function, for relieving pain, and for affecting the meridians and organs. For the most part, they are in safe locations, where there is little chance of causing injury. For all these reasons, I believe it is time to formally name these points and introduce them into regular usage by acupuncturists.

The Facet Points

The spinal column is composed of a set of vertebrae stacked one upon the other, much the way a column of blocks is stacked one upon the other. The spine, though, is a special, curved stack in which each vertebra is a unique shape and occupies a unique location in the column. The vertebrae articulate with one another by virtue of the facet joints that connect them. Each vertebra has four facets, two at the upper end of the vertebra (right and left) and two at the lower end (right and left). The two upper facets articulate with the lower facets of the vertebra above it; and the two lower facets articulate with the upper facets of the vertebra below it. Therefore, each of the four facets forms half of four separate joint capsules; and each vertebra contributes to the formation of four facet joints.

Two stacked vertebrae, and the disc between them, are considered to be a “motion unit.” This unit contains two complete facet joints, one on the left and one on the right. The stack of motion units enables the spine to flex, extend, rotate, and sidebend. Any limitation of movement in a facet joint will affect the range of motion in the entire motion unit. Needling the facet joint capsules can restore motion to the unit.

It is extremely difficult, and not necessary, to needle into the joint capsules of facet joints. It is sufficient to insert the needle into the ligamentous portion of the capsule or into the area just distal to the capsule (in the tendons and ligaments that attach to or near the joint capsule) in order to ease the restrictions in the joint. This area, at or just distal to the facet joint capsule, is what I am calling the Facet Point (FP). Facet Points are numbered according to the location of the inferior facets, similar to the manner in which the Bladder Points are numbered. For example, the Facet Points of L3 refer to the facet joints at the inferior end of the vertebra and are designated “FP L3.”

The Lamina Points

Needling the Facet Points requires that the acupuncturist be able to locate the joint capsule and place the needle close to the capsule. Facet joints can be difficult to find, and their location varies according to the shape of the vertebra being needled. The facet joints of lumbar vertebrae are in a different location than the facet joints of thoracic vertebrae, for example, because of differences in shape but also because of differences in depth and angle, due to variations in their position on the spinal curves. Cervical vertebrae are so small that the facet joints are very hard to find, and the cervical nerves and vertebral artery are close enough to the facet joints that the acupuncturist has to worry about puncturing them by accident, especially when the patient’s neck is swollen and rotated, as it would be with whiplash.

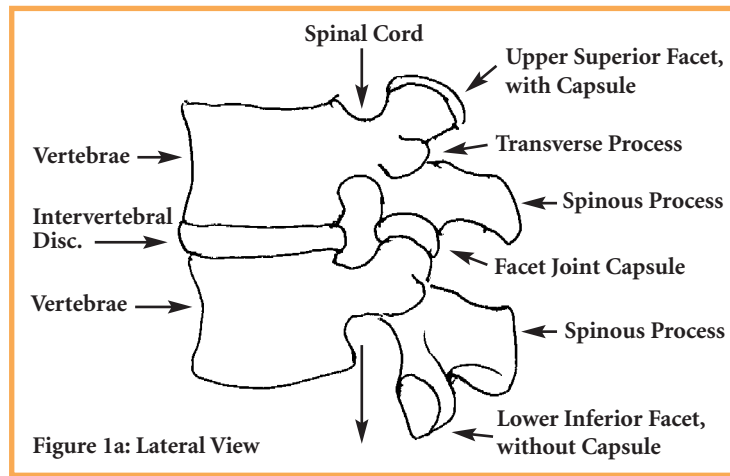


Figure 1. Motion Unit, consisting of two vertebrae and the disc between them (disc shown in Figure 1a). Each motion unit has a right and left facet joint (see Figure 1b), and each joint is surrounded by a ligamentous capsule (capsule shown in Figure 1a).

