



COLLECTED
PAPERS OF THE MEMBERS
OF THE
INTERNATIONAL COLLEGE OF APPLIED KINESIOLOGY

COPYRIGHT ICAK 1984

PRESENTED MAY 21st THROUGH MAY 24th, 1984

SHELDON C. DEAL, N.D., D.C.
PAST CHAIRMAN I.C.A.K.

INTRODUCTION

By

Sheldon C. Deal, D.C., N.D.

Past Chairman

This seventeenth collection of papers by the members of the International College of Applied Kinesiology represents 68 papers written by 49 authors.

These papers will be presented by their authors to the general membership at the Summer meeting to be held in Dearborn on May 21st, 22nd, 23rd and 24th, 1984. The authors welcome comments and further ideas on their findings either in Dearborn or you may write them directly as their addresses are included in the Table of Contents.

These papers do not represent the official educational material of the International College of Applied Kinesiology, but rather areas of special interest to the individual members which have been under research. The papers are presented in an unedited form.

The papers are being mailed out to the members well in advance of the Dearborn meeting. This will allow the membership at large to read the papers in advance which will save time at the Summer meeting and hopefully stimulate more questions from the members and more demonstrations from the individual author.

We the members of I.C.A.K. can be proud of the amount of research being conducted and feel fortunate to have it at our fingertips in the form of these Collected Papers. It cannot help but be an asset to our health and also to the health of our patients.

**** TABLE OF CONTENTS ****

		PAGE
Lovette Vertebral Torque and Counter Torque	Gerard E. Achilly, B.A., D.C.* 16545 Halstead Harvey, IL 60426	1
Some New Fixations	Michael D. Allen, D.C., N.D.* 22471 Aspan #108 Lake Forest, CA 92630	3
The Body Knows — Ask It	Michael D. Allen, D.C., N.D.*	7
Stop Smoking	Herbert C. Anderson, D.C.* 25 Curtis Street Medford, MA 02155	17
Allergy Response Subluxations	Wm. R. Borrmann, D.C.,N.D.* 331 N. Sawyer Oshkosh, WI 54214	19
The Body Torque Challenge	John w. Brinhall, B.A., D.C.* 901 N. 8th Ave. Holbrook, AZ 86025	25
The Swallow Challenge and Adjustment	John W. Brinhall, B.A.,D.C.*	29
Thoracic Fixations I and II: A Muscular Differentiation	Richard J. Caskey, B.S.,D.C.* 1153 West Main Street Waterbury, CT 06708	33
Shaft and Extremity Bone Test	Salvatore V. Cordaro, D.C.* 4730 Richardson Ave. Bronx, NY 10470	35
Identifying Body Energies	Sheldon C. Deal, D.C.,N.D. 1001 N. Swan Tucson, AZ 85711	37

The Phototrophic Effect of White Light on Acupuncture Points	Gerald Deutsch, D.C.* 448 E. Southern Tempe, AZ 85281	47
Negating Gluteus Maximus Recruitment During Sacroiliac Therapy Localization	Daniel H. Duffy, D.C.* 299 South Broadway Geneva, OH 44041	59
Formula Number 6147, Electron Poising Evaluation of a new compound	Daniel H. Duffy, D.C.*	61
Techniques for correction of first rib head Palpatory pain	Daniel H. Duffy, D.C.*	63
Hidden Dural Torque problems	J.V. Durlacher, B.A.,D.C.* P. O. Box 399 Pringhar, IA 51245	65
Anova (Analysis of Variance)	Joseph S. Ellison, D.D.S. P. O. Box 2728 New York, NY 10163	67
Candida Albicans-The Misdiagnosed friend	Rene Espy, B.A.,M.A.,D.C. 17125 Boones Ferry Road Lake Oswego, OR 97034	77
Gait allergy testing	Burtis Espy, B.A.,M.A.,D.C. 17125 Boones Ferry Road Lake Oswego, OR 97034	101
Walking Disc-Expanded	Kenneth S. Feder, D.C.* 775 Douglas Atlanta, GA 30342	103
A cure for Dyslexia and Learning disabilities	Kenneth S. Feder, D.C.*	105
Anterior Lumbar Pattern	Carl Ferreri, D.C. 3850 Flatlands Ave. Brooklyn, NY 11234	115
Multi Positional-Uni Vector Muscle testing	Terry L. Franks,D.C.* 1975 Cliff Road Burnsville, MN 55337	119
	Christopher L. Harrison,D.C.* 299 California Ave. Palo Alto, CA 94306	

Into Lesion-Light force adjusting	Christopher L. Harrison, D.C.	123
The "Hidden" upper cervical fixation	James D. Hogg, D.C. 1810 Second Ave Rock Island, IL 61201	127
ER vs RR - Emergency response vs Relaxing response	John T. Hughes, D.C.* 1926 Carter Ave. Ashland, KY 41101	131
Introduction to Applied Kinesiology	Alex P. Karpowicz, D.C.* 1201 Wheeler Ave. Dunmore, PA 18510	135
Validation of Office Urinalysis procedures and treatment procedures	Alex P. Karpowicz, D.C.*	139
Bennett's Neurovascular Dynamics Technique	Stephen J. Kaufman, D.C. 6300 E. Yale #105 Denver, CO 80224	151
Further Enhancement in Diagnosis and treatment of Myofacial Adhesion: The stretched isometrically resisted position (SIRP)	James A. Kerner, D.C., B.S. 83 Boylston Street Brookline, MA 02146	155
Proprioceptive Neuromuscular Facilitation (PNF) Exercise and Stretching	James A. Kerner, D.C., B.S.	159
The Accelerator-Defender Concept	Gary N. Klepper, D.C.* 1440 28th Street Boulder, CO 80303	163
The Pelvic Categories as related to Selye's General Adaptive Syndrome	Gary N. Klepper, D.C.*	173
Product Evaluation - Trotter Treadmill	David W. Leaf, D.C. 159 Samoset Street Plymouth, MA 02360	177
The Mandibular Respiratory assist	Barbara McQueeney, D.C.* 7319 Beverly Blvd. #14 Los Angeles, CA 90036	181
Concepts of Health and Fitness in Relation to exercise	Philip Maffetone, D.C. P. O. Box 596 Baldwin Place, NY 10505	185

Ancillary examination procedures: Training Support Personnel	Kerry M. McCord, D.C.* 6110 9th St. North St. Petersburg, FL 33703	191
Efficient Spindle cell activation	Donald A. McDowall, D.C.* 4 Weedon Close Belconnen 2067 NSW Australia	203
Malocclusion & Iatrogenic side effects	Richard Meldener, D.C.* 49 Rue des Mathurines Paris, 75008 France	207
Toxicity of Amalgam due to Mercury poisoning	Carl Mestman, D.D.S. 126 S. Plank Road Newburgh, NY 12550	217
Suture-Induces Sciatica	Evan Mladenoff, D.C.* 724 Pape Ave. #200 Toronto, Ont., Canada	223
Essay on Jing (Well) point of Liver meridian	In E. Moon, D.N., C.A., O.M.D. 360 N. Michigan #2000 Chicago, IL 60601	229
Relativity Principle Human factor in muscle testing	In E. Moon, D.N., C.A., O.M.D.	235
Vision accommodation to Bi-Focal contact usage	Emil F. Morlock, D.C.* 202 44th St., S.W. Wyoming, MI 49508	249
A study in Plethysmography utilizing Applied Kinesiology techniques for the evaluation and treatment of Temporal Mandibular Joint Dysfunction	Richard A. Mowles, D.C. 4326 Brambleton Ave., S.W. Roanoke, VA 24180	251
Magnetic Deficiency	Robert Perolman, D.C.* 4125 Hollywood Blvd. Hollywood, FL 33021	265
Detacting Parasites	Robert Perolman, D.C.*	267
A test for blood builder deficiency	Robert Perolman, D.C.*	269
ConcuSSION techniques used in Spinal Therapeutics	L.E. Rarey, C.P., D.C.* 2170 First St. Baker, OR 97814	271
Entropy and the traid of health	Roger S. Redleaf, D.C. 1196 Elmwood Ave. Providence, RI 02907	273

The Trapezius Reflex	Marc S. Rosen, D.C.* 1086 Waldon Ave. Cheektowaga, NY 14211	277
Postural evaluation of a group of Women before and after a weekly "Slimnastics" exercise class - a preliminary report	Marc S. Rosen, D.C.*	287
Observations on the Dural Torque pattern	Mario A. Sabella, D.C.* 598 Pacific Hwy. Chatswood 2067 Australia	291
The Physical Traid Life Extension	Julius L. Sanna, D.C.* P. O. Box 324 Danbury, CT 06810	295
Hyperenergy States in Applied Kinesiology: A novel approach for its Diagnosis	Joseph Shafer, D.C. Klampenborgvej 241 Lyngby, 2800 DENMARK	299
Chronic Fixation pattern corrected by Mandibular and Sphenoidal technique	Sheldon Sinett, D.C.* 133 East 58th Street New York, NY 10022	319
Hydrochloric deficiency, Atlas Subluxation: related conditions	John O. Stoutenburg, D.C.* 17320 135th Ave., N.E. Woodinville, WA 98072	323
T12-L1 fixation: A masking phenomenon	John O. Stoutenburg, D.C.*	325
Seven blocks of energy	Mark Terry, D.C.* 1415 East 3rd P. O. Box 1145 Centralia, IL 62801	327
Positive and Negative polarity	Mark Terry, D.C.*	331
Sensory impairment rating	Mark Terry, D.C.*	333
Motor impairment rating	Mark Terry, D.C.*	339
Statistics on the practice of Applied Kinesiology by members of the International College of Applied Kinesiology	John F. Thie, D.C.* 1192 N. Lake Ave. Pasadena, CA 91104	439

Patient Management	Lance West, D.C.* 3777 Monroe St. Toledo, OH 43606	359
Back to basics	Lance West, D.C.*	363
Chlorophyll, The natural miracle	Paul White, D.C.* P. O. Box 6 Douglas WY 82633	365
B-Complex	Paul White, D.C.*	369
Iliacus, Category I	Stanley Wiczorek, D.C.* 24 Market Street Brockport, Ny 14420	373
A simplified new method of establishing the three dimensions of a Physiologically Compatible Occlusal position	Emil Zmenak, D.C.* 66 Livingston Grimsby, Ont., Canada	375

LOVETTE VERTEBRAL TORQUE AND COUNTER TORQUE

Gerard E. Achilly, B.A., D.C.

Abstract

There is a direct correlation in direction of a vertebral subluxation in relationship to its Lovette counterpart.

Introduction

Unisubluxation of a vertebral segment usually demonstrates a clockwise or counterclockwise directional challenge. In rare instances a straight anterior or posterior are found, but most are the torque variety.

The possibility of the existence of a torque pattern to its Lovette counterpart has been under investigation for approximately one year. Certain conclusions determined by the author's research paper of the summer of 1983 was not entirely, totally valid. Since that time, a large number of subjects have been tested for the torque clockwise and counterclockwise torque to its Lovette counterpart.

Discussion

A large percentage exhibited Lovette sublucation on the ipsilateral side. The remaining showed Lovette sublucation on the contra-lateral side.

The findings are as follows:

- 1) A sublucated vertebra may be torqued clockwise or counterclockwise.
- 2) The Lovette counterpart, whether on the ipsilateral or contra-lateral side could be torqued also, either in the clockwise or counterclockwise direction, not necessarily in the same direction as the original sublucation.
- 3) The Lovette sublucations can be both torqued clockwise or counterclockwise, one Lovette sublucation could be torqued clockwise and its counterpart torqued counterclockwise or vice versa.

Conclusion

The existence of Lovette torque and counter torque should be considered in correction of structural faults.

SOME NEW FIXATIONS

by

Michael D. Allen, D.C., N.E.

ABSTRACT: The purpose of this paper is to show four new structural fixations. A bilaterally hypokinetic piriformis, quadriceps, tensor fascia lata or sartorius indicates a fixation between L2, 3, 4; C3, 4 5; T11, 12, L1; and the TMJ, respectively.

INTRODUCTION: It has been shown that placing a black cloth over the open eyes of a patient can elicit structural fixations. (1) Occasionally this test would indicate the existence of structural fixations with no other support.

I began to ask myself if there were other structural fixation indicators that had not been found yet, and where they were. To answer my question, I conducted an examination to see if any structural fixations existed other than the ones already established. The results of preliminary testing indicated that all the fixation indicators had been found.

This wasn't logical. How could all the structural fixation indicators be found if a screening test said there were more? Clinical persistence demonstrated several more fixation locations.

The key to why the other structural fixations had not shown up previously was given in Dr. Deal's a paper entitled, "Body Priorities as Demonstrated by a Dental Splint". (2) This paper helped me understand the blindfold test more fully.

The structural fixations had been "hidden" by the body; they were out of sequence. Something else had to be done first. Once the problems of higher priority were cleared, the following structural fixations became apparent and correctable.

PROCEDURE:

BILATERAL HYPOTONIC PIRIFORMIS -- L2, 3, 4 FIXATION

Whenever one muscle on one side of the body is hypotonic, and the same muscle on the opposite side is also hypotonic, there is a structural fixation. The specific areas have been well documented.

The usual Chiropractic practice is made up of 80% low back pain; men with prostatitis, and women with menstrual disorders. Fertility problems -- more properly infertility -- may be a reason

For a man and/or a woman to seek Chiropractic care. The symptoms may be present visit after visit. Therapy localization reveals nothing unusual and everything which was located and corrected previously, has remained corrected.

The presence of a hypotonic piriformis muscle bilaterally indicates an L2, 3, 4 fixation. Since the third lumbar nerve is the main nervous supply to the sex organs (4), and the piriformis muscles lie on the pericardium meridian, it seemed logical to check the vertebrae associated with the specific nerve to the organ's muscle.

A positive correlation has been found to exist in every person tested. Also, the fixation seems to be found more often in women than men.

The next step is to challenge the vertebrae to find the direction of correction and to manipulate accordingly. Go back and recheck the piriformis muscles after correction. This is a very important step because several times one piriformis muscle will remain hypotonic while the other one tests strong. This indicates the need for the proper nutritional supplementation.

If the existence of this fixation is suspected, but the bilaterally hypotonic piriformis is not found in the clear, check the priority mechanism. It is possible that the area was not ready to be fixed yet.

BILATERAL HYPOTONIC QUADRACEPS FEMORIS -- C3, 4, 5 FIXATION

Testing the quadriceps femoris (rectus division) with the patient supine, a bilateral hypotonicity indicates a fixation between the C3, 4, and 5. This fixation may be a contributing factor to symptoms of migraine headaches, sore throats, chronic knee problems or other areas of structural relation.

The proper technique of testing, challenging, correcting, and rechecking, should be followed strictly and special attention should be paid to priorities.

BILATERAL HYPOTONIC TENSOR FASCIA LATA -- T11, 12, L1 FIXATION

One of the primary requirements of health is a clean colon. If this organ is sluggishly working and congested, it cannot possibly work at its optimal level resulting in an accumulation of toxicity. An open ileocecal valve and constipation are two symptoms of an atonic colon.

A bilateral hypotonic tensor fascia lata indicates a fixation between the T11, 12 and L1. The same steps should be followed in this case as in the cases above.

In the cases studied, all responded immediately to the correction of the fixation and to date, only one needed to be done a second time. (Probably because it was corrected out of sequence.)

As in the case of the piriformis, the tensor fascia lata sometimes shows a unilateral weakness after correction or on subsequent visits. This indicates the need for nutritional supplementation. Having the normal function re-established, the colon can work stronger, and balance can be restored to the pelvic structure.

BILATERAL HYPOTONIC SARTORIUS -- TMJ DYSFUNCTION SYNDROME

This structural fixation is the exception to the general rule that a bilateral muscle hypotonicity indicates a structural fixation. There are two reasons. First, it indicates a fixation someplace other than a vertebral level. Second, the correction is made to soft tissue rather than bone.

A bilateral hypotonic sartorius indicates adrenal insufficiency. It also indicated a structural fixation in the TMJ. The usual methods of neurolymphatic, neurovascular, acupuncture, nutrition, etc., are all of supportive value but many times the patient experiences no permanent relief of the symptoms.

The TMJ is the primary joint in the body (6). If it is out of balance, the whole body will be out of balance. It has been estimated that 50 to 67% of the nervous system is controlled by the TMJ.

Manipulation of the spindle fibers in the external pterygoides bilaterally, results in sartorius strength. As mentioned above, if the procedure is done in the proper sequence, the TMJ remains corrected upon subsequent visits.

The patient should be instructed to follow "the rule of thumb". This rule says that you should not open your mouth any wider than the width of your thumb for 10 to 14 days to allow healing to occur. This helps avoid repeated strain of the TMJ musculature.

In Dr. Deal's 1978 paper, the results of his test with a removable acrylic dental splint are presented along with its application. This paper presents the indicator its need.

CONCLUSION: The blindfold test is very valid as an indicator of fixations in the body. Its importance has been substantiated, and it has lead us to the development of the body's priority sequences.

The muscle tests outlined above will add to the doctor's ability to effectively treat the patient. New areas of structural

involvement can be evaluated and treated to help relieve the patient's pain and return to balance quicker.

I have found that it is most effective to check the TMJ -- by testing the sartorius muscles -- at the outset of the treatment, along with the centering and switching, to see if they should be corrected at that point. Correcting these areas at first, and in their proper priority, is significant since they could alleviate compensatory muscle weaknesses initially, thereby showing primary weaknesses only.

Above all, always follow the priority mechanism for correct interpretation of your AK results and treatment.

BIBLIOGRAPHY:

1. "Blindfold Test": Diamond, John; Collected Papers of the Members of the ICAK, Spring 1977.
2. "Body Priorities as Demonstrated by a Dental Splint": Deal, Sheldon C.; Collected Papers of the Members of the ICAK, Spring 1978.
3. Diamond, Spring 1977
4. "Chiropractic Principles and Technique"; Janse, 1947; pg. 161-162.
5. Deal, Spring 1978
6. Deal, Spring 1978

THE BODY KNOWS -- ASK IT

--by--

Michael D. Allen, D.C., N.D.

Sheldon C. Deal, D.C., N.D.

ABSTRACT: The purpose of this test is to more fully understanding the priority mechanism dictated by the body. It is used with the correction of those problems elicited by Applied Kinesiological methods of diagnosis.

INTRODUCTION: In the summer 1978, Dr. Deal presented his paper entitled, "Body Priorities as Demonstrated by a Dental Splint". In that paper, guide lines were established for correction of the symptoms presented by the patient. When the priorities were followed, the body appeared to say, "FIX ME NOW", or "FIX ME LATER".

The advantages to following this priority sequence:

1. Distinguish between cause and effect;
2. Find the problem and fix it faster;
3. Watch the process of "unwinding" from disease.

PROCEDURE: The 1978 paper on priorities is still effective. The information is presented below. Let us review the sequences to the procedure. A primary lesion will:

1. Be weak in the clear)
2. Therapy localize) these may be one in the same
3. Respond to inspiration assist.

SPECIAL NOTE: Numbers one and two above may be the same in some cases - the illeocecal valve is an example. You could check the illiacus muscle for weakness in the clear, and therapy localize the valve area if you choose.

Two additional steps have been added for further evaluation of the problem. They are:

4. The indicator muscle strength will not change when the patient is pinched; (NOTE: The pinch cannot be directly over the area being therapy localized. See explanation below.)
5. Lateralization of the eyes will not change the indicator muscle strength.

The secondary or compensatory area might follow most of these steps, but not all of them. It is considered that the secondary area is a result of the primary cause.

Test a muscle which is related to an area in question. If the muscle is hypokinetic, go to the related area, and therapy localize it using a strong indicator muscle. If the indicator muscle becomes hypokinetic, have the patient take a deep breath. If the indicator muscle now strengthens, pinch the patient -- anywhere except over the area being therapy localized -- while the patient is therapy localizing the area with a held breath. If the indicator muscle remains strong, lateralize the eyes to the dominant side -- keeping everything else the same -- and retest the indicator muscle. If the indicator muscle strength remains unchanged, the area in question is the next one to be corrected; it is considered the primary problem.

The purpose for the pinch is to invoke the Melzack-Wall "gate-control" theory of pain. The instantaneous insult of a slight amount of pain closes certain nerve gates and opens others. This allows the examiner to question the nervous system relative to its ability as an error comparer.

If the indicator changes from the above, this would mean that a secondary or compensatory area had been isolated. Continue looking for a primary lesion; continue along the same line of thinking.

It is necessary to define some terms used in the priority sequence. These terms make it easier to document the progress in the patient's chart and to understand the sequence of correction. It may not be clear at the outset, but practice will bring about understanding. Each term

has been given a shorthand designation for the records.

1. A primary-primary lesion (1'1') -- All rules apply and the body says, "FIX ME NOW".
2. A secondary-primary lesion (2'1') -- The last step -- the eye lateralization -- makes the previously strong indicator muscle appear hypokinetic. The body says, "YOU ARE ON THE RIGHT TRACK".
3. A primary-secondary lesion (1'2') -- The indicator muscle strength does not change with inspiration or to any challenge above that. The body now says, "FIX ME LATER".
- 4) A secondary-secondary lesion (2'2') -- This lesion is the one found only when the area in question is therapy localized, or shows up when the pinch alone is used. The body says, "WAKE ME UP LATER, I'M STILL SLEEPING".

One of the lesser lesions (from the secondary-primary to the secondary-secondary lesion) may become a 1'1' lesion AFTER the original 1'1' lesion has been corrected.

A majority of patients seem to have a category I on the left side that needs treating. It appears that a pelvis lesion continues to exist and the pelvis is not lesion-free until a category I is elicited as a 1'1' lesion and corrected. Also, keep in mind that the category I may be present as a compensation to a more complicated series of manipulations

leading back to another category I. This is very common.

To make sure you are finished with the pelvis after reduction of a category I, pinch the patient while therapy localizing to the category I area. If a strong indicator remains strong, the low back is stable.

CASE STUDY

BOB, 46, MARRIED, WRITER

Bob is lying prone on the table. His hamstrings test fine on both sides. He has therapy localized to the PSIS bilaterally. Nothing shows up. He is pinched on the thigh. Retesting the hamstrings now elicits a category I.

Keeping this in mind, the body has told us to look elsewhere for the primary lesion. It could be anywhere, but since a category I is the last problem to be corrected in the pelvis, we continue the examination in that area.

As we therapy localize other areas, we find a pelvic flare exists on the right as well as a sacral inspiratory assist, and a posterior left L3 (category III), which responded to the deep breath, but created a hypokinetic hamstring with the pinch.

Since the sacrum responded to inspiration -- and the category III failed the pinch test (2' 1') -- we follow the sacrum to find the primary lesion. The next step is to see if the indicator muscle changes with the application of the rest of the priority rules.

Keep the patient's therapy localization to the sacrum. Have him take a deep breath, and pinch him on the thigh. The pinch does not make the strong indicator muscle change.

We are on the right track to the primary-primary lesion. Next, Bob lateralizes his eyes to his dominant side. The strong indicator muscle remains strong. This is the primary-primary lesion (1' 1'). We correct it with the usual procedures.

The pelvis is again evaluated for the presence of the pelvic flare and the category III. The pelvic flare remains the same, but the category III has changed.

The posterior left L3, which previously responded to inspiration, tells us it is to be considered next. The indicator muscle now stays strong after the pinch. Now this is the primary-primary lesion.

Correction of the category III fixed the pelvic flare. This tells us that the pelvic flare was a secondary-secondary lesion (2' 2'). Now we recheck for the category I. It has become a 1' 1', and is ready to be corrected.

After correction of the category I, the PSIS are again therapy localized, and the patient is pinched to see if anything else exists with regard to the low back. Since this revealed nothing new, the pelvis is considered to be stable.

Keep in mind that the primary lesion could be quite remote from the compensatory lesion. When the primary lesion is found, its location becomes very logical in the sequence of "unwinding" back into a state of "ease".

DISCUSSION: When the above procedure is followed properly, the body will direct you when to correct a given area. A primary-primary lesion will:

1. Have a strong indicator muscle remain strong when a patient takes a deep breath and holds it while,
2. Therapy localizing to the area in question.
3. The patient takes a deep breath and holds it making an indicator muscle's strength change,
4. The patient is pinched by the examiner. If the muscle strength does not change, then
5. Have the patient lateralize their eyes to the dominant side. If there is no change in the indicator muscle strength, then this is the area

to correct next -- it is the primary-primary lesion.

In light of the above text, it has been observed that faults which have a respiratory assist mechanism need further evaluation. If a cranial respiratory mechanism were present, it should only be corrected if it meets the above standards. In other words, an expiratory assist cranial fault is viewed as a secondary problem and should not be immediately corrected.

A good example of this is a sphenobasilar extension cranial fault. Since the fault is demonstrated through expiration, this indicates that it is not ready to be fixed and that there is a more primary area to correct first. After the primary-primary lesion has been corrected, the sphenobasilar extension fault may change to an inspiratory assist fault. If it now meets the required standards, it should be corrected next.

CONCLUSION: This technique is effective in the case of the chronic patient comes in time after time with the problem that has not been cleared completely. Something is still causing their problem. This technique will help find the cause. Also, many things that are routinely corrected can be seen to be compensatory. Most of time, the compensatory lesions are corrected when their underlying cause is found and corrected.

ALLERGY RESPONSE SUBLUXATIONS

Wm. R. Borrmann, D.C., N.D.*

ABSTRACT:

The use of Dr. Malcom leg testing along with antronex and histidine as screening tools in determining spinal allergy response sublaxations to food and other allergens by Wm. R. Borrmann, N.D., D.C.

ALLERGY RESPONSE SUBLUXATIONS

In my research on allergies I ran across the Malcom Leg test a test to determine a vertebral subluxations. In his book he speaks of vertebral subluxations being associated with allergies.

He speaks of a male patient age 38 whom he had been treating for approximately a year and was suffering from continuous headaches for two years before he began treatment with Dr. Malcom. Dr. Malcom states that he had cut the frequency of headaches to one every three weeks and that he had a atlas and a second lumbar that he could not get to hold. Before we discuss the association between the allergy and subluxations let me explain the Malcom Leg Test.

The test is performed with the patient in the prone position.

Take both ankles, bend both legs at the knee and push with equal pressure on both.

If one leg is closer to the buttocks than the other, the test is positive. If both legs are equidistant from the buttock, or both touch the buttock, the test is negative.

Positive test meaning there is a subluxation somewhere in the spine. Negative test meaning there are no subluxations present in the spine.

Usually in the case of a positive test, the left leg will be closer to the buttock than the right. Also, as in the art of muscle testing, so with this it requires practice to raise and push both legs with equal pressure and feel the difference in tension and not to force things. It also should be pointed out that it is not necessary that both legs touch the buttock, only that they be equidistant from the buttock to be a negative test.

It does not work well with children under 12 or patients with injured knees or on patients taking tranquilizers or narcotic drugs of any kind.

Dr. Malcom explains that the patient awakened with a terrific migraine headache one morning and called him for an appointment. He was told to come right in. The leg test was used to determine vertebral subluxations and was found to be positive. Legs not equidistant from the buttock.

Investigation of the entire spine and pelvis is undertaken to determine the area of subluxation. Dr. Malcom explains that he does this by starting at the right sacro-iliac and gently rubbing it, and then re-checking the leg test. If the leg test is now negative (both legs equidistant from buttock) the right sacro-iliac is adjusted. If leg test remains positive each vertebrae is challenged by applying gentle pressure to the transverse processes, this is continued until a negative test is arrived at. Wherever a negative test is arrived at an adjustment is made at that vertebrae.

Which ever vertebrae is involved and or sacroiliac after the adjustment is made one waits for 10 to 20 seconds if leg test positive again further

challenging of the vertebrae is continued. This procedure is continued until their are no more positive tests.

After this procedure Dr. Malcom than procedes to test specific foods. After each food is challanged the leg challange is observed for a positive change. If their is a positive change a subluxation or subluxations have occured in the spine. Indicating a allergy response subluxation (ARS). These are adjusted where found in the spine. Further testing can reveal other sensitivities.

It is advised that one wait for 20 seconds to two minutes after challanging a food. If leg check remains negative one may assume that the spine is clear of subluxations.

One may also use Dr. Wally Schmidt research technique using L-Histidine to determine if ones body chemistry is susceptible to allergens and will produce excessive amounts of histamine.

Dr. Schmidt research paper (published in the Collected Papers Of The Members Of The International College Of Applied Kinesiology 1983) titled "The Use Of Antronex And Histidine As Screening Tools For Food And Other Allergies", states on page 161 of the collected papers that allergic reactions are manifested in the body by histamine reactions and kinin reactions. One natural product which has antihistamine affets and is available without a prescription is a substance manufactured by Standard Process Laboratories called Antronex (Antronex contains 10 mg. of Yakriton derived from liver and is a natural anti-histamine). On page 164 Dr. Schmidt states that in his research on food and other allergies a chemical precursor to histamine such as the amino acid histidine is placed in the mouth a marked muscle weakness was produced. A similiar muscle weakness may also be produced when a drop of the patient's blood is placed on his or her tongue indicating allergic reaction to blood chemistry.

Therefore, when we find a patient who strengthens with Antronex and weakens with histidine we can use the Malcom leg test to determine the exact vertebral level associated with the allergy. Or one may test by placing the suspected food or substance in the mouth, or by inhaling airborne allergens and then leg test.

I believe that it is vertebral changes that explain when many patients maintain their allergies once they have been acquired through repeated exposure which in turn results in allergy response subluxations (ARS).

This underlying cause ARS many times is not corrected by food or airborne allergen avoidance or through the use of antihistamine natural or drug or through the use of attenuated allergen injections or attenuated allergen Homeopathic drops. It is also necessary to find and correct these specific ARS. correct these specific vertebral response subluxations (VRS). When these VRS corrections are made a patients's sensitivity is corrected, often in a single visit. This can be re-tested through the use of amino acid histamine, food or airborne allergen ect., and many times it is not necessary for the patient to invoke a period of avoidance. However, I would suggest that you advise a patient to avoid the allergy producing substance for at least 4 weeks to let the body recover.

The critical factor is the indentification of the ARS in the allergy pattern and to this end I belive, testing not only with Antronex and histidine but

also testing for ARS patterns should be a part of every allergy initial examination.

REFERENCES

Schmitt, Walter H., "Antronex - Another Tool for Findings Hidden Problems," ICAK Collected Papers, Summer, 1982 p261.

Schmitt, Walter H., "The Use Of Antronex And Histidine As Screening Tools For Food And Other Allergies," ICAK Collected Papers, Winter, 1983 P161

Malcom, George A., "Don't Settle For Migraine Headaches", Kent Publishing Company 629 Christie Toronto Canada.

BOOK REVIEWS

Allergy Of The Nervous System. Speer, Frederic, Springfield, Ill., U.S.A.: Charles C. Thomas, 1970 (\$13.25 in the U.S.A., available through McGraw-Hill in Canada at \$17.00).

In the foreword written by Walter C. Alvarez, M.D. who was one of the small group of men studying food allergy around 1930. He speaks of a "dumb Monday" group of patients who were found to be eating the same food allergen every Sunday. He also speaks of several examples of dull-brained individuals who became bright after the removal of a food allergen which was being eaten daily. Every patient who has had his allergies diagnosed as neuroses or nervous tension would feel elated after reading the preface by Dr. Speer. He points out the striking similarity between many allergic manifestations to psychogenic illness, because of the numerous and vague symptoms.

The book was written primarily for the medical profession. Each doctor contributing a chapter is a specialist in his own field, from neuropsychiatry to inhalent, drug or food allergies. Allergic tension fatigue syndrome is explained thoroughly, and the effects of all allergies on many conditions such as epilepsy, multiple sclerosis, and minimal brain damage are supported with well-documented cases. The last chapter of the book entitled "Treatment of Nonallergic Factors", points out that good results are dependent on adequate specific allergic therapy and proper management of coexistent nonallergic elements - environmental, psychological, emotional and organic. It is recommended that every one who is interested in neurological allergic reactions and how to recognize their reactions should add it to their library

Allergy - Its Mysterious Causes and Treatment. New York, N.Y.; Grosset & Dunlop Inc., 1968. Dept. J.S., 52 Madison Ave., New York, N.Y. 10010. (\$1.00)

This book supplies general information for those who are just beginning their study of allergy.

What Is Allergy? Benack, Raymond J., Springfield, Illinois, U.S.A.; Charles C. Thomas, 1967. (\$8.00)

General information book. Basic guide for the allergic person.

Allergy -Its Treatment And Care. Bottomly, Harold W., Don Mills, Ontario: Longmans, (\$5.95; Paperback \$1.75)

Dr. Bottomly (M.D., F.A.C.P.) is an allergist in Winnipeg. In his book he give advice which is specific and deals with the aspects of a patient's day-to-day life in a down-to-earth sympathetic manner.

Allergy Cooking, Conrad, Marion L., U.S.A.: Crowell, 1960. (\$8.50) Also available in paperback by Pyramid T. 1914, (.75).

In her cookbook Mrs. Conrad outlines many of her discoveries about cooking for those suffering from an allergy. She clearly defines how maintain a food diary. She divides her book by wheat-free, gluten-free, egg-free, milk-free, and combinations of these. She does however only suggest the substitution of potato flour for wheat flour and if you have a potato allergy, the wheat free recipes would be of no use.

The Allergy Cookbook, Emerling, Carol G., Garden City, N.Y., U.S.A.; Doubleday Co., 1969 (\$5.95)

This excellent cookbook also supplies a variety of substitution ideas. There are wheat-free, gluten-free, egg-free, and milk free recipes or any combination of these. There are also corn-free recipe section and a "no-chocolate, chocolate" section. It is well indexed.

Manual For Those Sensitive To Foods, Drugs And Chemicals, Washington, D.C. Environmental Health Association, 1969.

Their primary concern has been discovering the types of chemicals used in the environment and how to successfully substitute and avoid these chemicals. A large selection of recipes may be obtained by writing Miss Natalie Golos, 751 Azalea Drive, Rockville, Maryland, U.S.A.

Insect Allergy - Allergic and Toxic Reactions To Insects And Other Arthropoda. St. Louis, Missouri, U.S.A.: W.H. Green, 1969 (\$24.50) Frazier, Claude A.

Dr. Frazier a well known, highly respected allergist. In his book Dr. Frazier correlates and elucidates all the relevant facts on insect allergy. He subdivides the Genus Arthropoda into all classes, known on the North American continent. For each class, he discusses the kinds of members, recognition of the members, recognition of the allergic reaction stemming from these members and the type of treatment best employed, both emergency treatment and longrange

treatment. The serious problem of bee stings is excellent.

Low Gluten Diet With Tested Recipes, Clinical Research Unit, W4642, University Hospital, Ann Arbor, Michigan. (\$1.00)

This book is particular useful to celiacs. It contains an explanation of the gluten-free diet. recipes, principles of low-gluten cookery, lists foods that are permitted and prohibited and contains a list of gluten-free products.

Food Allergy Its Manifestations And Control And The Elimination Diets, Albert H. Rowe, M.S., M.D. Lecturer in Medicine (Emeritus) University of California School of Medicine, San Francisco, California. Allergist, Samuel Merritt Hospital, Oakland, California. In collaboration with Albert Rowe, Jr., M.D., Charles C. Thomas, Publisher, Springfield, Illinois.

This is a new book on food allergy in which the authors' experience of over fifty years in clinical allergy, and emphasizes that all tissues of the body may be subject to atopic allergy, especially to foods.

He presents a new revision of the elimination diets with detailed discussions of their use in both the diagnosis and treatment of clinical syndromes resulting from food allergy.

He also presents case histories to demonstrate the value of careful history taking, the fallibility of the skin tests in food allergy diagnosis, and the use of diet trial and diet manipulation in the control and treatment of specific entities such as nasobronchial allergy, allergic dermatitis, urticaria and angioedema, ocular allergy, allergic gastroenterologic syndromes, allergic toxemia and fatigue, ect.

THE BODY TORQUE CHALLENGE

by John W. Brimhall, B.A.,D.C.

Abstract:

An effort was made in our office to determine when the body was in a torque pattern and when we should strive to correct it by a therapy localization test and diagnosis. Correction will be found herein.

Dr. Goodheart's excellent work on the gait patterns and all of his work that has come from that has led all of us to evaluate more closely the patient and their dynamics in both a static and movement relationship. His overview of Isogai's work and his book, The Isogai Dynamic Therapy, gives a terrific insight as to the complexities of ones walking patterns, postures and torque abnormalities.

I saw inconsistencies in my own ability to diagnosis on some patients which foot turned in more readily, etc. and I saw discrepancies in my treatment effectiveness. I also became a little frustrated with the time it took me to try to challenge these mechanisms and come up with the proper treatment for maximum results.

So What I decided to do was to therapy localize the right hip with the right hand at the same time having them therapy localize there left shoulder with their left hand and see if that

caused a previous strong muscle to go weak. I would then challenge the left hip with the left hand and the right shoulder with the right hand by placing the fingers of the right hand on the back of the shoulder and see if this caused a weakness.

If a weakness was caused on one side or the other I would make sure that it was not just a category II and we would accomplish this naturally by testing with just the hand on the SI joint and the hand off the shoulder. If a category II existed I would correct this first either by structural adjusting or by blocks. I would then challenge the torque pattern that I felt to be there by this method. I would contact the shoulder with one of my hands and the posterior superior spine with the other contralateral and I would pull up, (meaning from posterior to anterior) at the same time and re-check a previous intact muscle. If this caused weakness I would block exactly that way. If I got no weakness that way, but pulled in a similar fashion; but this time contacting the ischium with one hand and the contralateral shoulder with the other and pulling again posterior to anterior while the patient is in a supine position. If this caused weakness, then I would block the patient in that position.

Dr. Goodheart mentioned that the blocking in his technique was for diagnosis and not for treatment except in a few cases where you got a free lunch. But in our regime we use this as treatment by putting it in the specific challenged areas that TL and while the patient is laying on those blocks we will hit K27 bilaterally to release the sacro-spinalis muscles, etc. We will either use the tennis balls under the head to allow the occiput to have free

movement in the crainal sacral mechanism of respiration or sometimes we will put a cervical towel under there with slight traction.

We always therapy localize in this torque pattern for cranial and cervical lesions. We frequently would find a sphenoid involvement, and found it to correct as did other cranial problems readily while they were unwinding so to speak. We found that cervical subluxations would almost fall in by themselves while they were unwinding from this torquing pattern.

If we found a foot or other extremity problem, they would also be corrected while the patient was unwinding on the blocks and seemed to give us a more permanant stay put value and corrected very easily.

The clinical improvement of these patients is very remarkable. Some very complicated torticollis cases, low back, etc. responded very favorably to this and did not yeild a great deal of trauma in correction. Another very interesting observation to me, was that on subsequent visits it would change to the opposite side on some patients. That is, it would be right hip, left shoulder on Monday and on Thursday it would be the reverse or a left hip, right shoulder torque pattern. And the patient would most often report that they had felt much better after the last treatment and we would then correct that exactly as the body brought it forth to correct with the new torquing pattern and again we would see more significant clinical improvement the

next time the patient entered the office. We also found that many muscle group weaknesses would strengthen without the five finger concept other than this torquing pattern.

I am reporting these findings only to add a very small chapter to a very beautiful book that Dr. Goodheart has given us on the gait, their patterns, torques and other findings. This may be one more step to give us another small piece to that puzzle.

REFERENCES

- ¹Goodheart, George, H., Analysis of Gait Patterns, ICAK, Summer, 1983

THE SWALLOW CHALLENGE AND ADJUSTMENT

by John W. Brimhall, B.A.,D.C.

Donald Peterson, D.C.

Abstract:

Watching cineradiography gave us a new insight to the cervical vertebra movement when chewing and swallowing. This lead to investigation of fixations, subluxations and treatment during swallowing.

After the ICAK meeting where Dr. Mestman showed the sacro-occipital mechanism and its effect with splinting and then the bulk of the video was cineradiography of patients chewing and swallowing, etc. My associates and I requested this video and watched it over and over again in one of our study group meetings.

We were amazed at the amount of movement that exists in bones themselves, e.g. the condyle of the mandible. We were also amazed at how the cervical vertebra and especially the atlas to third cervical had to move out of the way as the patient swallowed.

Having a complicated cervical picture myself due to some severe accidents, I am very interested in the cervicals, their treatments and mistreatments.

Repeated viewing of the video showed us that the cervical vertebra did not move as readily on some patients as they did on others when the swallowing mechanism took place. This lead us to an investigation of challenging and therapy localization to the cervical vertebra while the patient was swallowing.

Our findings were that a previously negative TL in the upper cervical region could produce a positive TL if tested while or shortly after the patient swallowed. We found that the vertebra would not challenge on a challenge mechanism many times until after the patient swallowed and testing took place immediately following the swallow.

It became our observation that correction was most easily accomplished in an adjusting technique while the patient swallowed be it a fixation or subluxation.

Our second part of this story might be the way we challenge for fixations and correct them. Being born and raised in Arizona and living a sheltered life, and other wise not knowing what a bagel was, we had to challenge for fixations from the begining. We have always just challenged by pushing on the side of one vertebra at the same time we push on the side of the one above or below it. This readily told us by strong muscle blowing weak or by the bilateral weak muscle going strong which two vertebrae to adjust. I also had the opinion that the sharp quick thrust caused giver and receiver trauma. We therefore developed a bilateral activator thrust that quickly solved the problem. I will demonstrate this and naturally think it is the best in the world since I originated it.

In all humility, we also found anterior fixations that showed up in this swallowing mechanism that we adjusted with the bilateral activator thrust. This cleared out some very complicated cervical syndromes for us.

I would like to thank Dr. Carl Mestman for his contribution by the fine paper and the video presentation that he gave us. And of course I always marvel at the big ideas that Dr. Goodheart contributes, that takes us years sometimes to realize the long range effects and the refinements that are available.

But darn-it George, what's a bagel? !!!!

REFERENCES

¹Mestman, Carl, D.D.S.. The Sacro-Occipital Respiratory Mechanism Appliance (SORMA), in ICAK Collected Papers, Winter, 1982, pp. 127-140.

THORACIC FIXATIONS I AND II:
A MUSCULAR DIFFERENTIATION
Richard J. Caskey B.S., D.C.

Abstract: In this paper, the author describes a modification of the teres major test to differentiate between an upper and a lower thoracic spinal fixation.

As the wealth of knowledge in applied kinesiology continues to grow, it becomes apparent that the more special the question we ask the body (via muscle testing) the more specific the answer is that we receive. One of Dr. Goodheart's earliest and certainly one of his more important discoveries was the ability to identify and locate spinal fixation by the means of specific bilateral muscle testing.¹ I had always considered it odd, that inspite of the tremendous sophistication of our testing procedures, we had only one bilateral muscle test to indicate fixation of the entire thoracic spine. It would seem logical, that if we have a different pair of muscles to test for each area of the cervical spine, why do we not have a different pair for each level of the thoracic spine? I had also noticed for quite a few years, that when I would find a bilaterally weak teres major, as tested via Kendall & Kendall² and Walther,³ the presence of thoracic fixation, as evidenced by motion palpation, as described by Goodheart⁴ and by challenging adjoining segments,⁵ would typically reveal an upper mid-dorsal fixation (usually about T4-T6). But, upon examining many patients by these same methods in the lower mid-thoracic area (usually T7-T10), I would often see signs of fixation without the presence of bilateral teres major weakness.

I usually pride myself as an extremely accurate muscle testor, but about a year ago I was confronted with a patient who had great difficulty attaining the standard position for a bilateral teres major test. That position, as described by Kendall & Kendall⁶ and Walther⁷ being: prone patient abducts and extends shoulder with elbow flexed at 90°, wrists against posterior iliac spine. This particular patient was able to attain this position more easily if her forearms were supinated with her palms towards her skin. While testing the teres major in this "inaccurate" fashion, she displayed a bilateral weakness. To make sure of my accuracy I proceeded to test a strong indicator muscle with her hands in this position to rule out any form of palmar therapy localization (TL), and it was negative. Upon analysing the thoracic spine, I found the presence of fixation to be in the lower mid-thoracic area (T-8- T10). This prompted me to question, what would happen if I tested the teres major in the typical fashion with the forearm pronated (palms away from skin). Although it caused her some increased discomfort to test her in the standard manner, we did and found the teres major to be much stronger in this position

Again, I ruled out any unusual ventral TL; it was also negative.

It was at this point that I started testing every patient for teres weakness with the forearm supinated (palms toward skin) and pronated (palms away from skin). The intention was to see if this was an isolated case or truly a consistent finding. After over a year of testing in this fashion, I have found what seems to be a valuable addition to fixation analysis. My findings are: when the teres major is found weak bilaterally, when tested with forearms pronated, this is an indication for fixation in the upper mid-thoracic spine (T4-T6). When the teres major is found bilaterally weak, when tested with the forearms supinated, this is an indication for fixation in the lower mid-thoracic spine (T8-T10). Many patients have shown the incidence of just one or both of the above fixations, and in each case TL to the pelvis or lumbar area was ruled out. With the patients showing both fixations, correcting only one of the two fixations would abolish the one related mode of teres testing only. Subsequent correction of the other fixation would then alleviate the other mode of muscle testing.

DISCUSSION:

It should be mentioned, that in my own experience with teaching muscle testing, this muscle is often tested incorrectly. Because of the prime actions of this muscle being, shoulder extension adduction, the test should be to exert pressure against the elbows into flexion and abduction: in other words, down and out. I offer this as a reliable means of differentiating the location of a thoracic fixation and welcome you scrutiny and comments. For simplicity's sake, I have referred to the upper fixation as Thoracic Fixation I and the lower as Thoracic Fixation II.

REFERENCES:

- 1 & 4 Goodheart Yearly Research Manual 1970 - pg. 2
- 2 & 6 Muscles - Testing and Function, Kendall & Kendall, Wadsworth 1971
- 3, 5, & 7 Applied Kinesiology Vol. I, David S. Walther 1981

SHAFT AND EXTREMITY BONE TEST

by

SALVATORE V. CORDARO D.C.

In testing for hypoadrenia and hypoglycemia using approved ICAK techniques we noticed a pattern in shaft and extremity testing of bone. The shaft of all long bones were negative to therapy localization while the ends or articular surfaces were positive in all hypoadrenic and hypoglycemic patients.

Having case histories and lab reports plus x-rays we were able to make the following conclusions:

1. Case history supported lack of protein in diet
2. X-ray supported loss of mineral in bone structure
3. Only when shaft showed mineral loss did it TL positive
4. Hair test and thumbnail test not always positive for low protein
5. Blood reports showed low protein and upset albumin-globulin ratio
6. Also noted was a positive TL to joints without x-ray support of demineralization

We were puzzled by this fact but further on along the road one or two years later some of these patients came back with arthritic symptoms and findings. Their joints which previously showed no change now showed distortion and pain in movement.

As you know, there is a good deal of protein in the articular areas of bone. Also noting that these patients were hypoadrenic as well as hypoglycemic it was possible to say that their mineral corticoids and glucocorticoids could not make up the necessary hormone balance to check their inflamatory process. Again, these patients needed adequate protein.

Also odd was the fact that mineral supplementation did not negate the positive findings at the end of long bones as one might think. Only a good source of protein would change a positive TL to a negative one.

Conclusion: TL to joints will indicate pre-arthritic condition in the hypoadrenic and hypoglycemic patient who has a protein deficiency due to poor absorbtion and/or insufficient intake of protein.

IDENTIFYING BODY ENERGIES

By

Sheldon C. Deal, D.C., N.D.

And

Richard Utt

ABSTRACT: Energies differ in the body in their characteristics according to what level you are measuring. The energy of the acupuncture systems differs from the electrical characteristics of neuro lymphatic and neuro vascular points. The doctor may increase his proficiency at treating the human body by being able to use effective body language to distinguish whether these circuits are hyper or hypo.

GENERAL INFORMATION: The picture on a television screen can be seen to rotate in a counter clockwise direction when approached by the north pole of a magnet, and clockwise when approached by the south pole of a magnet. This is a good method to demonstrate the different energies coming off the north and south poles. Based on the law that likes repel and opposites attract, it can be demonstrated that: the index finger on the right hand is positive (south pole), the middle finger is negative (north pole), the ring finger is positive and the little finger is negative, with the thumb being neutral. This pattern reverses itself on the left hand with the index finger being negative and the other fingers following suit. The above can be demonstrated by placing one finger at a time on the surface of a magnet and testing a previous strong indicator muscle.

One of the points to be learned from the above is to use a double finger contact when doing therapy localizing or challenging to avoid

entering a new factor into the equation such as tonifying with the index finger or sedating with the middle finger when using the right hand.

It was Earl Column who first brought it to our attention that you could challenge a point on the body clockwise or counter clockwise to determine direction of correction over a lesion that needed therapy such as a neuro lymphatic.¹ When this criteria was applied to acupuncture points, it was found that it did not follow the same pattern, thus the beginning of the investigation which led to this paper.

ACUPUNCTURE FINDINGS: It was Shafica Karagulla in her book, "Breakthrough to Creativity"², that described points of light extending from the body and the basic energy patterns that surround the entire body containing different vortices. Images of the human torso have revealed electro dermal energy points which correspond to the traditional acupuncture points.³ The scientific community seems to prefer the terminology of electro dermal points rather than acupuncture points.

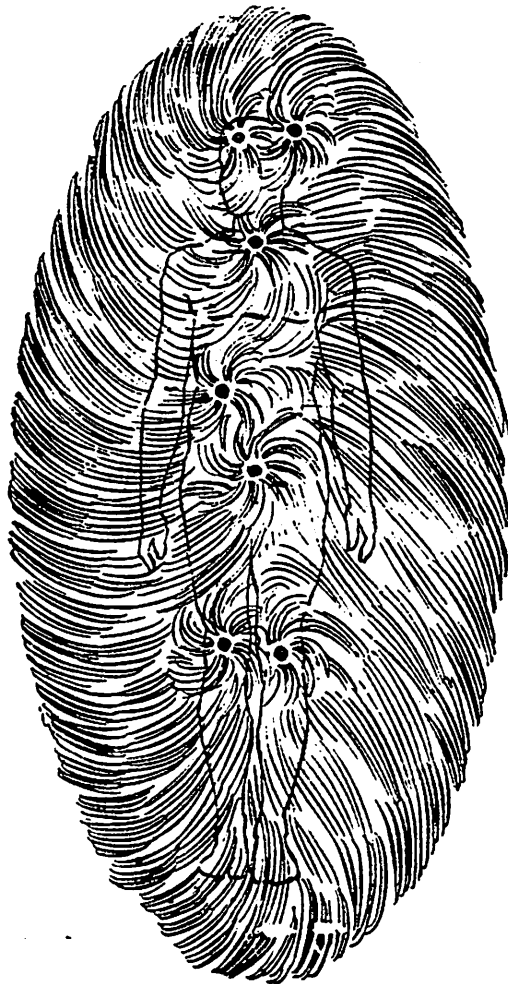
Our research has shown that there is a definite connection between individual acupuncture points and individual muscles. We contend that it is not by accident that when you add up the number of acupuncture points on each side of the body plus the conception and governing vessels that it closely approximates the total number of muscles in the body. Due to the large number of points involved and the complexity of the research, the progress has been slow. Listed below is a partial list of acupuncture points identified with specific muscles.

Each muscle has a reciprocal acupuncture point and also an association with a TMJ muscle, but that will be the topic of a future research paper.

Lung 1	Supinator
Lung 11	Anterior Deltoid
Large Intestine 1	Popliteus
Large Intestine 20	Anterior Tibialis
Stomach 1	Anterior Serratus
Stomach 45	Coracobrachialis
Spleen 1	Pyramidalis
Spleen 21	Gluteus Medius, Anterior Division
Heart 1	Pectineus
Heart 9	Teres Major
Small Intestine 1	Pubococcygeus
Small Intestine 19	Semispinalis Capitis
Bladder 1	Quadriceps
Bladder 67	Temporalis, Parietal Division
Kidney 1	Rectus Femoris, Straight Head
Kidney 27	Gastrocnemius
Pericardium 1	Deltoid
Pericardium 9	Rectus Abdominus Lateralis 4th Section
Triple Heater 1	Sternocleidomastoid
Triple Heater 23	Buccinator
Gall Bladder 1	Biceps Femoris Longhead Tibial Division
Gall Bladder 44	Teres Minor
Liver 1	Gluteus Medius Posterior Division
Liver 14	Biceps Femoris, Longhead
Heart 7	Triceps, Lateral Head
Bladder 30	Biceps, Short Head

BASIC ENERGY PATTERNS: In physics we are taught that magnetic energy and electrical energy differ in their axis by 90° and since light takes on the characteristics of both, but is neither one, it is called electromagnetic. Thus the electromagnetic spectrum is created with all its divisions according to different wave lengths. The human body has energy patterns that parallel the surface of the body and seem to be supplied by the vortices called chakras⁴ or pre and post ganglion plexi.

Under normal conditions this energy field turns clockwise over the surface of the body and parallel to it.



The human body also has the electro dermal or acupuncture points radiating out from the body at right angles to the surface of the body. Since these two energy fields (the chakras and acupuncture points) differ in their axis by 90° , we believe this accounts for the difference in their challenge characteristics and thus the therapy application.

HYPO VERSUS HYPER: In applied kinesiology it always helps to understand what we are doing, if we realize what the normal is for the particular circuit we are working on. In the case of a neuro lymphatic point which is supplied by the energy field that parallels the body, remember that that field normally turns clockwise. If we are dealing with a hypo (sedation) condition then manually torquing the lesion clockwise will make a weak muscle indicator go strong or manually torquing the lesion counter clockwise will make a strong muscle indicator go weak. If we use a magnet over the lesion, the south pole (positive) will make a strong indicator muscle go weak and the north pole (negative) will make a weak indicator muscle go strong. (Remember, as we look in the direction the north pole is pointing we see it turning counter clockwise, but from inside the body looking out at the north pole, we would see it turning clockwise).