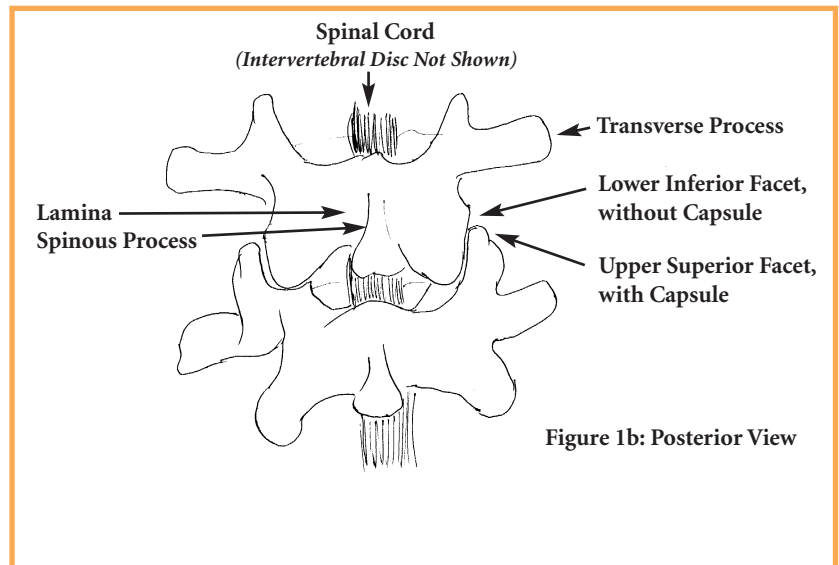


Figure 1b: Posterior View

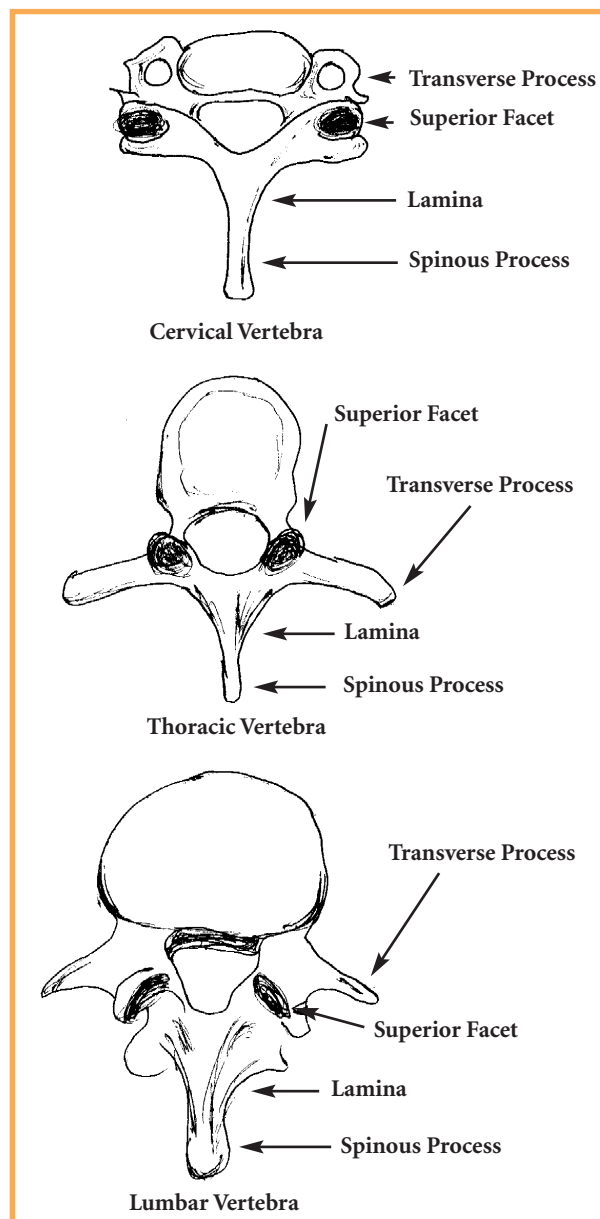
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An alternative set of points is available that has none of the problems of the Facet Points and appears to be even more powerful in restoring motion to the spine. These are the Lamina Points, which are located on the laminae, beside the spinous processes. Each vertebra has two Lamina Points, one right and one left. Instead of being located between the vertebrae (as are the Facet Points and the *hua to* points), the Lamina Points are located on the vertebrae, making them much easier to find. The spinous process is the most prominent feature of the vertebra, regardless of its depth or angle in the spinal column.