Now if we take a neuro lymphatic lesion that is hyper (tonified), then manually torquing the lesion clockwise will make a strong indicator muscle go weak or manually torquing the lesion counter clockwise will make a weak indicator muscle go strong. If we use a magnet over the lesion the south pole will make a weak indicator go strong and the north pole will make a strong indicator go weak.

All of the above changes to the opposite when we deal with acupuncture points because they are supplied by an energy field that runs at right angles to the surface of the body. If the acupuncture point is hypo (sedated) thus our specific muscle indicator is weak in the clear, then manually torquing the acupuncture point clockwise or touching with a negative finger will make a neutral strong indicator muscle go weak or the specific muscle for that particular acupuncture point

will remain weak. When the same acupuncture point is manually torqued counter clockwise or touched with a positive finger, the specific muscle for that point will go strong. When the same acupuncture point is approached with the south pole of a magnet the specific muscle for that acupuncture point will go strong and a neutral indicator muscle will stay strong. If the same point is approached with the north pole of a magnet the specific muscle for that acupuncture point will stay weak or a strong neutral indicator muscle will go weak.

Now if we take an acupuncture point that is hyper (tonified) and the specific muscle for that acupuncture point is strong in the clear and will not sedate using the normal methods, (example: PMC stays strong when ST-45 and LI-1 are contacted at the same time), then manually torquing the acupuncture point clockwise will cause the muscle to stay strong and manually torquing the acupuncture point counter clockwise will cause the indicator muscle to go weak. Please note that all manual torquing should be done with a double finger contact (positive and negative) or the thumb which is also neutral. If the hyper acupuncture point is approached with the south pole of the magnet the indicator muscle will go weak or if the north pole of the magnet is used, the indicator muscle will stay strong.

Due to all of the above being rather involved and complicated when you are first exposed to it, we have devised the following chart to help keep it straight in your mind as you work with these principles.

BODY ENERGIES				
Challenge Application	N.L., N.V., Stress Receptor, ect.		Acupuncture	
	HYPO	HYPER	HYPO	HYPER
Manual C.W.	strong	weak	weak	strong
Manual C.C.W.	weak	strong	strong	weak
South Pole	weak	strong	strong	weak
North Pole	strong	weak	weak	strong
+ Electricity	no change	no change	strong	weak
- Electricity	no change	no change	weak	strong
Positive Finger	weak	strong	strong	weak
Negative Finger	strong	weak	weak	strong

FURTHER CONSIDERATIONS: The bottom line of all this challenging is to be in a better position to make more accurate application of therapy to our patients and thereby increase the percentage of favorable results. For example, if we always use a double finger contact (neutral) when we have the patient therapy localize or when we the doctor challenge, we will avoid asking the body too many questions at one time and thereby get clearer answers to our probing questions. Once we find a lesion that does T.L. or challenge then we can reapproach the lesion one finger at a time (once with a positive finger and once with a negative finger) to tell if the lesion is hypo or hyper and consequently the correct therapy becomes obvious.

Another application of these principles is that you may turn off (sedate) a certain muscle by placing the north pole of a round magnet over the specific acupuncture point and hold a positive finger on the point through a hole in the center of the magnet, while you search for a certain nutrient, cell salt, amino acid, ect., that

will turn it back on, and thus you have identified a specific nutrient for that muscle. Perhaps it is awkward to hold one finger in the center of the magnet and you need both hands to do your searching, you may shine a laser light through the magnet onto the acupuncture point and now the muscle will stay weak by itself until you do something to turn it back on. Obviously this method can be used for therapy also, as the south pole against the skin with the laser directed through the center will produce tonification, or there may be cases where you want to sedate using the north pole and laser.

It is interesting to note that when you tonify or sedate a normal muscle that the antagonist muscle does the opposite. For example, if you sedate the biceps, the triceps become hypertonic or if you tonify the biceps the triceps become weak in the clear. Even more interesting is, in a normal circuit (meaning that there is no switching of any kind going on) when you tonify or sedate a muscle on one side of the body, the same muscle on the other side (contralateral) of the body does the opposite. For example, when you tonify the biceps on the right, the biceps on the left become weak in the clear. Again, it becomes obvious that by knowing the above normal characteristics of the body it becomes advantageous in tracing down energy problems in the complicated patient.

CONCLUSION: Having been an early developer of an electronic muscle testing machine with a hand held transducer and having seen how that the machine would not always agree with artful manual muscle testing, I have in recent years felt like a member of a silent conspiracy. Meaning that while we were searching for a scientific explanation as

to why muscle testing worked, including granting research, deep inside I felt we were barking up the wrong tree. The scientific search always included using electronic equipment. It is my humble opinion that the phenomenon of muscle testing is a result of the interplay of energies between the testor and the testee. If this be the case, then we will never explain it by using a machine which is void of half the energy required. Perhaps nowhere else to date has this interplay of energies in applied kinesiology been exemplified more than in this paper.

BIBLIOGRAPHY

1. Dr. Earl Colum, "Cranial Indications for a New Treatment of the Sacroilliac Articulation with an Associated Involvement of the Triceps and Psoas Muscles", I.C.A.K. Summer Collected Papers 1979.
2. Dr. Shafica Karagulla, "Breakthrough to Creativity", DeVorss and Co., Inc. 1967.
3. Ion Durmitrescu, "Electrographic Imaging in Medicine and Biology", Neville Spearman Ltd., 1984.
4. Dr. Shafica Karagulla, "Through the Curtain", Devorss and Co., Inc., 1983.

THE PHOTOTROPHIC EFFECT OF WHITE LIGHT ON ACUPUNCTURE POINTS

GERALD DEUTSCH D. C.

ABSTRACT: This paper will discuss the various effects of white light on acupuncture points and their diagnostic values.

We have all been exposed to various systems of acupuncture. The result of this is the acceptance of certain ideas that you feel will or have worked for us. I have had the occasion to take some acupuncture courses in the past. Gradually I have developed a procedure that seemed to work best for me. This procedure involves the Voll (1) system of acupuncture, and some auriculotherapy techniques that have impressed me.

We all have been avoiding references of "therapy localizing"(2) vitamins, drugs, herbs, homeopathics, allergenic foods and whatever therapy localizes. In the past we in AK felt that therapy localizing (holding on the body) those substances was metaphysical. This attitude may have been promulgated by the fact that we couldn't explain this phenomenon, so we must avoid it. People that were tested in this manner accepted the testing with the proverbial raised eyebrow. Because the phenomenon could not be explained, and in order to defend the honor of AK we were asked not to practice this procedure. It may be time for us to reevaluate our concepts of this procedure using some different standards.

Dr. Reinhold Voll of Germany using his "Dermatron" has been "therapy

DEUTSCH

PAGE 2

localizing" drugs and homeopathics for over 15 years. The method he uses merely places a receptacle for what he wants to test in the electrical circuit of his acupuncture instrument. Simply, he has a standard of normal range on the instrument. If the instrument reads high or low out of the range of normal, placing medications of any type may bring the electrical potential of the reading to a normal. When this occurs these medications are then recommended to the patient. This is an example of an electronic method of analysis.

Dr. Paul Nogier(3) of France the developer of Auriculotherapy previously used an electrical current to neutralize specific points in the ear that related to specific body parts. His new concept which he now calls Auriculomedicine, "therapy localizes" many drugs and allergens to the ear. The modus operandi in the interpretation of this phenomenon is the radial pulse.

There has been work done in other professions based on this idea. Harold Nelson, Department of Chemistry, The University of Texas at Austin, in his paper "Molecular Vibrations as the Basis of the Allergic Response" (4) states, "that the human skin has both a vibratory sensitivity, and that this sensitivity can be reproducibly and reliably correlated to a change in skin potential (voltage)". He further states "it is clear that an allergy test based in part on the body's response to a vibrational stimuli emanating from a substance enclosed in a glass vial placed on the skin is in complete harmony with known physical principles". He goes on to state that "molecular

DEUTSCH

PAGE 3

vibrations are associated with the sense of smell(5)". He has references from biological cybernetics (6) that there has been work done on the cutaneous sensory responses to these vibrations.

I have been studying this interpretive idea for over two years and at this time I can unequivocally state that this system works, and will give a vast amount of information. Please note figure 1, position for taking pulse. The procedure is to place an offending substance near the ear, while taking the pulse. Place the thumb just proximal to the radial notch and then roll inward onto the radial artery, holding the thumb at a vertical angle of approximately 110 degrees. After you feel the intensity, magnitude and duration of the pulse, you will notice the magnitude changes after a few beats. Nogier named this the vascular autonomic signal(VAS). The abnormal magnitude remains if there is a problem. This change indicates problems with the substance near the ear. This reminds me of a statement Dr. George Goodheart made a few years ago, "the ear is an antenna". Now with electronic evidence, and some physiological evidence, what more proof do we need to do more research of this phenomenon? Our criteria for a problem in the body still lies with the weak muscle. We still must use this as our major guide with any problem we encounter.

Once you become proficient in pulse analysis and able to interpret the VAS according to Nogier, the detection of certain problems in the body becomes very apparent. The secret ingredient here is, can we translate this into a muscle test? What I'm intimating is, when the

DEUTSCH

PAGE 4

VAS is positive, there will be concomitant muscle weakness in the body. The VAS can be triggered by many stimuli, such as foods, electrical energy, acupuncture point contact, heat, cranial fault disturbance, lymphatic stimulation (when needed), heat, light and probably many other factors we are not aware of yet. The point to remember, though all these factors can cause an intact muscle to weaken this can become a researchers nightmare. All of these factors surely will gradually be investigated.

One of the diagnostic procedures of auriculomedicine utilizes an intense white light, similar to a transilluminator. The light is flashed onto the ear with a particular protocol to determine if a problem exists in the body. While this procedure is being done, the pulse is monitored manually. If there is an existing problem, the VAS becomes positive. It was at this time I tried to see if there would be a weakness in an intact muscle. As I had suspected, an intact muscle weakened when there was a positive VAS. For example, with a patient that has a back problem, flashing the lower crus of the antihelix (fig. 2) causes the VAS to become positive. Testing an intact muscle while directing white light onto the area representing the low back, causes the muscle to weaken. You might also flash the area, but you must test the muscle within 15 seconds of the flash of the white light. This was the key that plain white light in the presence of a positive acupuncture point that needed attention, would cause a muscle to weaken.

DEUTSCH

PAGE 5

I have felt for a long while, that Voll's work on acupuncture was monumental. What he did that was different was, instead of defining each accupuncture point with a treatment formula, he assigned the specific points to organ parts. Our Western thinking relates to this theory more realistically than the Chinese or Japanese formula treatment does. Please note fig. 3 and 4. These are examples of how he has integrated his work to the acupuncture system. The diagnostic points of Voll can be stimulated with light to confirm a diagnostic point that we may have found previously in the ear. If we carefully check the ear with bright light and then dim light, a muscle weakening may show up either way. If bright light elicits a muscle weakness this would be a high energy organ or excess. If a dim light elicits a muscle weakness this is a low energy organ or deficiency. High energy organs are treated with gold needles. Low energy organs are treated with silver needles or the appropriate therapy based on your knowledge of acupuncture. As you learn the Voll points and diagnostically scan the CMP (control measurement point:is a master diagnostic point indicating a malfunction in the entire meridian) with bright light or dim light, you will be able to predict what part of the organ is in trouble. You may find the organ using Voll's type of diagnosis, then go to the ear to confirm the auricular point. Either one or both may be treated with laser, electric, needles, or the therapy that you feel may be needed to cause a beneficial improvement in the physiology of the organ.

Some years back, Dr. Goodheart mentioned that if you touched an

DEUTSCH

PAGE 6

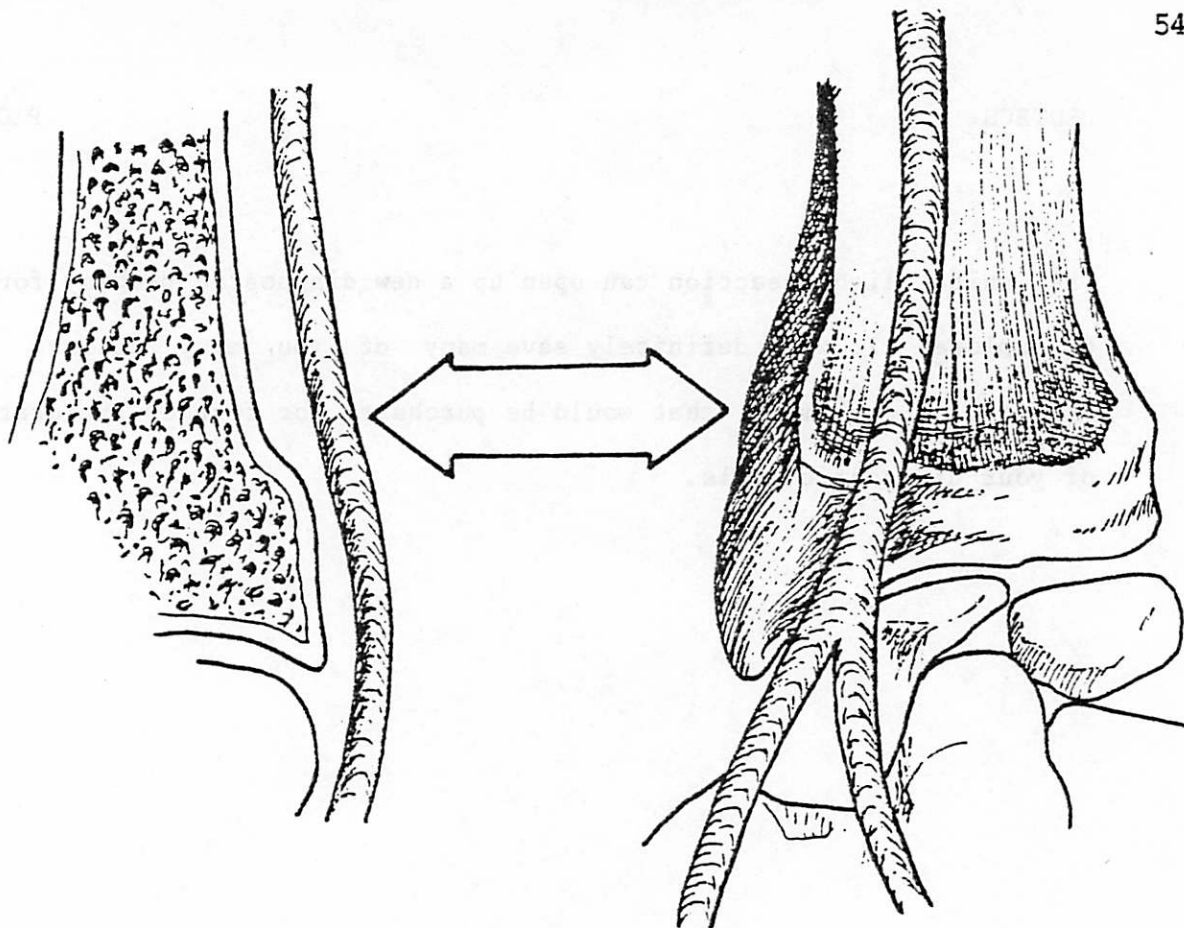
auricular point with an organic substance, a muscle would weaken. If you utilize a needle point or a toothpick directed toward an active point the VAS becomes active, also an intact muscle weakens. At this point I'd like to mention that the traditional auriculotherapists may hold a substance at the ear point while monitoring the pulse. If the substance is needed, the VAS diminishes. I might mention also that the substance is placed on the body while the ear point is searched. In actual practice, the active point is neutralized in the presence of the proper substance whether it is nutrition, drugs or homeopathics. When muscle testing an active ear point, the muscle test is neutralized in the presence of the corrective substance. The Voll point becomes negative to the light reflex also.

A homeopathic substance when needed by the body will cause an immediate muscle weakness when the substance is tested orally. When presented to the auricle within a few inches, the VAS becomes positive. Oral testing of a homeopathic will only work once, because of the need and the immediate absorption of the product. The interesting thing about homeopathics is that if a particular organ needs the product and something is specifically therapy localizing, the muscle strengthens. I'll elaborate on this phenomenon in a future tape recording. The point that I'm trying to create is, the white light reaction on the acupuncture point whether it is a weak muscle reaction or a positive VAS is obliterated in the presence of the product needed. It is neutralized whether it is oral, placed on the body or near the ear.

DEUTSCH

PAGE 7

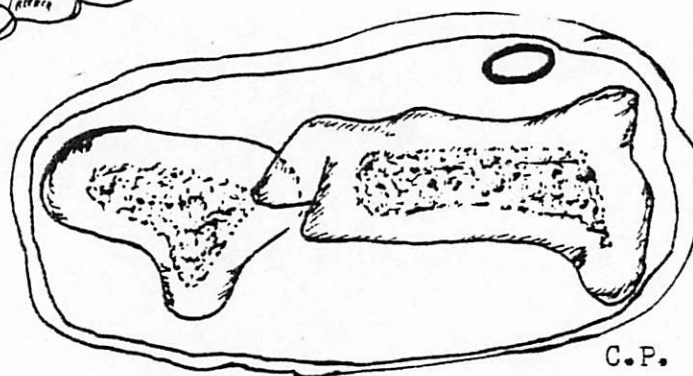
The white light reaction can open up a new diagnostic pathway for us to explore. It will definitely save many of you many dollars for diagnostic equipment that would be purchased for further exploration of your diagnostic goals.



Radial zone favorable to R.A.N. exploration.



radial side
flanc radia



radial artery
artère radiale

Fig. 1.

cubitus
ulnar

C.P.
Radius
Radius

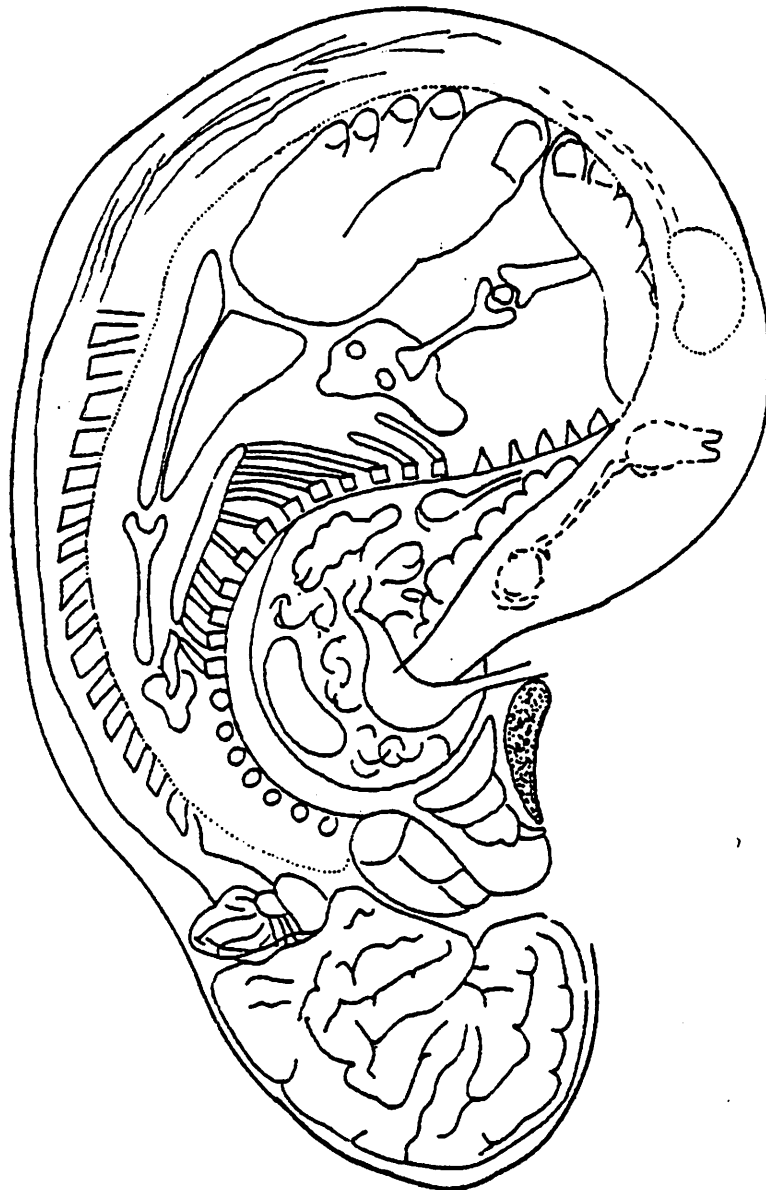
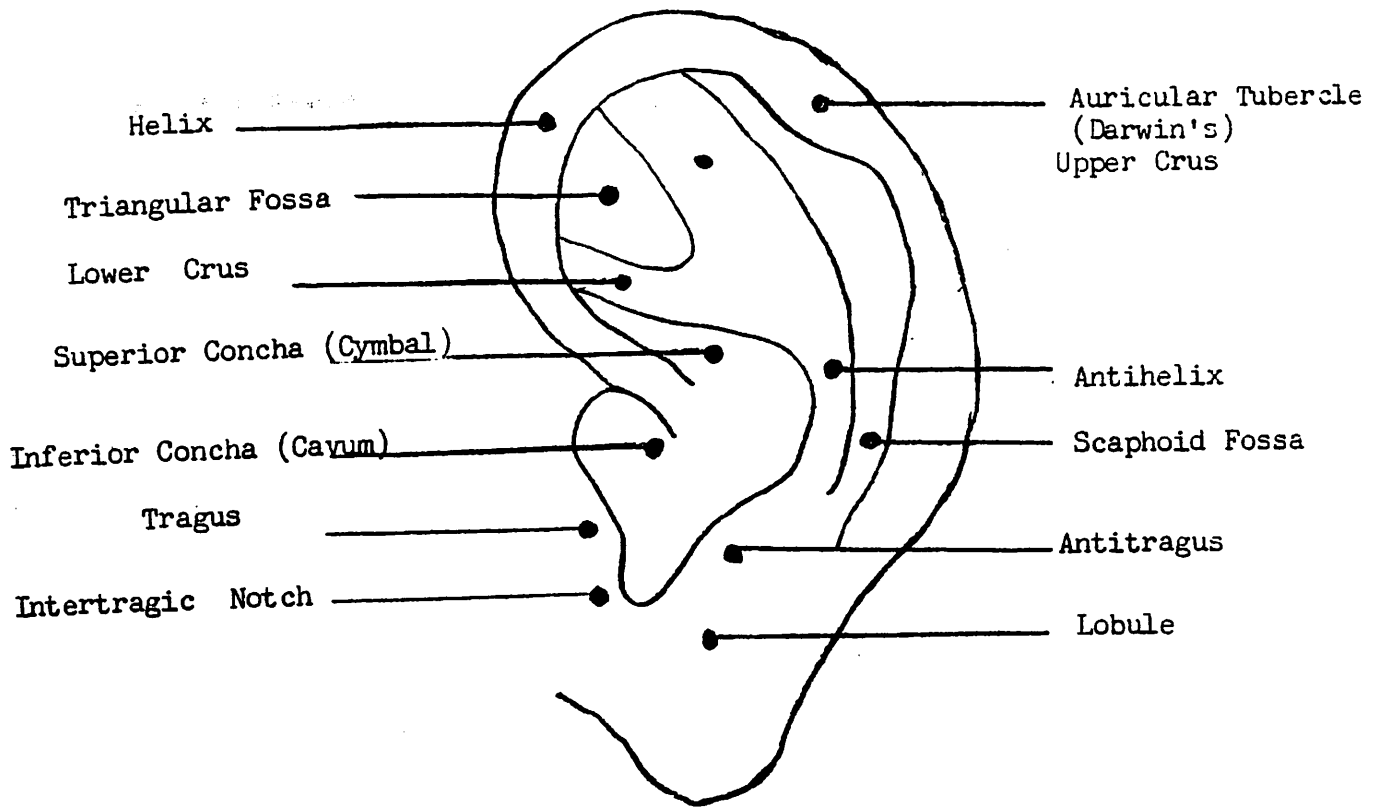


Fig 2.

Points of the heart meridian

Palmar
right hand, volar aspect

right hand, dorsal aspect

Heart Meridian

See V. I and V. II, Pl. 1, 2 and Pl. 1a and 1b

Begins: in the pre-axillary line above the inferior edge of the third rib
Ends: inner side of the little finger

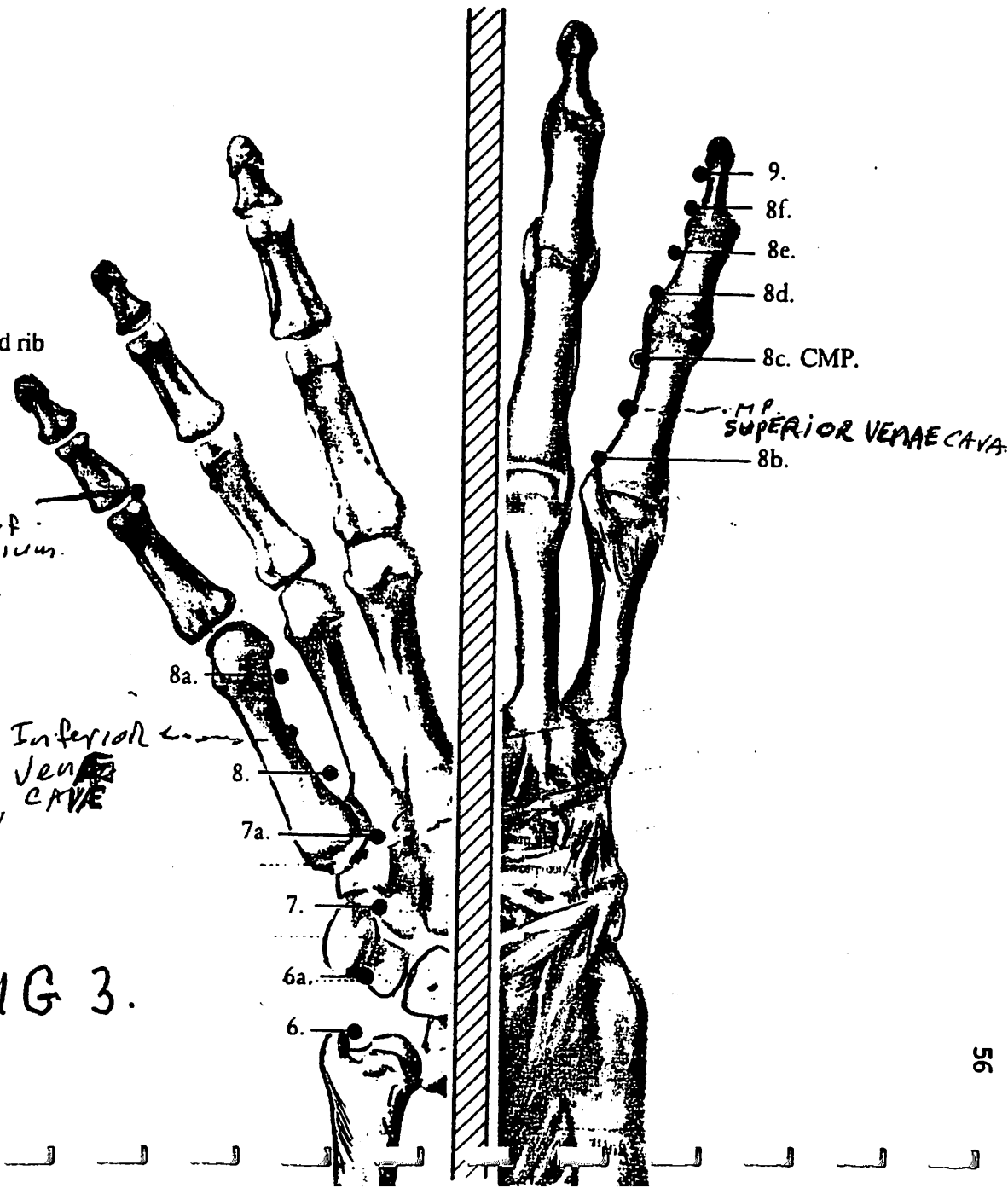
- 9. = right: Aortic valve
left: Pulmonary valve
- 8f. = Subendocardial lymph vessel net
- 8e. = Cardiac plexus. (V. III, Pl. 5)
- 8d. = Myocardial lymph vessel net
- 8c. = CMP. for the heart (V. II, Pl. 34)
- 8b. = Endocardium
- 8a. = Pericardium and sub-pericardial lymph vessel net (V. II, Pl. 6)
- 8. = right: Tricuspid valve
left: Mitral valve
- 7a. = right: Atrioventricular node
left: Left branch of the bundle of His
- 7. = Conduction system for the heart, right and left respectively
- 6a. = right: Sino auricular node (pacemaker)
left: Left sino auricular bundle
- 6. = Myocardium, right and left respectively.

*Lymph
VESSELS OF
PERICARDIUM.*

*M.P. Inferior
VENA
CAVA*

*M.P.
SUPERIOR VENA
CAVA*

FIG 3.



Small Intestine Meridian

See V. II, Pl. 9 and 10a

Begins: Lateral side of the little finger

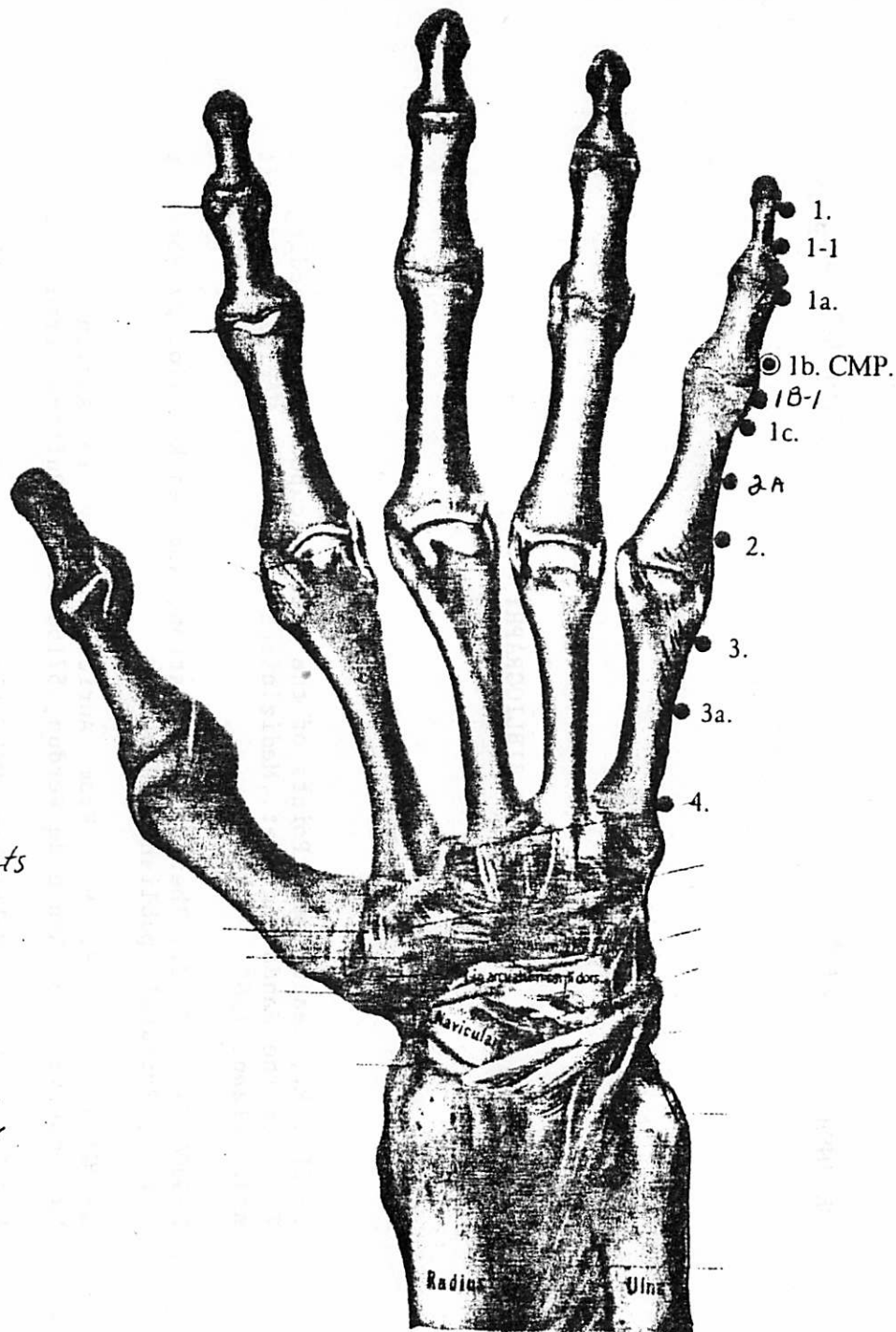
Ends: Middle of the lobe of the ear

- 1. = right: Terminal portion of the ileum (V. II, Pl. 9)
left: Ileum left side (V. II, Pl. 1a)
- 1.1 = right: Lymph vessels of the duodenum I - III together
with the lymph vessels of the terminal ileum
left: Lymph vessels of the duodenum IV, jejunum and ileum
- 1a. = right: Superior mesenteric plexus (V. III, Pl. 5)
left: Inferior mesenteric plexus
- 1b. = CMP. Small intestine (V. II, Pl. 34)
- 1c. = Peritoneum in the region of the duodenum I - III, and the terminal ileum
left: Peritoneum in the region of duodenum IV, jejunum and ileum
(V. II, Pl. 9, Pl. 14a)
- 2. = right: Duodenum, interior horizontal portion
left: Jejunum (V. II, Pl. 10a)
- 3. = right: Duodenum, descending portion (V. I, Pl. 1) *watch Biliary Ducts*
left: Duodenum, flexure between the duodenum and the jejunum
- 3a. = right: Duodenal papillae (V. I, Pl. 1)
left: Peyer's glands
- 4. = right: Duodenum, upper horizontal portion (V. II, Pl. 9)
left: Duodenum, ascending portion

1B-1. Peritoneal Lymph Rt + Lt. Section Respectively

2A. - Eye

Fig. 4.



BIBLIOGRAPHY

- 1-VOLL, R., Measurement Points of the Electroacupuncture According to Voll on the Hands and Feet., Medizinisch Literarisch Verlagsgesellschaft mgH, Uelzen, 1982
- 2-GOODHEART, G. J., Therapy Localization, Applied Kinesiology Workshop Manual, Privately published 1970
- 3-NOGIER, P. F. M., From Auriculotherapy To Auriculomedicine, Maisonneuve, 386, Route de Verdun, 57160 Sainte-Ruffine, France, 1983
- 4-Nelson, H. C., Molecular Vibrations as the Basis of the Allergic Response, Dept. of Chemistry, The University Of Texas At Austin, 1977
- 5-DEMERDACHE, A. and WRIGHT, R. H. in "Olfaction and Taste," Hayashi, T., Ed., Pergamon Press, New York, pp. 125-166, 1967.
- 6-IDE, H. and OBATA, S., Quantitative Measurement of Cutaneous Sensory Response to Vibration, Biological Cybernetics, Vol. 19, 131, 1975

NEGATING GLUTEUS MAXIMUS RECRUITMENT DURING SACROILIAC THERAPY LOCALIZATION

By Daniel H. Duffy, D.C.

ABSTRACT: The gluteus maximus contraction during prone testing of the hamstrings is a major recruitment which interferes with diagnosis of the sacroiliac joints in the prone testing position. Activation of the gluteus maximus by thrusting of the pelvis forward (into the table) eliminates this problem and produces positive findings in pelvic categories which often requires more time consuming techniques for proper analysis.

I read with interest, the paper by Christopher L. Harrison, D.C., published in the ICAK papers published for the winter 1982 meeting and recommend a reading of that paper as background information for this paper.

There are many ways to elicit a positive finding in the pelvis and in the many attempts to quickly uncover, especially the category one in a very strong individual, it was noted time after time that the patient would often "lock" the entire buttock area and elevate it slightly during the hamstring testing during therapy localization.

It was found that having the patient thrust the pelvis forward into the table uncoupled this locking effect and allowed for fast, easy testing of the hams. It appears that thrusting the pelvis forward activates the gluteus maximus in a different direction and allows for this improved ease of testing. Any slight elevation of the pelvis during the hamstring test will cause the locking and therefore calls for not only the conscious effort of the patient to desist in this movement but actually turn the gluteals on in a different direction.

This technique will eliminate a great deal but not all of the problems in quick identification of pelvic categories and has been used effectively by me for about two years.

REFERENCES

1. Harrison, Christopher L., D.C., "The Function of The Gluteus Maximus", Collected Papers of the Diplomates, Winter Meeting, 1982.

FORMULA NUMBER 6147, ELECTRON POISING

EVALUATION OF A NEW COMPOUND

By Daniel H. Duffy, D.C.

ABSTRACT: A new compound prepared by Standard Process Labs has been found to be highly effective in negating muscle weakness produced by split brain activity. 94 of 100 patients were found to respond favorably to manual muscle testing according to Applied Kinesiology protocol.

Early in 1983 this writer recommended a formulation to S.P. Labs for use in split brain activity. The following formula was prepared;

Vitamin A 600 IU
Vitamin C 1.25 mg
Vitamin G .075 mg
Iron 1.0 mg
Spleen (as a source of SOD) 3.0 mg
B-12 .2 mcgm
Beta-Carotene 25.0 IU
Vitamin E (with natural traces of selenium) .6 IU
Vitamin K .1 mg
Chlorophyll .8 mg

Protocol for testing was a T.S. line indicator muscle which did not show weak in the clear but became weak on split brain activity which in turn responded by strengthening following tasting of the compound. (placement on top of the tongue)

Testing was performed prior to any therapeutic corrections to the patient.

G.J. Goodheart Jr., D.C., research chairman of the I.C.A.K. reported 100% effectiveness of the compound shortly after beginning his tests which were performed at the same time in Detroit. Dr. Goodheart also reported the compound to be highly effective in negating the effects of weakness found in the new Strain/counterstrain technique.¹

REFERENCES

1. Goodheart, G.J. Jr., Detroit, Michigan, Research Director I.C.A.K., personal communications.1983

TECHNIQUES FOR CORRECTION OF FIRST RIB HEAD

PALPATORY PAIN

By Daniel H. Duffy, D.C.

ABSTRACT: Pelvic and spinal corrections have an immediate effect on the reduction of palpatory pain at the first rib head. Category one and two lesions of the pelvis, Logan Basic Contacts on the sacrotuberous ligament, sacroischial respiratory correction, dorsal spine manipulation, and Limbic Technique all directly and effectively aid in the often total elimination of this palpatory pain.

PELVIC CORRECTIONS

Correction of the category one lesion is a major step in reducing first rib head pain (FRHP) on both sides. However, honest evaluation of the remaining palpatory pain following this correction is often not satisfactory and is the indication that other lesions are present. By far, most lesions are on the right side and most leg deficiencies are found on the right with percentages that may well approach the ratio of handedness in the population at large.

Correction of category two also has a profound effect on FRHP on the lesioned pelvic side with little or no pain found on the opposite rib head in most cases. Both of these observations were originally made by Dr. DeJarnette many years ago.¹

Following category correction, assess FRHP and if still present, contact the sacrotuberous ligament and challenge for correct line of drive and make several light stretching thrusts with the thumb. This has an astonishing effect on the FRHP and is an excellent confidence builder for the patient and the doctor. This is performed in the manner of the Logan Basic Contact.²

The next step is to correct for sacroischial respiratory technique³ which is a modified "scoop technique" used by the DeJarnette SOT practitioners. Again, récheck of the FRHP will show a surprising reduction.

SPINAL CORRECTIONS

This area should start with palpation of the SOT Trapezius Indicator Line with a slight modification. Start your palpation at the atlas bilaterally and continue on down the trapezius line. This will directly pick up cervical problems. Identify and correct the dorsal subluxation/s especially upper dorsal fixations which are common. Following these corrections reassess FRHP which may be now totally abolished. Correct cervical intrinsic muscles with origin/insertion and golgi tendon organ and muscle spindle techniques and adjust cervical spine. Simple movement of the cervical spine into adjusting position will often elicit the corrections without an adjustive thrust following muscle corrections, however this writer recommends following through with a light thrust to insure activation of stretch reflexes in the GTO's. It is this writers opinion that what occurs in an adjustment is activation of the GTO which inhibits the offending muscle and causes it to "let go" so that the opposing muscle can effect rebalancing which means that velocity of thrusting may need to be gaged more carefully. I.E.,

challenging and adjusting may need to be performed at different speeds at different levels of the body. Speed of challenge may be proportionate to muscle and tendon size and may help to explain the difficulty in eliciting a challenge response in obvious subluxations.

L I M B I C T E C H N I Q U E

Therapy localization of the cervicodorsal junction bilaterally often does not elicit positive findings, however retesting with the head turned to the left and right often produces positive findings, especially when there is FRHP after all corrections above have been made. This calls for challenge of the seventh cervical against the first rib head. (pulling them apart) Correction is a thumb move adjusting the seventh cervical away from its ipsilateral rib head and then a traction move, down on the first rib head with other hand tractioning skull in opposite direction. (pulling apart on skull and first rib) Following this correction palpation of the FRHP will usually bring an unelicited comment from the patient about how much better it is. Occasionally both first rib heads require a traction type adjustment.

S U M M A R Y

A list of the items effecting FRHP has been presented. Many other problems cause FRHP however those presented are very common and quickly identified and corrected. All of these corrections can be made in less than three minutes. Most category one lesions are on the side of the short leg and found on the right. Category two can be either side, long or short leg. Most limbic adjustments are on the right side. (found with head turned to the right) Most sacroischial respiratory problems are found needing inspiration correction. (push sacral apex and ischium together on inspiration.) Imbalances in sacrospinalis, trapezius, quadratus lumborum etc. which accompany lesions herein mentioned will negate positive effects of the approach if left uncorrected. Many category ones will not show therapy localization or rib head pain when the patient has been taking analgesics. Use pinch/scratch and RNA to elicit positive findings in these cases. When lesion side is not the short leg in category one try auxiliary K27 contacts. There are very few instances where the adjustive thrust is made on the short leg side in a category one and these are usually on acute patients seen daily who have shown both category one and two, one following the correction of the other.

R E F E R E N C E S

1. DeJarnette, M.B., D.C., Sacro Occipital Technique, privately published, Nebraska City, Neb.
2. Logan, Hugh B., D.C., Logan Basic Technique, Logan College of Chiropractic, St. Louis, Mo.
3. Goodheart, George J. Jr., D.C., Applied Kinesiology Research Manual, Detroit, Mich.

HIDDEN DURAL TORQUE PROBLEMS

J.V. Durlacher, B.A., D.C. - James D. Hogg, D.C.

ABSTRACT: This paper deals with discovering a method of diagnosis to uncover hidden dural torque problems, particularly accompanied by the mid-pterigoid strain and counter strain condition.

INTRODUCTION: It has been observed by the authors that in a number of incidences, the dural torque condition is not discernable with ordinary diagnostic procedures; ie., placing DeJarnette blocks in contra-lateral positions under the ilium and shoulder, or by having the patient raise one leg as if taking a step and testing the opposite psoas and piriformis, or by therapy localization of the Category I pelvic fault with one hand up and one hand down. ¹

METHOD: To uncover these hidden dural torque faults, the examiner should have the patient supine and therapy localize the TMJ bilaterally. Patient is then requested to flex the head and neck forward as far as possible, bringing the chin on the chest and then to clench the teeth as hard as possible. Then relax the neck by laying back on the headrest and clench the teeth again. A strong indicator muscle is then tested. If it weakens, have the patient quickly take one hand off. If the indicator muscle remains weak, the side of the jaw being therapy localized is the side involved. If the indicator muscle becomes strong, therapy localize the opposite side and the indicator muscle will become weak.

Palpation of the medial pterigoid muscle on the side of therapy localization will show extreme tenderness as compared to the non-involved side. Correction using strain and counter strain technique is then completed. At this point, the pelvic distortion will show under normal diagnostic procedures if it is present.

CONCLUSION: This procedure has been used by the authors in fifty cases.

¹ Monthly Research Tapes - George J. Goodheart, Jr., D.C.

ANOVA
(ANALYSIS OF VARIANCE)

by

Joseph S. Ellison, D.D.S.

ABSTRACT: ANOVA is one of the most important and useful statistical tests in current usage. It allows the investigator to determine the effects of several different treatments on a given population. ANOVA, therefore, greatly expands the investigators tools in determining the significance of research results. Once the basic principles are understood; calculations are easily performed, since ANOVA uses simple mathematical formulas. All clinical investigators should be at least familiar with the underlying principles involved in ANOVA and other frequently used statistical tests. Clinical studies must at least incorporate basic statistical principles in order to qualify as valid scientific research.

The t test, described previously, was used to compare the means of two populations.¹ If the t test showed that the means of the two populations, in question, were similar it was inferred that there was no statistical difference between the two populations. This inference was drawn by the use of the null hypothesis. The null hypothesis places the burden of proof on the investigator to prove that there is a statistical difference between the two population means. If the two means were similar the statistical formula describing the result was $H_0 : \mu_1 = \mu_2$ where H_0 is the null hypothesis, μ_1 is the mean of the first population and μ_2 the mean of the second population. If the population means were dissimilar, the statistical result was written $H_a : \mu_1 \neq \mu_2$ where H_a was the alternative hypothesis and μ_1 and μ_2 the respective population means. When the alternative hypothesis was true, the means of the two populations were statistically different from one another and there was thus a statistically significant experimental result.

In many cases, the investigator wants to compare more than two sample means. The null hypothesis is stated $H_0 : \mu_1 = \mu_2 = \mu_3 \dots \mu_n$. Using the t test in this instance would cause difficulty. The comparing of three groups requires 3 t tests. If the 3 tests are computed at the .05 level of significance there is nearly a 15% chance that an erroneous conclusion will be reached. Likewise, comparing 8 populations would require 28 t tests and allow a prohibitive type I error. ANOVA is a powerful statistical tool that allows the comparison of several population means.

The previous paper¹ showed that variance = $\frac{\sum(x-\bar{x})^2}{n-1}$ where:

\sum = sum of

x = value of each sample in the population

\bar{x} = mean of all of the samples in the population

n = number of samples in the population

$n-1$ = degrees of freedom for the given population

The formula shows that the variance is directly proportional to the deviation of the samples from the mean $(x-\bar{x})^2$.

Suppose you chose 5 people at random from a given population and exposed each subject to 3 different levels of treatment. You, of course, ascertained that your given population was a reasonable representation of the target population as a whole. You would begin by diagramming your results as shown in table I.

Table I

<u>Patient</u>	<u>Treatment level I</u>	<u>Treatment level II</u>	<u>Treatment level III</u>
A	10	7	4
B	12	6	8
C	9	5	6
D	8	12	10
E	11	10	2
Total	50	40	30
Mean (\bar{x})	10	8	6

Table I shows that there are different results for each treatment level. For example, Treatment level I gives varying results of 10, 12, 9, 8, 11. This difference in results for the same treatment is due to experimental error. The error effect is produced by the sum of all uncontrollable and unknown factors. The error effect includes such factors as genetic background, operator prejudice, placebo effect² etc. To find the variance in the different treatment levels, a formula similar to the previous formula for variance is used.¹ Since there is a summing of squares $\left[\sum (x-\bar{x})^2 \right]$ the computation of this quantity in ANOVA is termed the error sum of squares or within-group sum of squares (SSwg). The error effect is computed by first substituting for $\sum (x-\bar{x})^2$ as follows:

Treatment level I

<u>Patient</u>	<u>$x-\bar{x}$</u>	<u>$(x-\bar{x})^2$</u>
A	10-10=0	0 ² =0
B	12-10=2	2 ² =4
C	9-10=-1	-1 ² =1
D	8-10=-2	-2 ² =4
E	11-10=1	1 ² =1
$\sum (x-\bar{x})^2$		10

Treatment level II

<u>Patient</u>	<u>$x-\bar{x}$</u>	<u>$(x-\bar{x})^2$</u>
A	7-8=-1	-1 ² =1
B	6-8=-2	-2 ² =4
C	5-8=-3	-3 ² =9
D	12-8=4	4 ² =16
E	10-8=2	2 ² =4
$\sum (x-\bar{x})^2$		34

Treatment level III

<u>Patient</u>	<u>$x-\bar{x}$</u>	<u>$(x-\bar{x})^2$</u>
A	4-6=-2	-2 ² =4
B	8-6=2	2 ² =4
C	6-6=0	0 ² =0
D	10-6=4	4 ² =16
E	2-6=-4	-4 ² =16
$\sum (x-\bar{x})^2$		40

To summarize:

the within-group sum of squares (SSwg) is for;

$$\text{treatment level I } \left[\sum (x-\bar{x})^2 \right] = 10$$

$$\text{treatment level II } \left[\sum (x-\bar{x})^2 \right] = 34$$

$$\text{treatment level III } \left[\sum (x-\bar{x})^2 \right] = 40$$

The formula for the mean square of SSwg is $\frac{\sum (x-\bar{x})^2}{K(n-1)}$,

where K is equal to the number of treatment levels and n equals the number of measurements in each group. As shown below, substituting in the formula gives the answer of 7 for the mean square of SSwg.

$$\frac{10+34+40}{3(5-1)} = \frac{84}{12} = 7$$

If the various treatments had no effect, the variations when comparing the samples to each other would be the same as that error within the samples. The variation between the samples is termed the treatment sum of squares since its variation is due to the unique effect of each separate treatment. Therefore, if there is a significant difference in the variation between samples as compared to that within the samples, it may be concluded that at least one of the treatment levels had a statistical effect. This forms the basis for ANOVA.

The formula for the between sample variance is: $SSb = \frac{\sum (\bar{x}-\bar{\bar{x}})^2}{K-1}$,

where:

$\sum (\bar{x}-\bar{\bar{x}})^2$ = sum of all squared deviations obtained by subtracting the population mean from each of the sample means.

K-1 = number of degrees of freedom between the samples where K equals the number of samples.

The mean for each of the samples was previously calculated as follows:

treatment level I = 10

treatment level II = 8

treatment level III = 6

Since; population mean $(\bar{x}) = \frac{\sum x}{n}$.

Then; $\bar{x} = \frac{10+8+6}{3} = 8$.

And;

Table II

<u>Patient</u>	<u>Treatment level I</u> ($\bar{x}=10$)	<u>Treatment level II</u> ($\bar{x}=8$)	<u>Treatment level III</u> ($\bar{x}=6$)
A(x-x) ²	(10-8) ² =4	(8-8) ² =0	(6-8) ² =4
B(x-x) ²	(10-8) ² =4	(8-8) ² =0	(6-8) ² =4
C(x-x) ²	(10-8) ² =4	(8-8) ² =0	(6-8) ² =4
D(x-x) ²	(10-8) ² =4	(8-8) ² =0	(6-8) ² =4
E(x-x) ²	(10-8) ² =4	(8-8) ² =0	(6-8) ² =4
$\sum (\bar{x}-\bar{x})^2$	20	0	20

$$\sum (\bar{x}-\bar{x})^2 = 20+20=40$$

Degrees of freedom (K-1) are one less than the number of treatment levels, therefore; K-1=3-1=2

and; the mean square for SSb (treatment sum of squares) = $\frac{\sum (\bar{x}-\bar{x})^2}{K-1} = \frac{40}{2} = 20$

The final steps in ANOVA is to construct an analysis of variance table, compute the F ratio and determine the significance of the computed value of F. The components of a typical one-way analysis of variance table are as follows (Table III).

Table III

<u>Source of variation</u>	<u>Sum of squares</u>	<u>Degrees of freedom</u>	<u>Mean square</u>	<u>F</u>
Between groups	$\sum (\bar{x}-\bar{x})^2$	K-1	$\frac{SSb}{K-1}$	$\frac{SSb}{K-1} / \frac{SSwg}{K(n-1)}$
Within groups	$\sum (x-\bar{x})^2$	K(n-1)	$\frac{SSwg}{K(n-1)}$	
Total	$\sum [(x-\bar{x})^2 + (\bar{x}-\bar{x})^2]$	nK-1		

The ANOVA table shows that F is obtained by dividing the within-group variance into the between group variance.

Therefore: $F = \frac{SSb}{K-1} / \frac{SSwg}{K(n-1)} = \frac{20}{7} = 2.86$.

The table shows that the critical value for F with 2 and 12 degrees of freedom, at the .05 significance level, is 3.89. Experimental F is now subjected to the null hypothesis, as previously explained, therefore:¹

if experimental $F > 3.89$, reject H_0 (null hypothesis)

if experimental $F \leq 3.89$, accept H_0 .

the calculated value for F equals 2.86, which is less than 3.89, the critical F value. The null hypothesis must, therefore, be accepted and there was no statistical difference between the different levels of treatment. All three levels of treatment gave essentially the same results.

Basis and Assumptions of ANOVA

An observed value for any individual in a given group is composed of three values:

1. The grand mean of all of the individuals in the population which is assumed to be equal to the value obtained for a given individual.
2. The treatment effect, the unique effect of receiving a given level of the independent variable(treatment), is assumed to be the same for each member of the group receiving a given level of treatment.
3. The error effect represents many uncontrollable factors within the study. There is the possibility of a different error effect for each individual. Their values, however, are assumed to be normally distributed with a mean of 0 and an unknown standard deviation.