Many muscles, tendons, and ligaments attach to the spinous processes, affecting motion at the individual vertebra as well as motion in the entire spine, the trunk, and extremities, depending on which vertebra is being needled. Furthermore, needling beside the spinous process directs the needle toward bone, specifically toward the lamina of the vertebra, hence the name "Lamina Points." Consequently, these points are the safest of all the spinal points, the easiest to locate, and possibly the most effective.

Figure 2.
 Comparison of articular planes of
 cervical, thoracic, and lumbar facets.



The exact location and the precise angle of the needle can be varied somewhat according to the problem being treated; but, in general, the needle should be directed slightly inferiorly to avoid accidentally puncturing the spinal cord. Extreme caution must be exercised when treating a patient who has had a laminectomy at the vertebra being needled. In a laminectomy, the lamina has been removed, exposing the nerve to direct contact with the acupuncture needle if it is inserted too deeply.

The Sacrum - A Special Case

The sacrum is formed in the embryo when the vertebrae at the bottom of the lumbar spine fuse into a single bone. These fused vertebrae retain their spinous processes, but they lose their facet joints. Only one set of facet joints remain, those at L5-S1. Technically, the fused vertebrae no longer have laminae, but it is clinically useful to imagine the Lamina Points continuing down the spine into the sacrum, at least to the level of S3.

The sacrum functions as a central location onto which many tendons, ligaments, and fascial planes are anchored. They overlap and intertwine, stretching out in all directions from the sacrum. Contractions in the tissues that attach to the sacrum can be palpated and treated at the Lamina Points of the sacrum. Consequently, they are very useful points for treating all types of back pain and sciatica.

The numbering system for identifying Lamina Points is anatomical. The Lamina Points (LP) are designated by the number of the vertebra on which they are located. For example, the Lamina Points of C6 are designated "LP C6," and the Lamina Points of L5 are designated "LP L5."

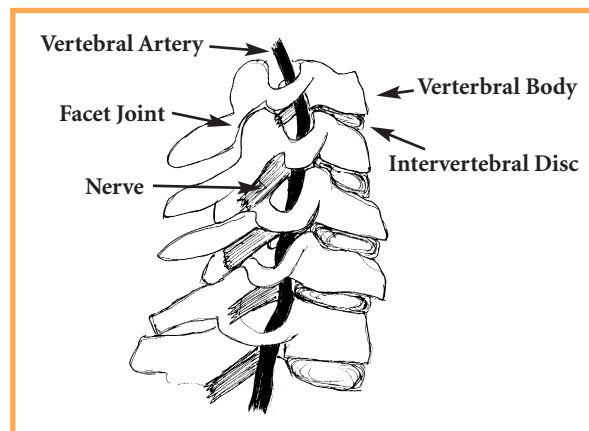


Figure 3.
Cervical Spine, Lateral View, showing vertebral artery, nerves, and facet joints.