Computing the within-sample variation gives an indication of the error effect. If it is proven, that the between-sample variation is significantly greater than the within-sample variation, it can be inferred that the samples were not drawn from the same population; but from a population whose average values differed. The treatment, therefore, had a definite effect which exceeded that of the error effect.

Under ideal conditions, when there is no treatment effect, $F=1$. This is so because the within-group and between-group variations will be equal. Therefore, the differences in treatment effects are directly proportional to increased values of F .

In accepting the results of ANOVA, values of F are valid only if:

1. the population shows a reasonably normal distribution
2. the variances of the populations are equal
3. the observations are statistically independent.

The example given in this paper showed different levels of treatment applied to different persons. This was an attempt to determine if there was a cause-and-effect relationship. The investigator might also want to assign subjects to groups on the basis of an attribute such as age, sex, height, weight etc. In this case the study could become more of a study of correlation.

The example, in this paper, contained one independent variable and is therefore termed a One Way ANOVA. Two or more independent variables may be used to more than double the information extracted. For instance, two or more different types of treatment can be performed on each individual to determine if there is a separate effect of each treatment; or if there might be a combined effect of one or more given treatments.

As with many other statistical tests, results for ANOVA can be quickly and relatively easily obtained with the use of a programmable calculator or computer. Simplified formulas can also be used once the basis of the indicated statistic is well understood.

1. Ellison, J.S.: The Null Hypothesis, Collected Papers of the Members of the International College of Applied Kinesiology, 1981 (winter) p.149

CANDIDA ALBICANS - THE MISDIAGNOSED FRIEND

Rene Espy, B.A.,M.A.,D.C.

Burt Espy, B.A.,M.S.,D.C.

Abstract of the Thesis

The author's thesis contends that Candida Albicans is the misdiagnosed friend of the body rather than the pathological culprit for which it has gained widespread reputation. Candida is presented here as the body's SOS signal to a much greater problem - gross errors in fat metabolism. The authors contention is that errors in fat metabolism interfere with the bodies ability to communicate data properly and thereby is a major factor in the distortion seen in patients with Candida related problems.

While an extensive review of the current body of knowledge failed to confirm or deny a direct interrelationship between the phenomena cited, it did provide supportive arguments that have been hypothesized by a small group of physicians at the 1983 Yeast Symposium at Birmingham,Alabama. Increased clinical laboratory research points to severe essential fatty acid discrepancies along with severe amino acid defeciences as an interesting correlation with increased Candida Albicans related symptoms. All the research data indicated the importance of the need to develop an understanding of the physiological mechanism related to Candida Albicans. If control or destruction of the yeast is all that is necessary the solution would be easy. However in our clinical experience once the yeast is under control the work begins. There is no easy answer, rather it requires a complete change in life style and a support system for the patient to be able to maintain during a long, difficult period of rehabilitation.

A questionaire was submitted to all patients suspected of having a candida problem. The results of this survey were evaluated disclosing the following information:

Most patients have had antibiotics, corticosteroids, birth control pills or other drug related therapies. All patients frequently crave high sugar, high refined carbohydrate foods, dairy products, vinegars, oranges and yeast foods. All patients noted sensory disturbances ranging from memory disturbances to impaired vision, hearing, taste or sensitivity to fragrances and odors. A high percentage have been diagnosed as having severe problems such as systemic lupus erythematosus, multiple sclerosis, yeast infections, endometrosis, cystitis, Crohn's disease, psoriasis,etc. All have emotional disturbances ranging from depression to appearances of split personalities. The incidence of yeast related problems has been found inmaleand female alike. The author suggests that most research states the frequency is predominately female-related due to the fact

that laboratory diagnosis is unavailable and recognition of yeast related problems is by chance. Medical diagnosis is confirmed by decrease of symptoms after a trial period of drug therapy. Medical cure is confirmed by periods of no symptoms. It is the authors contention that the above approach to human life is a disgrace to humanity. The superficial idea that decrease in symptomatology is the cure says little for the health professionals of today. The authors propose that it is the obligation of the physician to present the patient with alternatives of lifestyle to give the patient the option of choosing optimum health - it is not enough to be satisfied with reduction of symptoms.

Alan G. Beardall, D.C. in his paper on "The Living Computer" presents conceptualizations of disease and states that the priority of the body may not be recognized by the treating physician. Improper diagnosis might be considered as the leading cause of death! While the authors do not intend to say that all diagnosis is wrong, they do contend that most diagnosis is incomplete. The day of the quick fix is over, problems are more complex, dietary deficiencies are at alarming proportions and the patient is beginning to cry out for a truly wholistic approach to health. The day of being taken care of by others is over, the new age requires self-sufficiency and a responsible change in lifestyle.

The author's study contends that the body must be viewed wholistically and as the beautiful, organized, logical, rational, precisioned computer that it is. The blueprint of the body has not been discovered as yet however to those physicians on the pursuit of truth it will be revealed. Applied Kinesiologists have the most wholistic approach to diagnosis however even so guidelines must be presented. It is one thing to have numerous therapeutic approaches but a far greater challenge to know when to use what and for what purpose. The author also contends that a physiological as well as a philosophical understanding of the body must be the foundation from which to approach total health. Inaptitudes of diagnosis may not only be the cause of severe health problems but may also be the cause of increased research and development expenditures to tangential ideas of single-minded researchers and the existant health failure rates.

The author concludes that an understanding of the body as a "Living biological computer" as a philosophical foundation and the investigation of improper fat metabolism as one major cause in proper computer transmission of data are two too important responsibilities to be left to chance and its importance demands that physicians within the health profession give it the thought and support it deserves. If health professionals attentive concern for the proper diagnosis and administration of therapies for disease processes such as Candida Albican related problems is not present, a reduction in disease processes cannot be expected.

Acknowledgments

Many persons, knowingly or unknowingly, have assisted in the preparation of this paper. Dr. Karl Parker introduced us to Applied Kinesiology and the truth to be found in Chiropractic, that is, health is life. Dr. George Goodheart showed us while a student that physiology, neurology and pathology are necessary for the Chiropractic Physician and that we must be open and honest and respect the body. Dr William Harper taught us to question everything and to be consistent in demanding indications for diagnosis and therapy and to be aware that "Anything Can Cause Anything". In particular we wish to thank Dr. Alan Beardall for patiently listening to our questions, patiently sharing his concepts on health and disease and showing us that there is hope when one accepts the challenge of lifestyle clearing as the route for the progression of the soul.

And finally we wish to thank our patients for the opportunity to serve them and their willingness to search for truth in their lives to become the truly beautiful people they are.

The Body as a Biological Computer

Alan G. Beardall, D.C. has presented a conceptualization that the body is a living biological computer. To understand a computer we look at three basic systems: input, central processing and output. In the electronic computer input is the keyboard, central processing is the hardware and output is the screen and printer. Likewise regarding the body, the keyboard would be the acupuncture system, the central processing unit would be the brain and spinal cord and the output would be the symptoms. (See Instruction Manual by Alan G. Beardall, D.C.)

Keeping the above in mind, if the symptoms are happiness, health, and an efficient digestive system then the input into the body is acceptable by the central processing unit and all is well. However if the symptoms are pain, depression, digestive disturbances, loss of memory, or loss of concentration, obviously the central processing unit is not accepting the input or at least it does not recognize the input and therefore cannot process it.

Dr. Beardall's concepts have set a philosophical and physiological foundation for which to look at health and disease. He has presented ten possibilities for improper transmission of data from input to output and why the biological computer cannot transmit information adequately:

1. Breakdown in communication.
2. Conflict in strategies between levels of functions or computers.
3. Circuit overload.
4. Circuit erosion.
5. Inadequate input for adequate resolution.
6. Inadequate transference of information, nutritional deprivation, RNA, neurotransmitters, etc.
7. Priority of CPU not recognized by the treating physician.
8. Abnormal input from oral cavity, i.e. suppressive drugs, etc.
9. Computer processing at full capacity and therefore data is put on hold.
10. Compartmentalization of aberrant tissue.

As stated earlier, a foundation must be laid upon which to build a firm hypothesis and Dr. Beardall has done just that. This paper is not the final word - it is the beginning expression of concentrated work for the past eighteen months. The next eighteen months may radically change the conclusions and that is good for to stagnate is death and to change for the better is life.

INTRODUCTION TO CANDIDA

Yeasts (classified Blastomycetes) are the vernacular term for fungal organisms. These organisms constitute a resident population which is universally part of the normal flora of skin surfaces, the intestinal tract, buccal and vaginal mucosa. The most common of these is *Candida Albicans*. It is normally controlled by intestinal bacteria and therefore poses no harm. However if the helpful bacteria are destroyed the yeast is then free to cause problems with body tissues and a myriad of symptoms results. Symptoms related to this syndrome are varied and are usually of a very serious nature. Some of these are listed in the following table (a more complete list contains as many as 70-100 or more).

Depression, diarrhea, hives, lethargy, constipation, food allergies, hyperactivity, distention and bloating, chemical sensitivities, acne, gastritis, fatigue, vaginitis, sensitivity to molds, cold hands and feet, menstrual irregularities, kidney and bladder infections, joint pains, cramping, cystitis, numbness, headaches, hay fever, loss of libido, gas colitis, earaches, memory loss, and anxiety.

Until recently *Candida* was thought of as a minor infection of mucous membranes, skin and nails. With the increased use of antibiotics, steroids, birth control pills and highly refined carbohydrate and fat diets it has been found that *Candidiasis* becomes a chronic, systemic infection that leads to tissue damage throughout the body. It appears that *Candida* produces a chemical response that affects the immune system and may be an etiological agent in food allergies.

All the publicity directed toward *Candida Albicans* may be in the wrong direction because strictly speaking there are no pathogenic yeasts. Those associated with human or animal disease are incapable of producing infection in the normal healthy individual. Before colonization, infection and disease can take place, alteration in the physiology of the normal flora of the defense system of the host must occur. The severity of the disease will depend on the degree of alteration of normal physiology rather than any pathogenic properties exhibited by the fungus. 1,2,4.

FACTORS AFFECTING GROWTH AND NUTRITION OF CANDIDA

Under normal circumstances human adults have an innate resistance to *Candida* infiltration however when there is any alteration in normal defense mechanisms or any predisposing environmental conditions, infection or sensitivities predominate.

Yeast is not affected appreciably by changes in pH as they are generally able to multiply in media with a pH range of 3 to

8, although optimum growth is normally in the range of 4.5 - 6.5. However it is noted that growth of yeasts is inhibited by certain organic acids. 2,3,8,. This is an important point as clinical experience has shown that as the urine pH returns to the normal range the complaints of the patient take a turn for the better.

The nutritional environment that best supports the growth of yeast includes biotin, thiamin and others of the B complex family. Biotin however is the most essential. In addition to biotin, B12, thiamin, nicotinic acid, PABA and zinc also enhance cell growth.

As Candida becomes pathogenic it requires a source of nitrogen and most efficiently receives it from ammonium salts. It also requires oxygen and uses specific amino acids for growth. Glucose and other sugars are generally used as carbon sources. 2,3,8.

CONDITIONS PREDISPOSING TO CANDIDA

There are five principle conditions that facilitate candida infection. These upset the balance between candida and the host sufficiently to allow a pathogenic state to develop. Age, sex, clinical manifestations and other predisposing factors have varying effects on the underlying disease of the patient. Thus the multitude of symptoms from headaches to memory loss.

The five conditions are listed below followed by discussion of each: 1,2.

1. Extreme youth
2. Physiological change, ie. pregnancy
3. Prolonged administration of antibiotics
4. General debility and constitutional deficits
5. Iatrogenic and injuries involving penetration of the bodies natural barriers.

As the resident flora is being established in a child the restricting factor to fungal growth may be absent. In the normal child with all essential components to normal physiology present no treatment is needed.

During pregnancy, changes in carbohydrate metabolism in the uterus leads to an increase in Candida Albicans. Administration of steroids in males and females also leads to an increase in the Candida populations. The same is true for patients with endocrine dysfunctions such as diabetes.

Prolonged administration of antibiotics alters or eliminates the normal bacterial flora that is the controlling factor in the growth of Candida. The overwhelming over distribution of antibiotics stimulate the abnormal overgrowth of yeast. One source stated that 95 percent of patients with Candidiasis have received antibiotics. 7.

Patients with general debility and who are constitutionally

deficient have a greater risk of Candida infection. The extent and severity of the Candida most always depends on the severity of the underlying disease. Immuno-suppressive agents, cytotoxins and other drugs alter the normal defenses and permit Candida invasion or invasion by other opportunistic organisms.

Iatrogenic and barrier penetration injuries are the result of a wide variety of reasons. Accidental injuries involving penetration of the skin by a foreign object, indwelling catheters, hyperalimentation, peritoneal dialysis, and surgical procedures are some of the ways colonization of Candida can occur. Drug abusers are particularly vulnerable.

Candida is one of the most opportunistic organisms that afflict man. Only syphilis presents a more diverse clinical picture. All tissue and organ systems are subject to invasion when resistance of that area is lowered for any reason. In addition to infections, Candida Albicans is also involved in allergic conditions and chemical sensitivities.

Allergies and/or sensitivities range from certain foods to a total sensitivity to everything. The more serious sensitivities have been labeled "Universal reactors". 18. These people have had to live a monastic lifestyle in an effort to avoid most foods, nearly all chemicals, most drugs, odors, and practically anything synthetic. Few marriages survive the ordeal. Many have been deserted by family and friends. These patients must be listened to with "ears that hear and eyes that see" in order to help them through the ordeal. They must be understood as they have been labeled as psychotic, neurotic and psychosomatic by their doctors. Ignorance to the human condition is too prevalent.

FAT METABOLISM

A basic understanding of fat metabolism is necessary to understand normal computer transmission. Fatty acids are long chains of carbon and hydrogen atoms. Saturated fatty acids are bonded while unsaturated fatty acids lack at least one pair of hydrogen atoms and polyunsaturated refers to those in which more than one pair is missing. Fatty acids are the building blocks of fats. In order for fats to be digested bile is secreted from the liver into the intestines to emulsify fats which enables them to become fatty acids and glycerol by the action of digestive enzymes.

Fatty infiltration is brought about by an imbalance between lipotropic enzymes. Fat in food is not absorbed as such but broken down in the duodenum by intestinal juices, pancreatic

juices and bile to make fatty acids and glycerol. Some of the digested fat is used throughout the body and some is stored as adipose tissue. Fat reaches the cell via the liver from the diet and also from circulating pools of fat depots. Necessary lipotropic factors include choline which promotes the formation of phospholipids - absence of this food factor leads to rapid accumulation of liver fat.

Lipids are essential to digestion but are potentially harmful especially saturated acids such as stearic acid for it coats the red blood cells, blocks capillaries and deprives the heart of oxygen. Fat is normally absorbed by the lymph and enters the bloodstream near the heart however excess accumulates in the body and becomes deposited in the liver.

Causes of fatty degeneration are (1)poisons and (2)anoxia. The poisons may be organic, in the form of any bacterial toxin that interferes with the cellular enzymes, or inorganic ie.phosphorus, carbon tetrachloride and chloroform. Anoxia occurs in many diseases such as fatty degeneration. Unsaturated fats redistribute cholesterol from the blood to the tissues and after combining with oxygen forms free radicals. These highly reactive and unstable substances interact with proteins and lead to loss of elasticity in tissues and general weakening of cells.

In order for a computer to process any information or more basically be even functional it must have an energy source. The primary source of energy production in the body comes from food intake. Adipose tissue is the primary storage site for potential energy. In areas where adipose tissue is subject to free and rapid change insulin sensitivity is found to be most prominent. It has been found that insulin is required for synthesis for fat. 10. It has also been shown that the primary conversion site of carbohydrate to fat is in the adipose tissue itself and increased insulin accelerates this process. 11. 13. Therefore insulin in adipose tissue facilitates the conversion of extracellular glucose into intracellular glucose 6-phosphate. 16.

If it is true that adipose tissue is sensitive to insulin this suggests that insulin regulates extracellular glucose and adipose tissue lipogenesis and serves as the main indicator for adipose tissue to extract glucose and synthesize fat. Therefore the presence of glucose and insulin allow the normal incorporation of free fatty acids from circulating fluids into adipose tissue lipid. Insulin appears to be the signal that the body has received enough food and the adipose tissues expand accordingly with necessary storage for future use.

Futhermore insulin has been shown to be the body's signal to increase glucose uptake to provide adequate fatty acid biosynthesis or with a lack of insulin signal the body to mobilize fatty acid stores into circulating free fatty acids.

Adipose tissue as the site of energy storage is also necessary during times of stress when rapid mobilization is necessary for

survival. Insulin is necessary for the rapid conversion of glucose to lipid and the sympathetic nerve endings are necessary for rapid response.

Once the stressful situation is no longer present glucose levels return to normal, insulin production normalizes and glucose metabolism returns to the role of energy production in the central nervous system. This homeostatic system must have no outside interference or internal breakdown for the body to work effeciently. In man there are many factors that can alter this vital system from second to second:(1)blood glucose levels (2)environmental changes (3)hormonal changes (4)emotional stress. This relates to the principle that the "importance of biologic servomechanisms is inversely related to the duration of their respective cycles".5.

Adipose tissue serves also as an important factor in heat regulation as shown by it's anatomical location lending to the conclusion that it is an important insulating agent. It has been suggested that it is an important site of heat production not only as an insulator but also as a heat producer.

In summary insulin promotes the utilization of carbohydrates for energy and depresses the utilization of fats. On the other hand lack of insulin leads to fat utilization mainly to the exclusion of glucose utilization, except by brain tissue. The signal that controls this switching mechanism is principally the blood glucose concentration.

Decrease of glucose leads to decreased secretion of insulin and therefore utilization of fats almost exclusively for energy. Increased levels of glucose lead to increased insulin secretion and carbohydrates utilized almost exclusively for energy. Insulin has a vital role in the body - controlling whether carbohydrates or fats will be utilized by the cells for energy. Two other hormones involved are growth hormone from the anterior pituitary and cortisol from the adrenal cortex. Both depress cellular utilization of glucose while exciting the utilization of fat. Epinephrine also plays an important role. During stress the sympathetic nervous system is excited and epinephrine is secreted by the adrenal medulla and causes an increase in both the blood sugar and the blood concentration of fatty acids. Epinephrine especially enhances the utilization of fat in stressful states such as circulatory shock, anxiety etc.

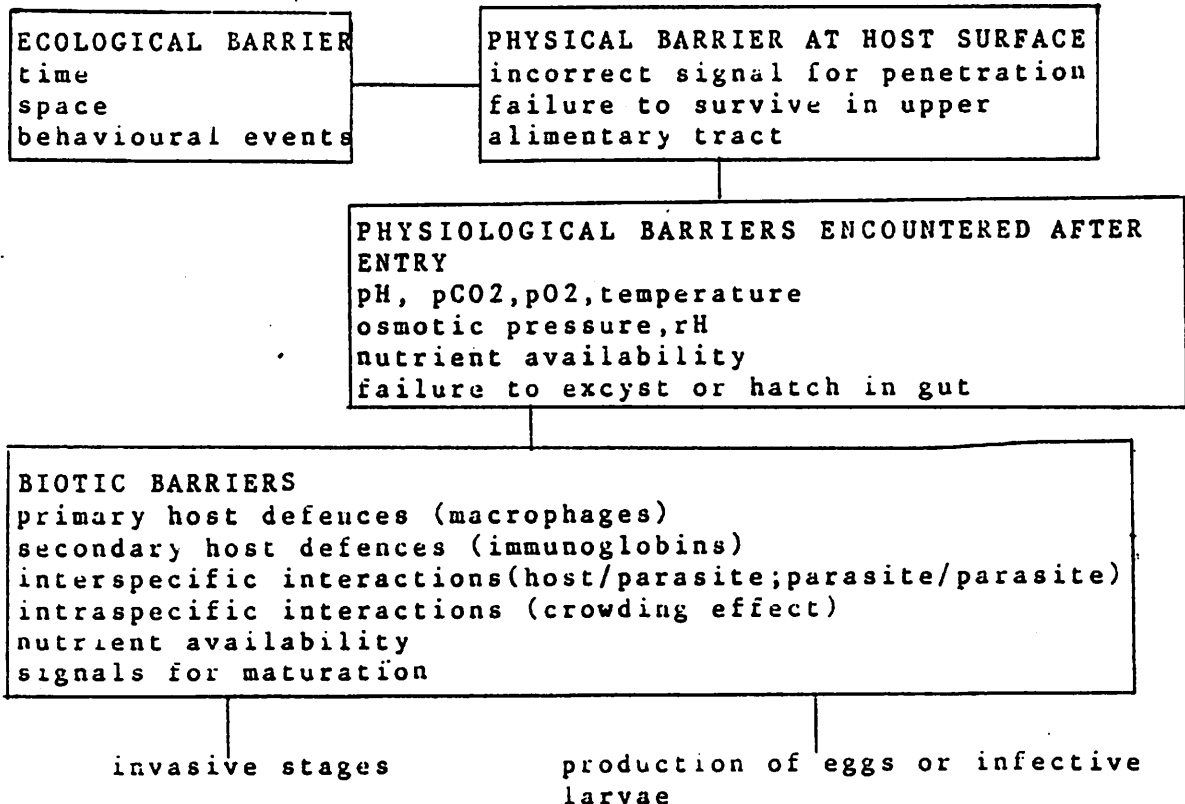
Any disruption in normal insulin activity such as a high sugar diet, high fat diet or a high refined carbohydrate diet can affect normal physiology. Increase in fats can cause improper computer production or impair it enough to cause garbled response to normal input.

THE ROLE OF PARASITES

Parasites are individuals or species nourishing themselves at the expense of an organism according to Dorland's Medical Dictionary. An understanding of parasitology is important because even though Americans claim to be of the best of "health" and have better dietary habits than those of other countries parasites do inhabit man, his livestock and his crops. The overall problem is enormous.

Parasites inhabit many and varied tissues including the alimentary canal, blood, nervous system, body cavities and organs. Dependence upon anaerobic carbohydrate metabolism to obtain energy is a universal feature of parasitic organisms so they tend to inhabit regions of low oxygen tension such as the lumen of the alimentary canal. However parasites do consume oxygen and they do receive their oxygen from varied metabolic processes. Parasites commonly store glycogen and glycolysis is their key pathway for energy from which they liberate a wide variety of end-products.

The principle factors determining the invasion, establishment and growth of a parasite are shown below:



It is the author's opinion that the Cestode or tapeworm variety of

parasite is an important avenue to explore in Candida-related problems. Therefore this paper will focus mainly in this area.

The eggs of tapeworms hatch in a free aqueous environment on the intestine after their ingestion along with the tissues of the intermediate host. Elements that aid their activation are elevated temperature, host enzymes and bile salts. In fact, bile salts have been shown to play an important role in the establishment of many of the parasites that enter through the alimentary canal.

Five distinct functions for bile are known:

1. Effects on membrane permeability
2. Initiation of encapsulated larval activity
3. Lytic effects on parasite surfaces
4. Synergistic action with host digestive enzymes
5. Metabolic effects upon both establishing and established parasites. 12.

Bile salts are surfactants with a profound effect upon biological membranes which increase permeability of parasite eggs and cysts therefore allowing the entry of water and digestive enzymes and aid in the hatching and breaking of the capsule of parasites in the gut.

The parasites do not settle at their site of entry however they tend to be specific to their metabolic requirements. Cestodes use the following pathway:

mouth → stomach → small intestine $\begin{matrix} \nearrow \text{lymph} \\ \searrow \text{blood system} \end{matrix}$ $\begin{matrix} \nearrow \text{liver} \\ \searrow \text{lungs} \end{matrix}$

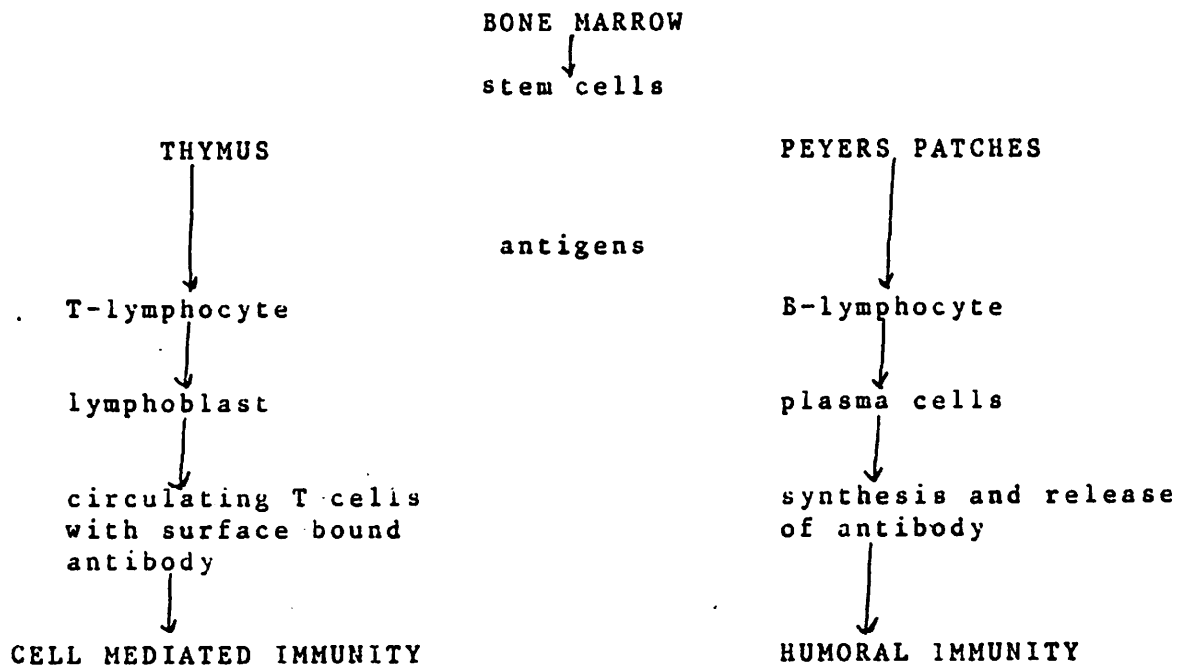
The majority of tapeworms are located in the small intestine. Clinically the authors postulate they inhabit the area of the ileo-cecal valve. Recognition of the suitable area by the parasite will depend upon surface receptors situated on the host cell membrane.

All organisms have built-in defense mechanisms to protect themselves against the invasion and establishment of parasites. These include viruses and bacteria and have a highly sophisticated immune system. The immune system functions by recognition of self and the ability to distinguish invading organisms as non-self. When this system of recognition fails we give rise to auto-immune diseases whereby the tissues of the host destroy itself. In the normal healthy individual the body recognizes non-self material and develops a specific memory system to aid the immune system in recognition of foreign matter.

Both specific and non-specific response mechanisms are at work with the invasion of parasites. Specific responses are associated with memory, storage and are directed against subsequent

infections. It involves the formation of antibodies by the host due to the invasion of the antigen. Non-specific responses are generalized, have no involvement of a memory element and are directed against any invading agent. These involve the phagocytic cells such as macrophages and polymorphonuclear leucocytes. They function by engulfing the invading organism and digesting them.

Antibody defence mechanism is both cell-mediated and humoral arising from the stem cells in the bone marrow. A simplified scheme of lymphocyte and antibody production is shown below: 12.



Acquired immunity operates at the transition phase when the larva hatches in the intestine of the host and invades the mucosa. In the immune host the larva either fail to hatch or hatch and fail to penetrate the gut wall. The early developmental stages of cestodes (tapeworms) are immunogenic such that the host has the capability to develop a strong protective immunity. However in the adult tapeworm it may control rather than eliminate the parasites. Since evasion of the immune response is a common feature of many parasitic infections a serious problem develops.

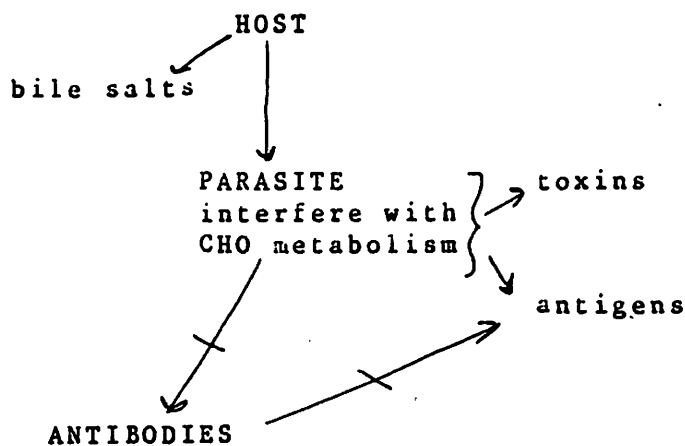
Adult tapeworms inhabit the small intestine and attach to the mucosa. They do not have a digestive system so their food is absorbed from the host's intestine. Three types of tapeworms have been dealt with clinically: fish tapeworm (*Diphyllobotrium latum*), pork tapeworm (*taenia solium*) and beef tapeworm (*taenia saginata*). There are other types for which we have not yet had any clinical experience.

Fish tapeworms occur where pickled or improperly cooked fresh water fish is prominent in the diet. A major related symptom is pernicious anemia as the tapeworm enjoys a feast of B12. Other symptoms may be gastrointestinal in nature, fatigue, and numbness of the extremities. 10,11.

Pork tapeworms occur when cured or insufficiently cooked pork is eaten. Symptoms include abdominal discomfort, hunger pains and chronic indigestion. Involvement of the central nervous system is also noted with symptoms varying from mild nervous manifestations to severe epileptiform attacks which can be Jacksonian or grand mal. Other symptoms include headaches, dizziness and blurred vision. 10,11.

Beef tapeworms are the most common and occur wherever beef is eaten. Symptoms include vague intestinal discomfort, vomiting, diarrhea, appendicitis and intestinal obstruction. 10,11

A proposed scheme of events is as follows:



It is not the authors contention that tapeworms of any great length are the problem. It is hypothesized that the eggs of the cestodes are the problem. They are given a perfect environment with the amount of steroids given to promote animal growth. If excess fat intake stimulates increased bile production then parasite eggs have a greater chance of survival.

MALE FEMALE HORMONAL ACTIVITY

The male accessory glands are greatly affected by sex hormones. In the male secretions carbohydrates and other related compounds are present and need to be in proper balance: fructose, inositol, amino sugars, citric acid, lactic and pyruvic acids, ascorbic and uric acids, choline, acetylcholine, ergothioneine, catecholamines, amino acids, urea, polyamines. The lipid content is made up of phospholipids and cholesterol. It is interesting to note that in organic prostate problems there is a considerable increase in lipid content.¹⁸

It has been well documented that the endocrine activity of the testis can be adversely affected by nutritional deficiencies. Factors such as:

1. deficiency of total caloric intake
2. improperly balanced diet
3. vitamin and mineral deficiency
4. androgen antagonists or toxic substances

affect the neural regulation of the pituitary gland which disrupts gonadotrophic synthesis and release which results in reduced testosterone production. This undernourishment causes a significant problem. Male sex glands are affected by poor nutrition much sooner than other organs due to the need for constant availability of androgenic hormones.¹⁸

Another important aspect of the male accessory sex glands is their role in antibody formation. The male secretions contain antigenic substances which inhibit antibody formation and fertility is affected by the immunological processes in the prostate and seminal vesicles. Seminal plasma contains several groups of antibodies and is a highly potent immunogenic.

It is the hypotheses of the authors that AIDS may be involved in this same phenomenon for in the normal male-female sexual relationship there is normal excitation of hormonal secretions. In a male-male relationship there is improper secretion of hormones with a resultant decreased immunity or because of decreased hormonal activity leading to male-male sexual activity an impaired immune system follows.

It is also well known that the female endometrium is involved in the metabolism of lipids, proteins and carbohydrates as well as production of energy for tissue growth. If the environment is not in normal balance it could become hostile for the endometrium depends on proper physiological, biochemical and structural balance.

The uterus is important in humoral defense as it contains a considerable amount of protein such as immunoglobins G and A, proteinase inhibitors, complement component C3 and lysozyme. These are especially high in the periovulatory phase of the menstrual cycle. The presence of these substances points to the role of the female genital tract as being important in non-specific defense mechanisms. It is the uterine cervix that plays

the major role in the biochemical-immunological defense system directed against microbial invaders.17

Sex steroids, estrogen and progesterone bring about changes in immunoglobulin concentration and the estrogenic phase of the menstrual cycle stimulates the presence of higher amounts of immunoglobulins in the uterine epithelium. The concentration of diffusable proteinase inhibitors in the uterus are also hormone dependent.19.

Synthetic hormones are prevalent in our diet and given many times indiscriminately by prescription. The body requires very exact proportions in order to perform at high efficiency. A very high rate of sexual disorders in society today suggest the need of body are not being respected.

TREATMENT

Treatment for Candidiasis depends upon each patient's needs for each patient's problems are unique. The goal is to get the yeast out of the tissues and to increase the immune response to keep it out. Several elements are necessary in the plan:

1. A nutritional program that is specific to the patient.
2. A food plan that will help change the internal environment so the yeast will not be fed. Yeast feeds on sugar, yeast products, mold foods such as mushrooms and cheeses.
3. Total abstinence from antibiotics and steroids.
4. Abstinence from birth control pills especially if there is a discharge or headaches with periods.
5. A regular treatment program to help build the immune response to resist infections and allergies.

Treatment must be persistent for the candida was well established prior to its identification. Treatment must be continued for as long as necessary to prevent the return of symptoms and to allow the immune system to fully recover and take charge.

Specific foods that brought about an allergic response in 100% of the patients seen with a fungal problem are as follows:

- all dairy products including cheese, milk, butter, yogurt and all foods that contain these foods.
- oranges and orange juice
- peanuts and peanut butter
- all forms of sugar including maple syrup, molasses, honey fructose etc.
- beef and beef products
- mushrooms and avacados
- oils such as corn oil, safflower oil, margarine, soy oil
- soy products
- yeast and all products containing yeast
- eggs and products containing eggs
- vinegar and fermented products

These patients may react allergically to other foods as well however they will be specific to that patient rather than a universal response.

Control of the fungus is vital in the treatment program. Even though the fungus is a friend it is out of control and due to environmental changes it has become pathological. However the authors contend that fire is not fought by adding more fuel. The mainstream approach to control of fungus is Nystatin, supposedly a harmless drug that does nothing more than kill fungus. The public believed that about numerous drugs that later brought about multimillion dollar lawsuits for permanent damage. Why believe that another chemical that is a by-product of some chemical waste that can be used for profit is safe for human consumption? In physiology we learned that the body is a highly specialized chemical factory with specialized needs that if drastically altered will produce disease. How can we accept Nystatin as a viable treatment modum? There is a great deal of

evidence to point to liver damage and optic nerve disease as a result of Nystatin usage but try to find the written documentation. It is well hidden.

If we accept the hypothesis that the fungus is our friend then why rid the body of its friend? Why not change the environment that precipitated its release and thereby allow it to come under control naturally. If this can be done the patient does not have to risk other pathological complications along with those which they are already struggling. In other words is there a natural replacement for Nystatin?

Numerous products that have been indicated for fungal infection were tested using a very specific testing procedure developed by Dr. Alan G. Beardall over his years of research. The authors used his methodology and did not find any products to produce the desired results. Therefore a specific product was developed to replace Nystatin. Very specific tests were done, critical evaluations were made and trials were run until finally Nutri West was approached to produce the formula. Spore-X became the trade name and is now available from Nutri West. The sole purpose of Spore-X is to replace Nystatin. It will not correct the underlying cause of fat metabolism. It is the factor necessary to control the fungus enabling the patient to be treated effectively. There are three other products also being developed to aid with the intestinal involvement but they are not available at this time.

As stated in the beginning of the paper, once the fungus is under control the work begins. There is no clear cut pathway. The patients seen by the authors have had bizarre history's. Each has had a fungal problem but each had more severe underlying problems. It was seldom that fungus was a diagnostic entry point after two or three visits.

We do not apologize for not having available more information regarding therapy for as stated earlier there is no quick fix. We must be patient to traverse the pathway the body presents and resist forcing our own discerning nature along the way for the sake of short-lived triumph. We in the field of Applied Kinesiology will find the answer if we remain open, truthful, patient, and receptive to those of wisdom who impart truth to those who honestly seek it.

The Phenomena

According to those researching Candida, problems start after antibiotic therapy. Antibiotics destroy the normal intestinal flora leaving the yeast minus its normal competitor and allowing it to infiltrate more of the mucosa. The yeast releases toxic metabolic by-products into the bloodstream initiating an allergic reaction. Once the mucosal membrane is chronically infected, cells of the immune system, especially the T-cells, are weakened and the yeast grows unchecked in the tissues. Whenever there is decreased activity of the thymus gland, yeast infection prevails and any disease that damages the cellular immune response leads to the likelihood of infestation by yeast overgrowth. Other factors are frequent exposure to radiation, frequent exposure to steroids, frequent exposure to antibiotics, radiation pollution from the air, water and food, use of steroids by humans or in animals for human consumption. Stimulation of Candida reaches a point whereby it paralyzes rather than stimulates the immune system. The goal is to weaken the parasite and strengthen the resistance of the host.

According to the clinical data of the authors the yeast is the SOS signal setting off the alarm that fat metabolism is being impaired and if left unchecked will lead to irreparable damage.

Let us summarize by expounding on the ten conceptualization of disease:

1. Breakdown in communication: In order for proper nerve transmission there must be proper mineral, proper electrolyte, and acupuncture transmission. If the body's priorities are diverted to take care of excesses in any form, normal communication is affected as the body is being either hyper or hypo-stimulated.

2. Conflict in strategies...: If the body cannot communicate properly and if it receives improper signals, hormonal activity will activate organs and glands improperly, digestive enzymes will be improperly activated and the body could receive the message to digest itself or to bring about the process of auto-immune response.

3. Circuit overload : Excess refined carbohydrates, fats and sugars put excess demands on normal insulin activity. Fats then disrupt nerve transmission and dependant upon the genetic makeup of each individual patient is the disease process that results.

4. Circuit erosion : As fat metabolism goes unchecked the myelin sheath can then be affected. It has been shown to be a plasma membrane consisting of a double layer or a bimolecular leaflet of radially oriented lipid molecules.²¹ It is composed of both proteins and lipids with the chief ones being cholesterol, galactolipids and the phospholipids - sphingomyelin and phosphatides of ethanolamine, choline, serine and inositol. If fat metabolism is aberrant the processes such as Alzheimer's

Disease, tangled nerves, result as the insulation is eroded putting excess stress on nerve transmission.

5. Inadequate input : In order to resolve problems proper input must be given. Proper nerve irritation and proper hormonal irritation are vital for adequate resolution of body demands. However if the input of the body cannot transmit properly data cannot reach the central processing unit.

6. Inadequate transferring of information... Without unrefined carbohydrates, minerals, proper sugars, etc., the body cannot process properly. The high fat diet deprives the body of proper transmitting components. The patient becomes highly sensitive to hydrocarbons, molds and other odors to the extent that they will violently react to those substances.

7. Priority of the CPU...: This is the greatest problem. First the patient was ignored and considered a psychological problem. Now it is vogue to "kill the yeast". The yeast has taken priority over the patient. We must follow the tenet to "weaken the parasite and strengthen the resistance of the host". By allowing the yeast to return to its rightful place in the system the patient's underlying problem can be brought to the forefront.

8. Abnormal input...:

- a. excessive fats, carbohydrates, sugars
- b. excessive drug intake, ie. antibiotics, steroids, birth control pills
- c. improper nutrition. It appears contradictory to feed the patient lactobaccillus, biotin and other B vitamins if that is what feeds the yeast.
- d. meat intake ie, red meat, pork and fish
- e. abnormal sexual activity.

9. Computer processing at full capacity : With improper diet, improper nerve irritation, imbalanced host parasite relationship, the body has to shift into survival mechanisms and cannot deal with normal input. With increased workload the body soon loses its connection with itself and makes a distinct shift in normal electromagnetic, sensory and motor activity. The patient begins to "see with their ears and hear with their eyes".

10. Compartmentalization of aberrant tissue . Nerve cells in the brain tangle, parasites in the area of the ileo-cecal valve cause chronic problems, uterine and prostate shutdown, sensory deprivation and the eventual inability of the body to convey its inability to process due to breakdown in communication.

CONCLUSION

The authors have presented clinical data that has been carefully observed over the past eighteen months. Conclusions are not final, suppositions are presented and hypotheses are exposed. It is realized that there may be little agreement among other health professionals. Truth for our patients must be our goal. Only time will prove us right, our effort has been supreme.

BIBLIOGRAPHY

1. Rippon John Willard PhD., 1982 Medical Mycology, 2nd edition "The Pathogenic Fungi and the Pathogenic Actinomycetes", W.B. Saunders Company, Philadelphia.
2. Odds, F.C., B.Sc.,PhD., 1979, "Candida and Candidiasis", University Park Press, Baltimore.
3. Winner, H.I., M.A.,M.D., F.C. Path & Hurley, Rosalinde, L.L.B., M.D., M.C.,Path., 1984. Little, Brown and Company, Boston.
4. Wilson, J. Walter, M.D., & Plunkett, Orda A., PhD, 1965, "The Fungus Diseases of Man", University of California Press, Berkeley and Los Angeles.
5. Rodahl, Kuarve, M.D., & Issekutz Jr., Bela, M.D., 1962, "Fat as a Tissue", McGraw Hill Book Company, New York.
6. McMurray, W.C. Ph.D., 1983, "Essentials of Human Metabolism, the Relationship of Biochemistry to Human Physiology and Disease", 2nd Ed., Harper and Row, Publisher, Philadelphia.
7. Leech, Richard W., M.D. & Shuman, Robert M., M.D., 1983, "Nervopathology, A Summary for Students", Harper and Row, Publishers, Phil.
8. Phaff, Herman Jan, 1966, "The Life of Yeasts", Harvard Univ. Press, Cambridge, Mass.
9. Von Brand, Theodor. 1973, "Biochemistry of Parasites", 2nd Ed., Academic Press, New York and London.
10. Markell, Edward K., PhD.,M.D., and Voge, Marietta, PhD., 1982, " Medical Parasites", 5th Ed., W.B. Saunders Company, Phil.
11. Zamar, Vigar and Keony, Loh Ah, 1982, "Handbook of Medical Parasitology". Adis Health Science Press, New York Tokyo, Mexico, Sydney, Auckland, Hong Kong.
12. Chappell. Leslie H., B.Sc., PhD., 1980, "Physiology of Parasites, John Wiley and Sons, New York and Toronto.
13. Dye, Lee, 1984, "Allergic to Everything" Health Freedom News, February 1984. pp 16-18.
14. Smith, R.L., 1973, "The Excretory Function of Bile", Chapman and Hall, London.
15. Zahner, Hans and Maas, Werner K. 1972, Biology of Antibiotics, Springer-Verlag, New York.
16. Ghanadian, Reza Ed., 1982, "The Endocrinology of Prostate Tumors", MTP Press Limited International Medical Publishers.

Lancaster, Boston, The Hague.

17. Norris, Henry J. M.D., Ed. 1973, "The Uterus," The Williams and Wilkins Company, Baltimore.

18. Hafez, E.S.E., Ed. 1980, "Accessory Glands of the Male Reproductive Tract," Ann Arbor Science Publisher Inc., Ann Arbor, Mich.

19 Workshop Conference in Muvnam, Bavaria, June 11-13, 1979, "The Biology of the Fluids of the Female Genital Tract", Elsevier/North-Holland.

20. Truss, C. Orian, M.D. 1983, The Missing Diagnosis, C. Orian Truss, Birmingham, Alabama.

21. Davison, A.N., B. Pharm. Ph.D., D.Sc. F.P.S. & Peters, Alan. B.Sc. Ph.D., 1970. Myelinization Charles C. Thomas Publisher, Springfield, Ill.

22. Servelle, M. and Moques, C. 1982, The Chyliferous Vessels Expansion Scientifique Francaise, Paris.

SCORE _____ NAME _____ DATE _____

Please indicate with a checkmark if any of the following questions have applied to you either in the past or do so presently.

A.) Do you frequently experience any of the following symptoms:

- | | | |
|---|---|---|
| <input type="checkbox"/> 1. Depression | <input type="checkbox"/> 11. Migraine Headaches | <input type="checkbox"/> 21. Constipation |
| <input type="checkbox"/> 2. Feel Dragg | <input type="checkbox"/> 12. Dizziness | <input type="checkbox"/> 22. Swelling |
| <input type="checkbox"/> 3. Lethargic | <input type="checkbox"/> 13. Insomnia | <input type="checkbox"/> 23. Stuttering |
| <input type="checkbox"/> 4. No energy | <input type="checkbox"/> 14. Hyperactivity | <input type="checkbox"/> 24. Menstrual irregularity |
| <input type="checkbox"/> 5. Body aches | <input type="checkbox"/> 15. Weight loss | <input type="checkbox"/> 25. Menstrual cramping |
| <input type="checkbox"/> 6. Agitation | <input type="checkbox"/> 16. Ear aches | <input type="checkbox"/> 26. Pre-menstrual depression |
| <input type="checkbox"/> 7. Hyper-irritable | <input type="checkbox"/> 17. Stomach distension | <input type="checkbox"/> 27. Pre-menstrual anxiety |
| <input type="checkbox"/> 8. Loss of memory | <input type="checkbox"/> 18. Bloating | <input type="checkbox"/> 28. Loss of libido |
| <input type="checkbox"/> 9. Loss of concentration | <input type="checkbox"/> 19. Chronic heartburn | <input type="checkbox"/> 29. Impotence |
| <input type="checkbox"/> 10. Headaches | <input type="checkbox"/> 20. Diarrhea | <input type="checkbox"/> 30. Chronic infection |
| | | <input type="checkbox"/> 31. Chronic eye inflammation |
| | | <input type="checkbox"/> 32. Diaper rash |

B.) Do you frequently experience any of the following sensitivities:

- | | | |
|--|---|---|
| <input type="checkbox"/> 1. Disturbance of smell | <input type="checkbox"/> 5. Sensitivity to chemicals | <input type="checkbox"/> 8. Sensitivity to foods |
| <input type="checkbox"/> 2. Taste disturbance | <input type="checkbox"/> 6. Sensitivity to odors | <input type="checkbox"/> 9. Sensitive to Gas heat |
| <input type="checkbox"/> 3. Vision disturbance | <input type="checkbox"/> 7. Sensitivity to fragrances | <input type="checkbox"/> 10. Sensitive to Gas stove |
| <input type="checkbox"/> 4. Hearing disturbance | | <input type="checkbox"/> 11. Alcoholism |
| | | <input type="checkbox"/> 12. Drug addiction |

C.) Have you ever been diagnosed as having any of the following:

- | | | |
|---|---|---|
| <input type="checkbox"/> 1. Schizophrenia | <input type="checkbox"/> 10. Urethritis | <input type="checkbox"/> 18. Anorexia Nervosa |
| <input type="checkbox"/> 2. Psychoneurosis | <input type="checkbox"/> 11. Oral Thrush | <input type="checkbox"/> 19. Hodgkin's Disease |
| <input type="checkbox"/> 3. Learning disability | <input type="checkbox"/> 12. Thrombocytopenic purpura | <input type="checkbox"/> 20. Systemic Lupus Erythematosus |
| <input type="checkbox"/> 4. Asthma | <input type="checkbox"/> 13. Cystitis | <input type="checkbox"/> 21. Multiple Sclerosis |
| <input type="checkbox"/> 5. Bronchitis | <input type="checkbox"/> 14. Urinary infection | <input type="checkbox"/> 22. Sarcoidosis |
| <input type="checkbox"/> 6. Hay Fever | <input type="checkbox"/> 15. Gastritis | <input type="checkbox"/> 23. Rheumatoid Arthritis |
| <input type="checkbox"/> 7. Hives | <input type="checkbox"/> 16. Colitis | <input type="checkbox"/> 24. Myasthenia gravis |
| <input type="checkbox"/> 8. Endometriosis | <input type="checkbox"/> 17. Crohn's Disease | <input type="checkbox"/> 25. Scleroderma |
| <input type="checkbox"/> 9. Vaginal Yeast Infection | | |

D.) Have you ever taken any of the following:

- | | | |
|--|---|--|
| <input type="checkbox"/> 1. Electric shock therapy | <input type="checkbox"/> 4. Psychiatric drugs | <input type="checkbox"/> 7. Immuno suppressent drugs ie: cortisone, steroids or chemotherapy |
| <input type="checkbox"/> 2. Birth control pills | <input type="checkbox"/> 5. Antibiotics | |
| <input type="checkbox"/> 3. Valium | <input type="checkbox"/> 6. Sulfa drugs | |

E.) Do you frequently crave or eat the following foods regularly:

- | | |
|--|--|
| <input type="checkbox"/> 1. High sugar foods | <input type="checkbox"/> 4. High yeast foods ie: malted products, breads, pastries, cookies, cheese, vinegar, whiskey, vitamins from yeast |
| <input type="checkbox"/> 2. High refined carbohydrate diet | |
| <input type="checkbox"/> 3. Milk products including yogurt | |

F.). Have you:

100

- 1. Been pregnant more than once?
- 2. Had prolonged exposure to molds, in an older moldy house, living near water, or at work?

- 3. Had fungus infections between fingers, under the breast, in groin, in fatty tissue folds on scrotum?
- 4. Onset of symptoms related to antibiotic therapy, birth control pills, pregnancy, cortisone or chemotherapy?

Gait Allergy Testing

by Kenneth S. Feder, D.C.

Abstract:

This paper outlines a procedure to enhance muscle testing evaluation of allergies.

Applied Kinesiology has provided a usefull clinical tool for determining allergic susceptibility to various foods, chemicals, and inhalants. It can be employed by utilizing appropriate indicator muscles and challenging these indicator muscles by having the patient taste or smell various foods or substances.

The following testing procedure may assist in the accuracy of allergy testing.

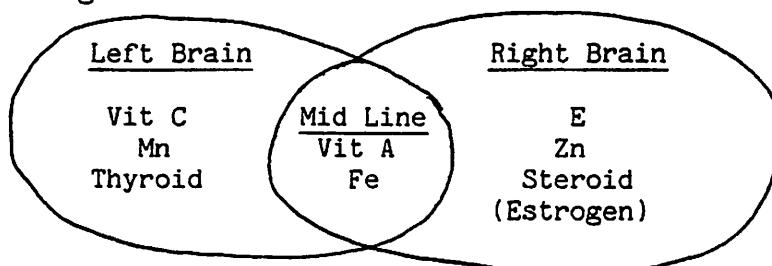
1. Determine indicator muscle strength.
2. Use normal muscle testing allergy procedure. If you suspicion an allergy yet no weakness can be found of the indicator muscle, then proceed as follows:
3. Employ gait technique while muscle testing. This involves the raising of one of the patient's legs and then testing the indicator muscle while the suspected allergen is in the mouth of being encephalated. Example - The left PMC is the indicator muscle. The patient raises the left leg first and the left PMC is tested. If no weakness is found, then have the patient's right leg elevated and test the left PMC. If a hidden allergy response is present, the PMC will weaken.

As an aid in the support of allergy treatment, the following may be utilized. We know that left brain activity is associated with thyroid function. We also know that the left brain controls the right side of the body. Similarly, steriod (ovarian and or adrenal) activity is associated with right brain activity. We also know that the right brain activity controls the left side of the body. To determine if thyroid support has some influence on allergy susceptibility, proceed as follows:

1. Place the testing sustance along with the thyroid glandular in the mouth to determine if the right leg gait weakness is abolished. You may have to test manganese because it is necessary for thyroid hormone to function in the electron poising system. To determine if steroid support is necessary, place the corresponding right brain glandular (adrenal) in the mouth with the tested substance, and re-check to determine if the left leg forward test is now neutralized.

Utilize all elements of the electron poising system to determine which additional nutrients negate challenge.

Right Brain and Left Brain Chemical Factors



Gait Allergy Testing
Page 2

Conclusion:

The use of gait allergy testing has been extremely helpful in finding allergy weaknesses and the utilization of the electron poisoning relationship to right and left brain has added a new dimension to the treatment of resistant allergy cases.

1. Schmitt, Walter H. Jr., The Cranial-Spinal Torque Pattern.
I.C.A.K. Collected Papers Summer 1983

Walking Disc - Expanded
by Kenneth S. Feder, D.C.

Abstract:

This paper is an expansion of the walking disc technique submitted in the Winter edition of the collected papers of the members of the International College of Applied Kinesiology.

As the previous paper outlined, there are many patients who exhibit discogenic related symptoms, but however, show a negative therapy localization and challenge while in a prone position. As the "walking disc" procedure indicated, these patients may require therapy localization and challenge in a weight bearing gait position.

The procedure suggested was:

1. The patient stands with feet together with hands in proper therapy localization for determining disc involvement. This may be referred to as "framing of the disc." The neck flexors having previously been tested clear and found strong should then be tested to determine if a positive therapy localization exists. If found positive, then treat as the previous paper recommended or refer to my paper entitled "Flexion-Traction Technique."
2. If therapy localization is negative in a weight bearing posture, have the patient continue to TL the suspected disc lesion; however, have the patient advance either the right or the left leg. The TL may then reveal a hidden disc with one or the other leg advanced.
3. Having determined which advanced leg produces a positive TL, continue having the patient advance the same leg while you challenge to ascertain the side of involvement. (Note: the challenge will not reveal involvement if the non-involved leg is advanced.)

Correction:

Once the side of involvement has been determined, have the patient advance the non-involved leg (the leg that did not produce a positive TL) and proceed to correct the disc. Use the same corrective procedures outlined in my paper "Flexion-Traction Technique"; however, apply while patient is in a weight bearing position.