Figure 4. Lamina Groove

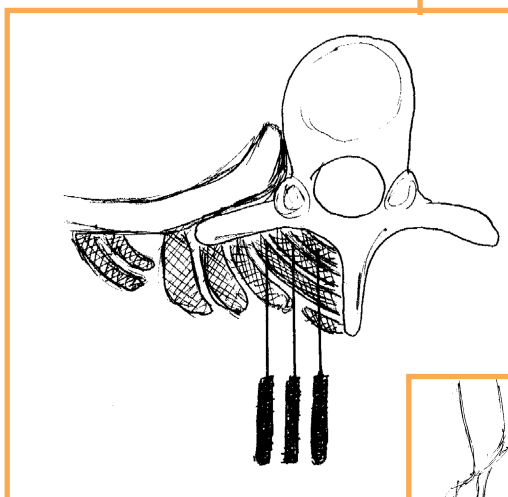


Figure 5. The Sacrum

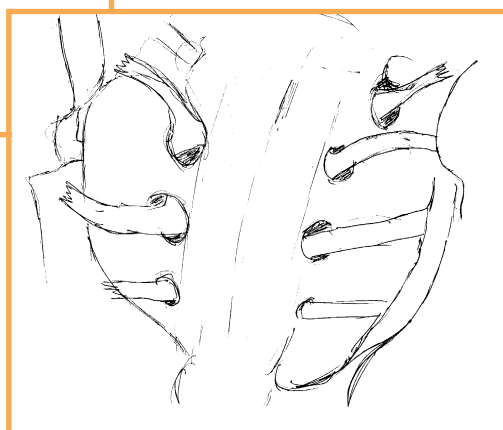


Figure 6. The Sacrum, showing extension of Lamina Groove

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Choosing a Needle

All Lamina Points and Facet Points, regardless of their location on the spine, are most effectively needled using the Seirin #8 "gold" needle. Patients consistently find Seirin needles the most comfortable, both on insertion and on removal. On occasion, I have tried different brands of needles, unbeknownst to the patient. Every time, the patient has commented on how different the needles feel that day, specifically that they are painful when they usually do not hurt.

A heavy gauge #8 needle is needed for needling the tissues at the laminae and at the facets because these are tough, fibrous, strong tissues, or they are very short muscles nestled into bony curves. These tissues do not stretch as readily as muscles stretch. Yet, they must be over-stretched in order to release spasms in them. It requires a heavy needle to over-stretch tough tissue. It is tempting to be "kind" to the patient and use a thinner gauge needle, but, in the end, this is a mistake. When the needle has been inserted into gnarly, contracted tissues, the tissue will contract more. Thinner gauge needles will bend under the forces of these contracting tissues, causing micro-tears and strong, painful contractions. A heavy needle is required to "overpower" the contracted tissue. A heavy needle is less likely to bend under the contractile forces, meeting the force that the tissue is exerting upon it.

In addition to being more comfortable than most needles, Seirin needles have solid, unbending, plastic handles that are securely fixed to the needle shaft. The needling technique used involves pulling the needle with strong pressure. In order to control the needle properly, you need a handle that does not bend. In addition, you do not want to take any chances that the handle will separate from the needle shaft. The deep tissues are very strong and tend to suck the needle downward. If the handle separates during this process, you could have an emergency situation requiring surgical removal of your needle. In nearly 15 years

of needling with Seirins in this manner, I have never had a handle separate from the shaft. However, daily I have #8 shafts that have been bent by the forces of the deep tissues. This is not painful, but it can be disconcerting (although some patients like the idea that they can bend the needle).

While Seirin has consistently high quality needles, they offer few choices of length and gauge in their heavier needles. A #10 gauge needle is preferable in many situations, but Seirin markets its #10 needle only in Japan. With respect to length, Seirin now markets only 30 mm and 50 mm #8 needles. Several years ago, they removed the 40 mm and 60 mm lengths. Consequently, some points are virtually inaccessible on some patients, and great care must be taken when needling others because the tissues tend to suck the needle in deeper after it has been placed. Longer and heavier needles are safer and more effective, and they hurt less.

Needling Technique

Effective needling of the Facet Points and the Lamina Points requires two hands. Use your dominant hand to manipulate the needle, and use your non-dominant hand to stabilize the superficial tissues and monitor deep tissue changes. Locate the Facet Point or the Lamina Point precisely prior to inserting the needle. “Fix” the tissues at the point by pressing firmly with the forefinger and middle finger of your non-dominant hand. Position the pipette between these fingers, and insert the needle. Pain on insertion can be avoided by inserting the needle quickly through the skin. After the needle has passed through the skin, continue inserting it until you can feel the deep tissues grab the needle. The needle should be firmly held by the deep tissues. For the most part, it is neither necessary nor desirable to insert the needle to the bone.

Test for firmness of placement by continuing to press with the fingers of your non-dominant hand and tugging on the needle with your dominant hand. If you can feel the deep tissues under your monitoring fingers being pulled toward you, then your needle is placed correctly. If the needle slides out as though you have needled butter, then either the tissues released immediately upon insertion (which can happen) or your needle is not in an effective location. If this happens, or if the needle is painful to the patient, remove it and reinsert it.