Addition: "Basic Gait Technique"

Once the disc has been attended to, evaluate the patient in a weight bearing position to determine if a hidden peri-anal fault exists. The procedure is as follows:

1. Advance the patient's leg that produced the challenge weakness for the disc.
2. Have the patient therapy localize each peri-anal area separately and evaluate the indicator muscle for weakness.

Walking Disc - Expanded
Page 2

3. Once the side of involvement has been uncovered, correct as follows:
 - A) Advance the leg which did not produce the TL weakness or challenge weakness.
 - B) While maintaining the non-involved leg forward, take a peri-anal contact on the side of challenge and use the standard correction procedure of peri-anal involvement. This is a "basic contact" with pressure applied cephally and slightly anterior.

The correction of the "Basic Gait" lesion in weight bearing seems to influence the integrity of the sciatic nerve increasing thoraco/lumbar flexibility and reducing sciatic nerve irritation.

Conclusion:

These procedures may have to be employed immediately after non-weight bearing corrections have been implemented. Recurrence of the original problem may present itself as soon as the patient gets off the table and assumes a weight bearing position and begins to walk.

1. Feder, Kenneth S., Walking Disc.
I.C.A.K. Collected Papers Winter 1983

A CURE FOR DYSLEXIA AND LEARNING DISABILITIES

by Dr. Carl A. Ferreri

Do you tire easily while attempting to read?

Do you lose your place on the page often?

Do you find you must go back over a word, sentence or phrase to get any meaning out of it?

Do you see words or letters backward or transposed?

Do you confuse the plus and multiply signs, or the minus and divide signs?

Do you tend to run into things even though you try to avoid them?

Do you confuse your right and left?

Do you tend to write or print backward or reverse your letters occasionally?

Do you read or talk with a degree of hesitation?

Is your walking unsmooth or disorganized?

Do you have occasional short span memory retention?

Do directional signs confuse you?

Do you have to ask people to repeat or explain because you are not sure what they said?

Do you get "lost" when trying to follow directions to a location?

If you must answer yes to any of these questions for either yourself or your child, it is very possible that you are among the 20% of the population who are said to have some degree of learning disability.

Investigation, by many, into Dyslexia and Learning Disabilities has determined that these are not diseases or pathological in nature but rather a condition of some sort.

Further investigation has led to the conclusion that these conditions are essentially a disorganization of the nervous system and its ability to process or enterpret the information coming in through the senses. Dyslexia and most L.D.'s manifest themselves as a complex of disorganization both neuromuscular and cognitive. If we look at the total picture of a dyslexic we find gait discoordination, hand eye discoordination, dysequilibrium, confusion as to right and left handedness, directional confusion, inability to understand some written or spoken language, mirror image sight or reversal of letters and/or numbers and symbols, short term memory problems, etc. Dyslexia and L.D. is therefore essentially a switching problem with predictable and very specific switching problems.

Let us therefore discuss the basic organizational reflex mechanisms indicated by the general disorganization presented by the typical dyslexic. The ultimate switching for the condition is in the cranium but we know that if there are body switching and disorganization of gaits, unless they are corrected the cranial corrections will not hold. We need, therefore, a place to start the organization which will ultimately eliminate this condition on what, so far, seems to be a relatively permanent basis.

We start with the basic or inate switching and coordination reflex mechanisms.

With the patient prone we first test for posterior switching disorganization. Coccyx-imbilicus and coccyx-K27 are tested by therapy localization and corrected as needed with heavy stimulation.

The next step is to challenge the posterior cloacal reflex system and the labrynthine righting reflex system. This is important because the combination of these two reflex systems plus their anterior equivalent (anterior cloacal and ocular righting [visual] reflex) are the basis for all our gait mechanisms. We further know that the gait mechanisms particularly the cross crawl patterning is essential for neural organization.

These systems are tested by therapy localization individually and together, that is, combining cloacal and labrynthine righting reflexes both with the eyes open and the eyes closed. The reasons and complete explanation for the above will be discussed in a future paper on the Total Centering/Righting Reflex System. The points for testing these reflexes are found, for the posterior cloacal system, on the medical aspect of the apex of the sacrum in the sacral tuberosis ligament according to Beardall and I have found the ischial tuberosity to be in equally effective as an indicator. The labrynthine righting reflex points are found to be in the groove medial to the mastoid and probably 3 in number along that groove. Any failure in these systems are corrected either individually or in combination with the eye option open or closed with either the respiratory assist movement, that is, moving the part into its normal respiratory motion (the ischium moves in a arc medial and upward toward the opposite shoulder and the mastoid moves essentially anterior and medial-both on inspiration) or with heavy rubbing (Beardall) or with wet hand contact until pulse is felt.

Because we are dealing with many children the respiratory assist correction is preferred

When all points and combinations are clear the patient is then put supine. With the patient supine test for lateral occiput first by using the tongue directional test. Have the patient protrude the tongue right and left, use muscle indicator for results. If there is a lateral occiput present future tests may be inclusive. Correct by adjusting the occiput on the atlas. Occasionally, in very switched patients, the test will be positive in both directions. This indicates an anterior atlas which may be corrected intra orally (on the anterior ring) or with a sharp bilateral thrust on the transverses of atlas on inspiration. T.M.J. may be a factor and should be tested and corrected as necessary.

The anterior switch of K27 and unbilicus is most important in this technique. Almost always it is found bilateral. Correction is heavy rubbing. This is extremely painful and the patient may be tender for 2 or 3 days. Let them know this. Ideally, rubbing should be done until tenderness subsides, but this is many times not possible and needs to be followed up on subsequent visits. K27 must be non sensitive on completion of treatment plan.

The anterior cloacal reflex system and ocular (visual) righting reflex are then challenged individually and in combination again with the eyes open and closed in each phase. I use the term ocular righting reflex as we are dealing with visual and non visual functions of the eye, in the total awareness of the body in it's orientation in space.

(This will also be discussed in the afore mentioned paper).

The anterior cloacal reflex points are found medial to the operator foramin on the pubic bone and the occular righting reflex points are found in the superorbital notch over the eye sockets. Again the correction is made by either the respiratory assist adjustment or heavy rubbing over the points or a wet hand contact until pulse is felt. (The rubbing stimulation on the anterior cloacal points is again very painful). The pelvis opens on inspiration, the anterior superior spine of the ilium moves lateral and downward and the frontal bone lifts like the wings of a gull from the center (metopic suture). By accenting these movements, the specific reflex is corrected.

The neck righting reflex is then challenged by placing 3 fingers in a row in the lamina groove of the 1-2-3 cervical vertebra simultaneously. This is also tested eyes open and closed and corrected accordingly with heavy rubbing stimulation.

This then completes the centering organization of the body and now the cranial correction will hold.

The cranial function is next to be considered in the correction of the dyslexic or L.D. Specifically the sphenoid and temporal bone function. Occasionally the frontal and zygomatic are involved but that would be obvious under those conditions when the eye muscles do not clear. We must consider the sphenoid in its 4 motions. Flexion, (tested by pulling the pallette apart, thumbs in mouth) Lateral wing spread (tested with thumbs in the junction of the hard and soft pallate) Spheno basilar primary respiratory motion (tested with fingers on the lateral aspects of the sphenoid wings or with inspiration, expiration).

The tilt or torque (tested with fingers on the upper ridge of the lateral aspect of the wings on the side of the skull and the opposite lower aspect of the wings - definite ridge is felt on the high side, and a definite depression is felt on the low side) Corrections are made as found with a respiratory assist - flexion fault by spreading the palate in inspiration - lateral wing spread by lifting the wing toward the lateral posterior eye socket on inspiration - sphenoid basilar primary respiration fault by contacting the occiput posterior and eye sockets anterior or contacting in back of upper front teeth in mouth and lifting on inspiration - and the tilt or torque fault contacting with superior hand lateral aspects of sphenoid on the skull, reach in back of last molar on low side with inferior hand and twist with superior hand in direction of correction and lift on hamulus or hamate process of sphenoid on low side in inspiration (usually painful) - The temporal bone is corrected by a torque type move depending on fault - if negative finger (expiration fault) then fixes on inspiration in an anterior twist, if positive finger (inspiration fault) then fixes on expiration in a posterior twist. Because they move in reciprocal motion the correction can be simultaneous.

This then gives us a differential diagnosis for Dyslexia. Must have a posterior switch - lateral occiput - K27 - Cloacal combination fault - at least 3 sphenoid and 1 temporal fault and eye options that do not clear, as we would expect after what was just done.

This brings us to the final thing that makes the whole thing work and ultimately holds the cranial correction together.

It is responsible for the eye fatigue and the body switching and confusion, hand eye coordination, various mental processing of data, memory faults, etc.,etc. Some new research on the non visual function of the eyes brings this out very dramatically. In now testing the eye motion in all its options (all points of the compass) we find faults usually to the left up, side and down, but they can be anywhere. These are cleared by having patient look in the direction of failure and then close eye and contact eye ball on side away from fault. A firm pressure is directed into the exact direction of fault stretching the eye muscle and fascia in that direction. Retest to see if clear. Then have patient contact K27 and retest in all directions. New failures will now show, they may be the same as before or different. Correct in same way. This is to establish hand (body) eye coordination. To prove this instead of contacting K27 have patient hold a book and read, hold a pencil or any object in the hand and do the same test. Retest after correction!! Then have patient contact Cross K27 or Cross legs and retest eyes in all directions and correct in same manner. This is for all cross body functions. This must be done because we should have all options and is essential in the correction of Dyslexia and L.D.

Learning Disabilities are just a lesser complication of the Dyslexic combination.

If done with skill the protocol requires usually 3 to 5 treatments with followup complete evaluation in about 2 weeks then on a monthly basis for 3 to 5 months and then after any severe illness, trauma, etc. (emotional or physical).

Many times the patient is hyperactive and there is always a specific allergy involved which will recreate the reversals. Try to find the most dramatic allergies (many times it is pink in color-gum, icing, baloney, etc). The sphenoid will immediately tilt and the patient will reverse everything. Correct the sphenoid tilt with the allergin in the mouth or on the skin and then adjust 2-8-10 or 12D, tap SP21 and K27 simultaneously (usually painful) until pain stops - pump liver (sometimes entire PMS procedure is necessary N.L.,N.V., meridian, turn on pts. and T.S.8 CMRT hold). This will deprogram the allergy and eliminate the problem - Many times this acts as a "critical mass" type of treatment and all other allergies clear.

Many times there is an emotional "hang up" related to the reversals and/or some other very painful experience which will prevent that part of the correction to take hold. If patient reports they still have reversals, investigate this thoroughly and program this out. Have patient think about whatever is bothering them emotionally (they usually know) recheck sphenoid under these circumstances, make proper corrections, recheck eyes while they hold thought, make proper corrections then catalogue patient and finish with a 4th ventricle hold or pump.

You have now completed treatment. In most cases patients will emmediately know there is a dramatic change. They will make remarks like they "see like they have a new pair of glasses" or that they never saw haw beautiful the trees look (they had focal plane sight up till now - no proper glass could ever be fitted etc., and now they have third dimential sight with proper depth of field).

They can hold the road better in driving etc., etc. Those who can read will rapidly improve their reading skills, speed and comprehension (in my experience anywhere from 8 hours to about 1 week). In 6-8 weeks most of the children will have demonstratable school evaluation improvement - In approximately 6 months there will be dramatic personality changes as they can now function in this world of signs, books, and other media. They must practice thier new skills, the more practice the better.

Any questions, please contact me.

Dr. Carl A. Ferreri D.C. Ph. C.
3860 Flatlands Avenue
Brooklyn, New York 11234
212-253-9702
212-253-0485

ANTERIOR LUMBAR PATTERN

by

Terry L. Franks, D.C.

ABSTRACT:

The anterior lumbar pattern is a complex and multi-faceted group of changes and adaptations that appears to be caused by a specific cranial fault.

The following findings are commonly found to be part of this phenomena.

Muscle:

1. Weak neck flexors
 - a. Sternocleidomastoids weak.
 - b. Scalenes may be hyper or hypotonic-diagnosed as a scalenus anticus syndrome if hypertonic.
2. Weak abdominals and adductors.
3. Pronation problem with any or all of the leg flexors weak.
4. Hypertonic psoas but occasionally hypotonic. If weak, check for nephrotosis and associated occipital subluxation.
5. Hiatal hernia-due to the imbalance of the psoas, abdominals, and the diaphragm.

Bone:

1. Posterior occiput
2. Anterior atlas
3. Anterior lower cervicals
4. Posterior upper thoracics
5. Anterior lumbar-most commonly L5
6. Posterior pelvis
7. Anterior tibia at knees or ankles
8. Disc involvement at C6 and C7 or L4 and L5
9. Upper thoracic rib subluxations
10. Recurring fixation patterns
11. Multiple cranial adaptations
12. Temporal Mandibular Joint dysfunction

Tendons and ligaments:

Recurring strains and sprains of the neck and back.

Adhesions:

Recurring adhesion formation throughout the anterior cervical region.

The anterior lumbar (typically L5) manifesting as low back pain is the most common complaint that brings the patient into our office. The back pain is recurring with all indications of a facet syndrome and possible disc involvement. The low back pain is directly related to the weak abdominals and the resultant hypertonic psoas. The origin of the psoas on the lumbar is constantly pulling anterior and inferior on the vertebra. If there is a history of low back injury, the ligament instability allows for increased irritation.

Therapy can be directed at any of the multiple factors previously listed. The attempt is to treat the primary cause and not the effect. We might ask as to what could be so primary that the body would tolerate so large a number of distortions and not correct them? The answer may be that the primary fault is life threatening.

If the assumption is true that cranial bone motion is needed to maintain life, any fault which would stop this motion would be life threatening. If the primary motion is sphenobasilar, then any fault stopping this movement would fulfill the basic assumption. The large number of people with these symptoms would also indicate a common history.

In the authors' experience the following factors appear to explain the clinical findings:

1. Poor nutrition in pregnancy resulting in poorly formed maxillary arches and other cranial bones.¹
2. Pressure either in utero or at birth compressing the maxilla, frontal and sphenoid bones medially.^{2,3}
3. A jamming of the front-sphenoidal suture severely limiting motion of the sphenoid bone.⁴
4. Immediate adaptation of the body to provide increased movement of the sphenobasilar symphysis by flexing the frontal bone while extending the maxilla and vomer. This movement allows for increased motion of the fronto-sphenoidal suture and therefore increases sphenobasilar flexion and extension.

The exact adaptation depends on precisely where the jamming occurs and if it is unilateral or bilateral on the suture. These adaptations require the body to facilitate some muscles and inhibit others. The previous list of findings appear to be the result of these changes.

The symptomatic pattern produced by the fronto-sphenoidal lesion is consistant in findings but variable in degree. The presenting complaint may be any symptom associated with these findings but will be modified in intensity by other structural, chemical, or emotional factors. A common observation is that a chronic low back becomes an acute low back due to a fear response or an allergic reaction. The ability to diagnose and treat at a more causative level is helpful to both the doctor and his patients.

REFERENCES

- (1) Harold I. Magoun, Osteopathy in the Cranial Field, 3rd ed. (Meridian, Idaho: Sutherland Cranial Teaching Foundation, 1976)
- (2) IBID.
- (3) Denis Brookes, Lectures on Cranial Osteopathy, (Wellingborough, Northamptonshire: Thorsons Publishers Limited, 1981)
- (4) IBID.

MULTI POSITIONAL - UNI VECTOR MUSCLE TESTING

BY

CHRISTOPHER L. HARRISON, D.C.

DIPLOMATE

INTERNATIONAL COLLEGE OF APPLIED KINESIOLOGY

ABSTRACT

This paper deals with a variation from traditional muscle testing. In the paper the author shows that using different positions along the same vector can produce varied results in muscle tests. The author cites his research in this area to substantiate his findings.

In 1983 while attending a Kim Christensen athletic injury seminar, the author became acquainted with the concept of testing muscles, using the same vector but with varied positions along that vector. The idea put fourth by Christensen was that he found muscle weakness on certain positions of a given vector while strength on the others.

This idea intrigued me, as I don't recall that concept being mentioned within the International College of Applied Kinesiology or anywhere else for that matter. I have noted Beardall's work in which he incorporates minute vector variances to test different portions of a given muscle. This is different in that the examiner uses the exact same vector in each test but different positions along that vector.

The question then arises: just what are we testing when we test the same muscle in the same vector and see varied test results with different positions on that vector? This intrigued me, so I decided to embark upon a research to see what actually transpires when a format is set up to evaluate multi positional-uni vector muscle testing.

We decided to divide each muscle test into three distinct positions:
 Position #1....Contracted position
 Position #2....Mid Range position
 Position #3....Extended position

The testing was performed during our initial physical examination in which we routinely test ninety muscles. In the following tests a total of sixteen patients were tested and a total of two hundred and eighteen muscles were tested. With three separate tests for each muscle a total of six hundred and fifty four muscle test were performed. The test results were as follows:

Position #1....Contracted position.....Strong...177	Weak....41
Position #2....Mid Range position.....Strong...122	Weak....96
Position #3....Extended position.....Strong...116	Weak...103

The results of this survey research clearly demonstrate that when the muscle is subjected to increased extension it tends to become weaker and conversely when the muscle is subjected to increased contraction it tends to become stronger. Traditional muscle testing usually incorporates the mid range position and as we see here there certainly are questions that can be raised as to the validity of mid range muscle test positions when one wants to uncover all of a muscle's weakness.

I invite the reader to simply test muscles in the manner described above and notice the results. The author would appreciate receiving your data.

My special thanks to my associate , Alan Silverberg, D.C. for his detailed data entry for this project.

CHRISTOPHER L. HARRISON, D.C.

PALO ALTO, CALIFORNIA

JANUARY, 1984

INTO LESION-LIGHT FORCE ADJUSTING

BY

CHRISTOPHER L. HARRISON, D.C.

DIPLOMATE

INTERNATIONAL COLLEGE OF APPLIED KINESIOLOGY

ABSTRACT

In this paper, the author explains the genesis, the development and the clinical applications of an adjusting technique that he has researched and evolved. This technique is especially useful when more vigorous adjustment are contra indicated, however, he goes on to show that it can be used generally in manipulative practice.

In 1975, while reading an osteopathic journal, the author happened to read an article which related the physiopathology of the so called osteopathic lesion. I don't recall the author or the name of the journal, however, the imbalance of the muscles at the subluxated joint were discussed at length. In this discussion, the rotatores longus and brevis were noted as those among the most prevalent group to hold the vertebrae into lesion in spinal subluxations. The author went on to explain that by forcing the joint into the lesion or in other words to exaggerate the subluxation for a period of at least 90 seconds would in fact actually correct the lesion.

Upon reading that particular article, I immediately went out and purchased a timer clock for each adjusting room and began experimenting with different times and varied pressures in making these into lesion adjustments. We eventually found out that it wasn't so important as to exactly how long the doctor held the subluxated segment into lesion but rather how many breathing cycles the patient would go through while the doctor forced the segment into lesion. It also became apparent to us that the amount of force placed into the segment also contributed to the success of the correction. Over the years, we have refined this type of adjusting and have arrived at a formula that has been extremely effective whenever the technique is employed. The following will give the reader a detailed analysis and description of how to incorporate this style of adjustment into his/her practice.

Using therapy localization, determine the segment to be adjusted. Then use vertebral challenge to determine the direction of lesion and your vector of correction. If there is any question as to the outcome of the vertebral challenge, you might consider doing as we do. We use both rebound and steady state methods of challenge and the two must agree before adjusting the segment. You might want to refer to my article

in the COLLECTED PAPERS of 1977 for clarification on these two vertebral challenges. 1.

When you are satisfied that you have ascertained the direction of lesion, force the spinous process and the transverse process into lesion. For instance, if you have a Gonstead listing of a thoracic vertebra of P L (spinous left) you would push the spinous from right to left and hold. Simultaneously push the left transverse process anterior and hold. You hold the segment as mentioned above with 20 pounds of pressure and have the patient breathe deeply for six cycles of respiration while you hold the segment into lesion. We always use an Activator adjusting instrument and adjust the segment out of lesion at the spinous and at the posterior transverse process as a way to seat the segment into correction. This seems to hold the correction somewhat better but the use of the Activator is not necessary for the correction to be made.

We have found this type of adjustment quite appropriate when heavy force is contra indicated, such as in osteoporosis, adjusting into pottenger saucers and when adjusting on or near fractured segments. The only disadvantages that we have noted is that the adjustments may not hold quite as well as in forceful articular adjustments, although the difference is very minimal, and they take a few seconds longer.

I highly recommend that the reader try this form of adjustment and I am confident that he/she will find it useful in helping our fellow man back to health.

CHRISTOPHER L. HARRISON, D.C.

PALO ALTO, CALIFORNIA

JANUARY 1984

REFERENCES

1. Harrison, Christopher L., "Rebound Vertebral Challenge Versus Steady State Vertebral Challenge" Collected Papers of the Members of the International College of Applied Kinesiology, Winter Meeting , 1977 pp.141-147

THE "HIDDEN" UPPER CERVICAL FIXATION

by
James D. Hogg, D.C.

ABSTRACT: A method is presented for finding an upper cervical fixation when the gluteus maximus tests strong bilaterally. This fixation is hidden by meridian problems involving the five element energy cycle.

About a year ago my good friend, Dr. Don Cass, D.C., reawakened my interest in upper cervical emphasis through his interest in Grostic and N.U.C.C.A., two upper cervical-specific approaches. As a result, I started utilizing a spinal prioritizing technique with emphasis on the upper cervical area. I have extrapolated this method from Dr. Walter H. Schmitt's work.¹ Briefly stated, if two subluxations will therapy localize, thereby causing a strong muscle to test weak, the results may change if they are therapy localized in the proper sequence. For instance, if C2 and L4 both therapy localize individually, try therapy localizing first to L4 and then to C2 while maintaining the L4 therapy localization. If C2 is primary or major to L4, the double sequential therapy localizing will allow the strong indicator to stay strong. In this case, adjusting C2 will usually automatically clear L4 via the somato-somatic reflexes. In this way, I can usually find one or two major subluxations which will clear the rest of the spine.

Using this technique, I eventually discovered a number of instances wherein the double T.L. would show an upper cervical or atlas major but I could not elicit a positive T.L. or challenge to atlas individually. At first, I thought that I had discovered some sort of hidden atlas subluxation but on closer examination discovered that what I had actually found was an upper cervical fixation. The fact that I could elicit, in effect, a static therapy localization to a fixation in this manner was in itself interesting, but there was an even more interesting aspect to this discovery. In many cases I could not elicit the bilateral gluteus maximus weakness characteristic of an upper cervical fixation.² Temporal tap³ and E.I.D.⁴ failed to bring out the expected gluteus maximus weakness. Further investigation revealed that the fixation would challenge in a normal fashion and would therapy localize with the addition of cervical motion. I then began to suspect that it was not actually the fixation but the bilateral gluteus maximus indicator that was "hidden".

For a time, I proceeded to simply adjust the fixation after which the subluxation would T.L. and challenge in a normal fashion.⁵ After trying numerous methods to bring out the gluteus maximus weakness, it occurred to me that perhaps patients with a hidden gluteus maximus weakness had excessive circulation sex meridians. Since the gluteus maximus muscle is supplied by the circulation sex meridian, this condition would have the effect of feeding extra energy into the gluteus maximus and keeping it strong when it should have tested weak. This therapy seemed especially likely since my records indicated that there was usually a weak tensor fascia lata or hamstring group whenever I encountered a "hidden" upper cervical fixation. I suspected a possible imbalance in the five element circulation of meridian energy with the energy blocked in the KO cycle between circulation sex and large intestine meridians.⁶ Testing my theory, I found that the fire point on the large intestine meridian (Li5) showed a positive therapy localization. Also, therapy localization to the circulation sex meridian alarm point would temporarily strengthen the weak tensor fascia lata or hamstring muscle. Both these tests tend to indicate a deficient large intestine meridian secondary to an excessive circulation sex meridian.

Taking these indicators to their logical conclusion, I balanced energy between the two meridians by stimulating Li5 with 10-15 seconds of manual tapping. Afterward, Li5 would no longer T.L. the tensor fascia lata/hamstring group tested strong and the gluteus maximus tested weak bilaterally! At this point I was able to proceed in a normal fashion as for an upper cervical fixation with the fixation adjustment restoring strength to the gluteus maximus etc.

Dr. Elmer J. Cousineau's reporting of Dr. Robert Riddler's work⁷ added another diagnostic feature to the revelation of the "hidden" upper cervical fixation. Dr. Riddler demonstrated a relationship between various pelvic stabilizing muscles and cervical subluxations. Therapy localization to the correct subluxation would temporarily strengthen a pelvic muscle which had been weak in the clear. I found that this relationship worked quite well in my practice and that when this relationship manifested itself, adjusting the appropriate cervical vertebra would usually restore strength to the involved pelvic muscle often simultaneously correcting a pelvic misalignment which had been secondary to the muscular weakness. I certainly wish to thank Dr. Cousineau for bringing this work to our attention. As might be expected, I also found a number of instances in which a weak pelvic muscle strengthened when the appropriate cervical level was therapy localized but could not elicit a positive T.L. or challenge to that

vertebra using a strong indicator muscle. Further testing demonstrated an upper cervical fixation but, in many cases, no bilateral gluteus maximus weakness. These cases involved the excessive circulation sex meridian, usually with the deficient large intestine meridian mentioned earlier with an occasional spleen (sheng cycle) deficiency.

To date, I have noted approximately 65 cases in which patients have exhibited upper cervical fixations with the gluteus maximus weakness "hidden" by an excessive circulation sex meridian. I have also discovered cases in which other fixation indicator muscle weaknesses have been "hidden" in a similar fashion. In several cases I have found C7-T2 area fixations "hidden" by an excessive lung meridian, lumbar fixations "hidden" by an excessive stomach meridian, etc.

CONCLUSION

In summary, upper cervical lesions may be overlooked in normal spinal screening using muscle testing. The subluxation will not T.L. because it is masked by a fixation and the fixation may be missed because the gluteus maximus muscles are strong to manual testing. The subluxation/fixation may be discovered by double therapy localizing against a pelvic or lumbar misalignment that is secondary to the upper cervical lesion. It may also be found by using the appropriate weak pelvic muscle a'la Riddler as an indicator. This "hidden" gluteus maximus weakness may be caused by an excessive circulation sex meridian. Once the meridian energy imbalance is corrected, the gluteus maximus muscle will test weak bilaterally and the fixation/subluxation complex can be dealt with in the usual fashion of removing the fixation and then adjusting the associated subluxation. Although I have found this situation more commonly in the upper cervical region, this could be because I was examining this area more closely. Checking for this "hidden" fixation has proven to be the key to several of my cases which exhibited persistent and recurring structural problems.