Once the needle is in place, you have the option of leaving it there or working it and removing it quickly. If the tissues pull very strongly on the needles, then it is a good idea to leave the needles in place for a while. Use liniments such as Zheng Gu Shui and/or Shiling Oil to increase circulation and decrease inflammation, and administer moxa or use another source of heat. If heat is to be used while the needles are in place, it is important to warm the tissues only slightly. The purpose of heat is to relax the tissues so that they can be over-stretched and restored to their proper tension. Tissues that have been over-heated cannot be over-stretched, as the heat “prostrates” them and makes them unresponsive. You want to stimulate the “twitch response” in the golgi tendon bodies in order to reset the tissues to their relaxed condition. Light warming makes this possible.

Decide how long to leave the needles in place according to how the tissues respond. If the needles are not ready to be removed immediately, then check them after they have been in place about 10 minutes. To check them, “fix” the tissues with your non-dominant hand as you did when you inserted the needle, and tug gently on the needle with your dominant hand. If the needle is strongly embedded in the deep tissues, then leave it there. Some needles in some people need to be left in place for 45 minutes or longer, but most needles are ready to be removed after 15-20 minutes. When some of the tissue resistance starts to dissipate, it may be time to work the needle and remove it. If you are not sure, leave the needle in place longer and test it again several minutes later.

When you are ready to remove the needle, “fix” the tissues again with your non-dominant hand. Grasp the needle handle firmly in your dominant hand, and tug the needle gently but firmly. Feel the response of the deep tissue with your monitoring hand. You are feeling for a sensation that the deep tissue is stretching. Your needle needs to pull against resistance, which is why you need to fix the tissues in place with your monitoring hand. Usually, the tissue releases quickly, but sometimes it is necessary to pull hard on the needle for 30 seconds or more. Pull until you feel the twitch. If it seems that your pulling is counter-productive, let the tissue rest and come back to it later. When it is ready, it will feel as though you are removing the needle from room-temperature butter.

Your goal is not a strong muscle twitch, as these tend to be painful, leave the muscle sore, and need to be repeated. Rather, your goal is a slow twitch, generally in the tendon or ligament, which will be smaller in amplitude than the corresponding twitch in muscle, but its effect will be longer lasting and less painful.

If you have used a needle that is too light gauge, you will have a difficult time obtaining the twitch response and a difficult time removing the needle. Further, the tissues will be angry and irritated when you finally get the needle out, and the patient will be much more likely to have a painful rebound reaction later.

An effective needling strategy for most situations is to needle the Facet Points and/or Lamina Points, retaining the needles for 15-20 minutes while you apply Zheng Gu Shui liniment and indirect moxa. Release the points and remove the needles. Then palpate the points to determine whether the releases have been complete. Re-needle any points that have not released completely, this time working the needle immediately upon insertion and removing it without retention. Massage the area with a warming salve such as Spring Wind Amber Massage Salve to ease the spasms in the tissues, and apply an anti-inflammatory cream, such as

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Zheng Gu Shui or one containing emu oil, to reduce rebound effects. If the tissues are spasming and reactive after you have finished needling, apply a warm compress after applying the anti-inflammatory and leave it for up to 5 minutes.

Treatment Examples

Lumbar Spine. Low back pain is an extremely common complaint. There are ways to pinpoint the problem precisely and focus your treatment to the exact lesion. However, acupuncturists who have not been trained to make these precise determinations can still give effective treatments using their palpation skills and needling the Lamina Points and/or Facet Points bilaterally at the levels where they feel stagnation.

A very powerful treatment for the low back, regardless of diagnosis, is to needle the Lamina Points of L4, L5, and S2 bilaterally. If the patient has a herniated disc or a severely inflamed nerve, it may sometimes be necessary to omit the needle at the Lamina Point on that side.

A 78-year-old woman in intense pain was diagnosed as having "spinal stenosis" and was told by three different physicians that surgery was her only option. She decided to try acupuncture first. She had a backward sacral torsion, and the low lumbar and sacral regions were hot to the touch, swollen, and extremely painful. After several sessions of gentle meridian acupuncture to bring down the inflammation and swelling, the tissues were able to tolerate "gold needle" acupuncture. The condition resolved after several months of needling the Facet Points and Lamina Points from L3 to S3, using Zheng Gu Shui liniment and indirect moxa. Eventually the tissues relaxed enough that the sacral torsion could be corrected manually, and she danced out of the office.

Sacrum. A 60-year-old man sought treatment for painful bladder spasms that interfered with urination and with his life. Previous treatments with Western Medicine had been unsuccessful, and nothing he had tried had helped. The spasms reduced significantly after one treatment using the Facet Points at L5 and the Lamina

Points at L4, L5, and at the level of BL 27 and BL 28 bilaterally. After several treatments, the spasms were completely gone.

Thoracic Spine. An 83-year-old man complained of whiplash from an auto accident that occurred a month earlier and chronic itching in the middle of his back. He had a functional scoliosis in his midthoracic spine that pulled toward the right scapula, which was severely elevated. The vertebrae at C7 and T1 had a neutral dysfunction (restricted flexion at C7 left and T1 right), with corresponding fullness in the Lamina Points. In addition the Lamina Points from T3 to T6 were strongly contracted on the right, and the skin over the spine at that level had become hardened, brown, and flakey. The brown skin extended laterally toward the right scapula. Needling the Lamina Points bilaterally from C7 to T6 and the Facet Points at T1, and applying Zheng Gu Shui and indirect moxa, dramatically reduced the elevated scapula, corrected the functional scoliosis almost completely, and stopped the itching. Manual treatments further loosened the thoracics and cervicals and calmed the whiplash symptoms.

While jogging, a 37-year-old man experienced chest pains that mimicked a heart attack and sent him to the Emergency Room, where he was told that nothing was wrong with his heart. After several similar episodes, he sought acupuncture treatment. Flexion and extension were restricted at the level of T4. Needling the Facet Points bilaterally at T4 stopped the symptoms for several years. When the symptoms returned and he was again told at the Emergency Room that nothing was wrong with his heart, he sought acupuncture treatment again. After treatment with the same point formula, he has been symptom-free for at least five years.

Cervical Spine. A year ago, I experienced an outbreak of shingles (herpes zoster) in the upper branch of the trigeminal nerve. I was able to control significant, acute pain episodes in the nerve by palpating for contraction at the Lamina Point or Facet Point of C4. I needled the active point on the side of the pain and released it. The pain subsided immediately and completely, with one needle, in about 5 seconds.

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So-called “dowager’s humps” that are not caused by osteoporosis and vertebral fractures are instead generally caused by restrictions at the facet joints under the “hump.” These restrictions create stagnation in the tissues with damp accumulations, usually cold in nature. “Humps” respond exceedingly well to “gold needle” acupuncture at the Lamina Points and manual manipulation at the Facet Joints of the cervico-thoracic junction. Needle the Lamina Points bilaterally from C6 to T2 or T3, apply liniments such as Zheng Gu Shui and Shiling Oil, moxa the area, and release the points. After the needles have been removed, manipulate the facets manually, and apply warming salves, such as Spring Wind Amber Massage Salve. If you are worried about rebound, apply an anti-inflammatory salve, such as one containing emu oil, as your final step. The treatments will need to be repeated for several months, possibly even a year or longer, depending on how many motion units are affected and how long they have been that way. As the “hump” starts to dissipate, it will become possible to palpate the facet joints. When that is possible, add appropriate Facet Points to your needling formula.

Conclusion

The Lamina Points and Facet Points are safe and powerful points for relieving pain, restoring motion to the spine, and correcting some organ and meridian pathologies. They can be used in combination with other acupuncture treatment methods, or by themselves. These points are most effectively needled using heavy gauge needles, preferably #8 Seirin “gold” needles. ●

References

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- (2) Callison, Matt. “Motor Point Acupuncture” (chart).