BIBLIOGRAPHY

1. Schmitt, Walter H., D.C., Common Glandular Dysfunctions in the General Practice, Privately published, P. 140-141, 1981.
2. Walther, David S., D.C., Applied Kinesiology, Vol 1 Systems D.C., P. 69, 1981.
3. Ibid, P. 112
4. Goodheart, George J., Workshop Procedure Manual, Privately published, 1980.
5. Op. Cit., P. 70.
6. Walther, David S., D.C., Applied Kinesiology, The Advanced Approach In Chiropractic, Systems D.C., P. 189-191, 1976.
7. Cousineau, Elmer J., D.C., "Muscle Weakness Corrected by Cervical Adjusting", ICAK Collected Papers, P. 51-52, Winter 1983.

ER vs RR
Emergency Response vs Relaxing Response

by John T. Hughes, D.C.

Abstract: A system for preventing the cumulative effect of stress (distress) is presented.

Stress has been defined as a non-specific response of the body to any demand made upon it and distress is defined as damaging or unpleasant stress.¹

The body responds to a distress stimulus with an emergency response (ER) often referred to as the fight or flight reaction. Briefly stated this emergency response includes a tensing of the muscles of the face and scalp, a bracing or clinching of the jaw and catching of the breath or shallow, rapid breathing.

The negative, tensing, energy wasting effect becomes cumulative unless counter measures are taken to replace the repetition of emergency responses.

The muscles of the cranium and the jaw closing muscles are most often found to be hypertonic.² We feel that this is due to the cumulative effect of bracing and clinching against frequent distressful stimuli.

We try to teach our patients to avoid this cumulative tensing effect by making three definite and deliberate responses each time they are faced with a distressful situation.

These three simple responses; however, are only first aid measures and requires the application of AK measures for more permanent correction.

In order to counteract the tensing of the facial and cranial muscles under stress the patient is instructed to smile.

We demonstrate this to the patient by testing an intact muscle such as the pectoralis major clavicular and then test it again with the patient frowning. The muscle usually weakens. Next, we instruct the patient to smile and retest the muscle which then tests strong. The lesson to the patient is obvious; however, it tells the Applied Kinesiologist that the patient has a cranial fault that needs correcting.

Secondly, we instruct the patient to relax the jaw muscles so that the upper and lower teeth are not touching. We point out to the patient that the upper and lower teeth are touching only if the jaw muscles are tense or contracted. We have the patient to check frequently throughout the day to see if their teeth are touching.

We check the TMJ's and make corrections as needed.

Finally, we instruct the patient to slowly take in a deep breath in order to overcome the shallow, stressful breathing.

Frequently the diaphragm will need treatment in order to allow most efficient function.

In summary, we tell the patient to smile, relax the jaw and take a deep breath each time they are faced with a difficult situation. This may be ten times per day or a hundred times per day. It takes only a few seconds and while they are carrying out this response they cannot be doing the distressful emergency response.

After doing this for some time we were delighted to find a book written by Dr. Charles F. Stroebel, M.D. entitled "QR, The Quieting Reflex". Dr Stroebel goes into great detail describing a similar procedure. I recommend this book to you.³

References

- (1) Selye, Hans, M.D., "Stress Without Distress", J.B. Lippincott Co., 1974
- (2) Goodheart, George, D.C., Applied Kinesiology 1979 Workshop Procedure, Privately Published, Detroit.
- (3) Stroebel, Charles F., M.D., "QR, The Quieting Reflex" a Berkley Book published by arrangement with G.P. Putnam's Sons, April 1983.

INTRODUCTION TO APPLIED KINESIOLOGY

BY

ALEX P. KARPOWICZ, JR., D.C., D.I.C.A.K.

ABSTRACT

The purpose of this video cassette film on Applied Kinesiology is to better inform the patient and the public as to what we do, why we do it, how it works, and what we expect of them to make a successful relationship. Today's society is very video orientated through the use of video games, computers, television and movies. Although we Doctors like to do our thing getting people better at a minimum of time lost in explanation, it is essential that today's better educated patient be more aware and feel more a part of the treatment process that does get him better. It is with this thought in mind that a better and/or alternative method of accomplishing these means was thought of through the video cassette film.

INTRODUCTION

The effectiveness of Applied Kinesiology is based upon an accurate diagnosis of what to treat. This brings us back to the basic muscle test and it's accuracy. Much time is

spent in our basic 100 hour course teaching the new Doctor of Applied Kinesiology, that the patient should be properly instructed to do his part in the muscle testing, otherwise our results are invalid and inaccurate. However, since a lack of communications is one of mankind's largest problems, this is at the least a problem which is not easily handled. So therefore, a major part of the film is dedicated to teaching the patient what they should do, what a muscle test is, what we are going to do, and also to explain how cooperation and understanding between the patient and Doctor is going to best bring the achieved results we all want. Another major point covered is to get across the point of total health care in that man is a triangle having a structural, chemical, and mental side all of which interact with one another. The point that we treat all sides of the triangle in an effort to give total health to the patient and enable them to best live life to it's fullest is explained. The five (5) factors of the IVF concept is briefly explained and touch upon. Not neglected is the underlying chiropractic principle of the spine and nervous system which is of the utmost importance in any normally functioning body. The demonstrations using a sample patient were unrehearsed so as to give a certain spontaneity and realism to the demonstration of muscle testing. I feel the movie gives a good overview of what we are trying to accomplish in Applied Kinesiology.

CONCLUSION

While the movie has just been completed and has not been utilized in my or any other Doctor's office, the feedback from the lay people, including my staff who saw it, was very favorable. The predominate impression was that it was easily understood, explained facts that were previously vague, and perhaps the most important point of feedback was that we could demonstrate the need of treatment and also after, demonstrate that it worked, both to the satisfaction of the Doctor and patient. The idea for this film came from Doctor Goodheart's work relating the different types of patients. That is audio, video, and kinetic. I feel we have an approach that each one of these patients can benefit from it.

REFERENCES

1. Dr. George Goodheart - Lectures and research notes.
2. Dr. Gary Sacks - Introduction to Applied Kinesiology slides.

VALIDATION OF OFFICE URINALYSIS PROCEDURES
AND TREATMENT PROCEDURES

BY

ALEX P. KARPOWICZ, D.C., D.I.C.A.K.

ABSTRACT

The purpose of this research project was to validate the findings and confirm the necessity of the Sulkowitch Test for urinary calcium excretion, and the Koenisburg's Test for urinary chloride (sodium) (excretion). The importance of these tests was initially brought out by Dr. George Goodheart and subsequently followed up in great detail by Dr. Walter Schmitt's book "Common Glandular Disfunctions and General Practice", and also with personal conversation with Dr. Schmitt.

DISCUSSION

The Koenisburg's Test for urinary chlorides (sodium) excretion is a first morning specimen test which should be taken before the patient eats or drinks anything. We suggest this test be run on every new patient as a screening device for hypoadrenic related problems. The normal range is 17 to 25 drops. Generally speaking 26 to 40 is considered hypoadrenic. 41 to 50 is severly hypoadrenic. 51 to 60 is severly hypoadrenic to an exhaustive stage. Finally, in late stages of exhaustion

there may be as little of 5 to 7 drops recorded in the test, but usually less than 10. Screening for hyper and/or hypoadrenia should also include checking the systolic blood pressure sitting, and then standing, along with the pupillary reflex. The symptoms of adrenal problem patients being so varied and of such clinical importance makes screening for this particular problem of necessity in our practice. When we consider some of the symptoms such as depression, asthma, respiratory infection, hay fever, skin rashes, colitis, ulcers, arthritis, insomnia, headaches, fatigue, fainting spells, heart palpitations, edema, etc., there is no wonder that adrenal problems are found in our practice.

The Sulkowitch test for urinary calcium excretion is the other important test which should be commonly run on all new patients. The results of this test should be measured on a scale rated Grade 1 through 4. Three (3) being normal, one (1) being severe low calcium, Two (2) being a moderate low calcium and four (4) being excessive calcium found in the body. If low calcium levels are found, the answer to the problem may be as simple as an increase calcium in the diet and/or calcium supplementation. Inadequate absorption of hydrochloric acid, HCL, will also result in a lower calcium in the Sulkowitch Test. Parathyroid, thyroid and adrenal glands functioning abnormal may also result in high or low

calcium test results. I highly recommend my reference sources as required reading on this subject matter, both by Doctor Walter Schmitt and Doctor George Goodheart. We could be doing our older patients a great service by finding an abnormal calcium level and help prevent such things as osteoporosis and Paget's disease. Again this paper and approach represents just another piece of the puzzle which enables us to perform a better service for our patients.

In an effort to get an idea of the frequency of occurrence of abnormal tests related to the respective Sulkowitch and Koenisburg Tests, I tested all the patients in my practice in a given month with the following results: We tested 124 patients for the Sulkowitch Test for urinary calcium excretion. 55 patients tested normal; 38 patients tested a Grade 1; 16 patients tested a Grade 2; while 15 patients tested a Grade 4. We tested 114 patients for the Koenisburg Test for urinary chlorides excretion with the following results: 25 Tested normal; 18 were in the 26-40 range; 19 were in the 41-50 range; 40 were in the 51-60 range and 12 were below 17. Therefore, with 56% of the patients showing a positive Sulkowitch Test and 79% of the patient's showing a positive Koenisburg Test, the importance of the test being used as a general screening device in our practice is very obviously warranted. On all new patients we also us a general urinalysis screening with a company called Lab Stix which are reagent

strips for urinalysis, checking PH, Protein, Glucose, Ketones and Blood. 61 such patients were tested for the above. Four (4) showed abnormal glucose; One (1) abnormal Ketone; Two (2) blood in the urine; Twelve (12) protein abnormal and fifty five (55) abnormal PH of which 53 were below 7 or acid related, and two (2) were above 7 or Alkaline. Six (6) patients showed a normal PH. Approximately 89% of the patients testing with Lab Stix showed some type of abnormality related to their PH.

TREATMENT PROCEDURES

Treatment consist of Applied Kinesiology techniques, supplementation and diet.

KOENISBURG'S TEST

1. Applied Kinesiology Approach - Being that we are testing for urinary chloride or sodium excretion we are relating this test to adrenal function. The respective muscles to be tested, involved in adrenal function, are of course the sartorius, gracilis, soleus, gastrocnemius, and posterior tibialis. If you don't find the muscles weak in the clear, remember the 51% rule, also remembering to check all five factors of the IVF.

NOTE: The Koenisburg's Test is a screening device, effective as it is, which should be correlated with other diagnostic

tests such as Ragland Sign, Rogoff Sign, pupil dilation, etc., to determine an adrenal problem does indeed exist.

2. Supplementation - Being there were no guidelines in this area related to the treatment of adrenal problems related to a positive Keonisburg Test, I took the opportunity to experiment with several combinations in an effort to return the patient to a negative test upon re-examination. What I found was that those patients in the 26-40 range best responded 3 a day of whole adrenal concentrate tissues such as used by the major companies, Nutri-Dyn, Sivad, etc. in an 80 mg. tablet. Those in the 41-50 range of a more severe hypoadrenia best responded to 6 tablets a day while those in a 51-60 range started out with 9 tablets per day. If the symptoms were severe in this range, they were started out 1 per hour for a day to 2 days then 1 every other waking hour, or 9 per day relative to their symptomatic response. In those patients below 17, especially below 10, Standard Process, Organic Minerals, three per day plus 3 adrenal were used. (NOTE: These dosages were found by trial and error that worked best in the great majority of my patients in my practice. Patients in the late stages of adrenal exhaustion my have been hyperadrenic exhibiting the signs of increase blood pressure upon standing from a recumberant position, normal

pupillary reflex, sympathetic dominance and the need for organic minerals to support the need for sodium in the system along with adrenal support. Those patients ranging from slight to moderate and severe hypoadrenia to early stages of adrenal have an excessive amount of sodium requiring the related adrenal support being predominantly parasympathetic dominate. Their blood pressure dropped upon standing and had a parydoxical pupillary reflex. The point being to determine what stage exactly a given patient my be at requires a correlation of all the diagnostic tools available to us.)

3. Diet - All patients with adrenal problems are instructed to restrict from their diet refined sugar products, caffeine, alcohol, and nicotine. Mild regular excercise is recommended to burn up the lactic acid built up in the muslces as a result of stress. Those patients in the hypoadrenic to early exhaustion stage are given a list of foods as indexed below restricting their intake of sodium and potassium. ^(A&B) Those in the late exhaustive stage where sodium loss is excdssive and the need for sodium intake increase is obvious are given the vegetable soup diet. ^(C)

SULKOWITCH TEST

1. Applied Kinesiology Approach - This test being related to level of calcium in the urine. We are testing muscles related

to the adrenal gland, thyroid, parathyroid and the level of hydrochloric acid in the body. In addition to the previous mentioned adrenal muscles we are also looking to test the Teres minor and the Infraspinatus, the levator scapulae for the para-thyroid and the bilateral pectoralis clavicular major muscles for the level of hydrochloric acid in the body which would also be tested along for the presence of a temporal buldge. If a temporal buldge is found we also look for the opposite side parietal descent. Note: Remember sometimes a temporal buldge is masked by a dorsal-lumbo fixation.

2. Supplementation - If we find low calcium in the urine we are going to use a readily absorbable calcium such as (Sivad) Cal-Acid, (Nutri-Dyne) Trace Minerals, (Standard Process) Calcium Lactate. If the level was a Grade 1, give the patient 6 per day for 1 month and retest. If it were a Grade 2 we give 3 per day and retest in 1 month. Also if we found the calcium low due to a lack of hydrochloric acid and an absorption problem, we will also utilize 2 Amino Gest, 3 times a day from Sivad or 2 Bectine Hydrochloride per day from Standard Process or similar such products. If the test result was high and we found a thyroid problem we would use a standard accepted type of thyroid supplement 3 per day such as Tri-trophic 40

(Nutri-Dyn) or Thyrozyme from (Sivad). Then monitor the temperature until we get it in the normal range (97.8 to 98.2) via the Barnes Axillary Temperature Test. Again, there are other reasons for high urinary calcium not commonly found, such as an excessive calcium intake or perhaps one of the various pathological conditions related to calcium level function in the body. Should the levator scapulae be involved relating to a high calcium and parathyroid problem then Calma-Plus from Standar Process would be the preferred product.

3. Diet - Of course if the patient had a low calcium we would put them on a calcium rich diet and vice versa if they have high calcium we would like to restrict the calcium in their diet. A person with high calcium would be advised to increase their diet by eating more vegetables, potatoes, cereal and grains, and to avoid eating the foods more high in calcium such as milk, dark leafy vegetables, yogurt, hard cheeses, bone meal, broccili, shell fish, canned sardines and salmon, egg yolks and meat. Of course those with low calcium would do just the opposite. Those patients with low urinary calcium may be also aided by eliminating foods that contained calcium, binding substances such as phytic acids, benzoic and oxalic acids. A brief but very important note regarding supplementation is that patients should not be completely withdrawn off their

supplementation after normal levels have been attained. In the Koenisburg's Test if the patient scored a 30, being in the 26-40 range, and we placed them on 3 adrenal tablets per day, if the following month they tested normal such as a 20, I would reduce the frequency supplementation perhaps down to 1 but maintain that level for 2-3 subsequent normal tests. In the Sulkowitch Test for urinary calcium excretions, if the patient was a Grade 2 and we had them on 3 calcium tablets per day and they subsequently tested a 3 in the next month, I would reduce them to 1 and maintain that level for 2 or 3 subsequent test months.

CONCLUSION

I think the necessity and benefit of utilizing urinalysis testing speaks for itself. It certainly has allowed me to better serve my patients. I hope that the guidelines that I found are beneficial in implementing the test results for you and your patients. Again, my personal thanks to Doctor George Goodheart and Doctor Walter Schmitt for the work that they have done in this area enabling all of us to be better Doctors and better serve our patients.

" A "

FOODS HIGH IN SODIUM

- | | |
|-------------------------|-----------------------|
| 1. Graham Crackers | 22. Dried Cod |
| 2. Evaporated Milk | 23. Buttermilk |
| 3. French Dressing | 24. Blue Cheese |
| 4. Popped Corn | 25. Margarine |
| 5. Canned Crab | 26. Olives |
| 6. Canned Fish | 27. Saltines |
| 7. Canned Carrots | 28. Pretzels |
| 8. Canned Asparagus | 29. Bacon |
| 9. Canned Sauerkraut | 30. Bologna |
| 10. Canned Spinach | 31. Cured Ham |
| 11. Sweet Pickles | 32. Liverwurst |
| 12. Tomato Catsup | 33. Corn Flakes |
| 13. Potato Chips | 34. Rice Flakes |
| 14. Chipped Beef | 35. White Bread |
| 15. Frankfurters | 36. Salted Nuts |
| 16. Cream Cheese | 37. Corned Beef |
| 17. Boston Brown Bread | 38. Canned Green Peas |
| 18. Cracked Wheat Bread | 39. Zucchini Squash |
| 19. Canned Baked Beans | 40. Green Beans |
| 20. Canned Lima Beans | 41. Celery |
| 21. Canned Mushrooms | |

" B "

FOODS HIGH IN POTASSIUM

- | | |
|----------------------------------|-------------------------------|
| 1. Buttermilk | 31. Dried Dates, Figs, Fruits |
| 2. Swiss Cheese | 32. Prunes and Raisins |
| 3. Cow's Milk | 33. Raw Beets |
| 4. Goat's Milk | 34. Raw Carrots |
| 5. Dried Whey | 35. Raw Parsnips |
| 6. Blackberries | 36. Raw Potatoes |
| 7. Blueberries | 37. Radishes |
| 8. Red Currants | 38. Raw Turnips |
| 9. Red Raspberries | 39. Asparagus |
| 10. Dried Apricots | 40. Beet Greens |
| 11. Dandelion Greens | 41. Raw Cabbage |
| 12. Mustard Greens | 42. Endive |
| 13. Turnip Greens | 43. Avocados |
| 14. Raw, Dry Beans | 44. Kale |
| 15. Brewer's Yeast | 45. Bananas |
| 16. Bran Flakes | 46. Cherries |
| 17. Puffed Wheat | 47. Parsley |
| 18. Wheat Flakes | 48. Spinach |
| 19. Cauliflower | 49. Artichoke |
| 20. Corn Bread | 50. Wild Rice |
| 21. Roasted Nuts | 51. Broccoli |
| 22. Cooked Meats | 52. Okra |
| 23. Seafoods | 53. Wheat Germ |
| 24. Chicken | 54. Rye Wafers |
| 25. Chocolate | 55. Sweet Corn |
| 26. Molasses | 56. Lentils |
| 27. Brown Sugar | 57. Peas |
| 28. Boston Brown Bread | 58. Pumpkin |
| 29. Cracked Wheat Bread | 59. Soybeans |
| 30. All Citrus Fruits and Juices | 50. Catsup |

" C "

LOW SODIUM VEGETABLE SOUP

1 can or pkg. French Green Beans
1 cup chopped celery with leaves
1 medium zucchini, quartered lengthwise and sliced
2 T. dehydrated onion flakes
1 cup tomato juice
1 cup water
2 T. honey
1 T. paprika
Pepper to taste

Combine ingredients and simmer for 1 hour until tender.
Serve hot or cold.

BENNETT'S NEUROVASCULAR DYNAMICS TECHNIQUE

Stephen J. Kaufman, D.C.

Abstract: although the neurovascular reflexes located on the skull by Dr. Terrence Bennett have long been an accepted part of AK procedure, equally effective treatment points exist on the body surface below the neck. This paper is intended to expose (or remind) practitioners of these areas, which are quite effective, and to offer a method by which they can be therapy localized.

Beginning in the 1930's, and continuing through to 1960, Dr. Terrence Bennett, a California chiropractic physician, discovered and researched areas found on the body surface which he found extremely effective in treating visceral malfunction.^{1,2,3} He believed that these areas worked by affecting capillary beds, and improved organ function primarily by enhancing lymphatic flow. In the 1960's, Dr. Goodheart⁴ adopted a portion of this technique and found the reflexes appearing on the skull to be effective and specific for strengthening particular muscle weakness. For reasons unknown to the present author, Dr. Goodheart indicated that the neurovascular areas enhanced blood supply to an organ, rather than stressing lymphatic activity (lymphatic activity had already been claimed by Chapman's reflexes, according to Dr. Goodheart).

Whatever the underlying physiology, the present author has been using Bennett's neurovascular reflexes on the body as well as the skull with excellent results for nine years. Two books by Dr. Ralph Martin^{2,3} have appeared recently on the subject, and give an excellent background, mainly practical, on the technique. They are highly recommended to enhance your understanding of this method, and valuable to see the interesting results one highly competent physician has gotten with a wide variety of visceral disorders, utilizing a technique which

is acutually just one part of our usual AK armamentorium.

The technique itself is extremely simple, and can be learned in a few minutes. Therapy localize the body reflexes and check a muscle in the usual fashion. Frequently it will weaken, in which case you would proceed to treatment. More frequently it will not. In this case, while the patient continues to therapy localize the reflex, have him with his other hand grasp either upper trapezius muscle (this author always used the patient's right upper trapezius, out of habit) and pull it firmly anterior.

This activates a so-called "stretch reflex", which greatly enhances the effect of contacting the reflex point on the body surface. In this author's experience, activating this trapezius stretch reflex while simultaneously contacting an active reflex point will almost always cause a positive therapy localization, causing a strong indicator leg muscle to weaken. The doctor can also complete the contact by himself stretching the upper trapezius muscle anteriorly, while the patient contacts the reflex area and an arm muscle is tested.

If therapy localization occurs, then the doctor merely holds the upper trapezius in a pulling fashion anteriorly, while he also lightly tugs the body reflex superiorly with his other hand. This is the whole treatment, and is continued from 30 seconds to a minute or more.

Generally, the doctor feels a strong, synchronous pulsation from both the trapezius and the reflex point. Frequently, he will hear or feel a pronounced gurgling sensation under his fingers, indicating that whatever congestion was present is being relieved. This most often occurs in the segments of the intestinal tract, but may also occur in other areas. Bennett's clinical results indicated that many bodily malfunctions, including colds, flu, allergies, sinusitis, tonsilitis, back problems, neck problems, headaches, etc., as well as digestive problems, have their origin in the so-called second unit of digestion, i.e. the pyloric valve, 1st, 2nd, and 3rd segment of the

duodenum, head of the pancreas, liver and gall bladder.

Martin goes so far as to suggest that the vast majority of back problems are not structural/mechanical at all, but originate in disturbed viscus-reflex patterns.

The present author's experience with this technique has been most gratifying, whether you use this suggested method of therapy localization or not (Dr. Martin and previous practitioners merely checked for tenderness or "congestion" of the reflex point). Digestive problems and fullness especially clear up dramatically, whether acute or chronic. This technique is especially useful for self-treatment of digestive problems. Several probable appendicidases have been very carefully observed and alleviated utilizing Bennett's method (obviously, don't take the responsibility for this if you're not willing to maintain frequent contact with the patient).

This author uses Bennett's technique routinely, along with cranial osteopathy, on all infants and small children, for all of their usual symptomatology, and finds consistent results, confirming Bennett's opinion that perhaps most of the functional disorders of early life do occur in the stomach and small intestine. Allergies, sinus and respiratory problems are always treated primarily through the intestinal tract, and not locally. The most commonly involved areas of treatment on children are the previously mentioned 2nd unit of digestion, the ileocecal valve (naturally), the femoral lymphatics, and the kidney areas.

On adults, the present author has frequently obtained excellent results in difficult shoulder and back problems, even after all the usual AK procedures had been performed without complete success. This would seem to indicate a major visceral component to these problems which had not been adequately dealt with before. Menstrual difficulties, bladder problems, and various types of lymphatic congestion (e.g. breast tenderness) respond well, as occasionally does a resistant sciatica which is cleared by treating the ovarian reflex (as is breast tenderness).

Dr. Martin presents a technique for treating sore throats by lightly contacting the throat area and tugging the tissues, and also lightly pulling the SCM on the opposite side forward. The contacts are held for one or two minutes and then the opposite sides are treated. A technique for treating thoracic and bracial outlet syndromes is to stretch the upper trapezius forward (on the involved side) and simultaneously stretch the sacrospinalis group laterally at the T2 level. Both of the above techniques are extremely effective. Bennett had a so-called "stroke" point, which is a skull reflex not generally used in applied kinesiology. It is an area of about an inch or more starting immediately above the top of the ear, bilaterally, and moving superiorly. It is treated by holding the NV contacts until strong pulsations are felt, and then treating more superiorly, until the whole area is covered. This has a most calming effect on the patient and seems to be occasionally effective for neurological and cerebral problems of many kinds,

In summary, this technique has proven to be a most valuable adjunct to all of the usual AK procedures. Children are very easily treated without the need for muscle testing. A new method of therapy localization is presented which consists of merely having the patient contact the reflex with one hand while simultaneously pulling an upper trapezius muscle firmly forward with the other hand, and testing a leg muscle. Clinical results are outstanding, and the books authored by Dr. Martin and Dr. Bennett are highly recommended

If you would like a chart of Bennett's body reflexes, please send a stamped, self addressed envelope to the present author, and he would be happy to mail you one.

BIBLIOGRAPHY

1. Bennett, Terrence J. "A New Clinical Approach to the Correction of Abnormal Function", 1960 (available Los Angeles College of Chiropractic Bookstore).
2. Martin, Ralph. "Practice of Correction of Abnormal Function-Bennett Lecture, 1977".
3. Martin, Ralph. "Practice of Correction of Abnormal Function-Neurovascular Dynamics" (both books available from Dr. Martin, 190 E. Alegria Ave., Sierra Madre, Ca. 91024).
4. Goodheart, George. "Workshop Manual, 1967.

Further Enhancement in Diagnosis and Treatment of Myofascial Adhesion: The stretched isometrically resisted position (SIRP)

James A. Kerner D.C.B.S.

ABSTRACT

The diagnostic evaluation of myofascial adhesions and its subsequent treatment has been a standard procedure in AK since Goodheart's introduction in 1978 and further development in 1979. Many hidden myofascial problems can be found through an enhancement in tractioning the fascia. A more thorough and effective method of treatment is also described.

I. Introduction:

Many of us have seen the tremendous results of facial flushing myofascial adhesions both on the structural level and the chemical level. Many times has this author seen patients with recurrent subluxations who after facial flushing a supporting muscle found complete remission of the recurring problem. A good example is a recurring Cat. II with an underlying facial stretch problem of an involved hamstring, adductor, or Gluteus Medius/Minimus. However, there has been times in which a facial problem was suspected and not found. One day when I was teaching a P.N.F. stretching technique (see previous paper) to a patient with very tight hamstrings, I decided to test the strength of the muscle immediately after the P.N.F. stretching. Dramatic weakness was found after testing the muscle in the normal length position. I checked this patient with the usual passive muscle stretch and found no weakness. Yet when I stretched the muscle against my resistance a very dramatic weakness was found. I performed a standard facial flush technique on the hamstring which I rechecked by contracting the hamstring in the stretched position. Again it tested weak. Finally, I put the hamstring in a stretched position and had the patient resist in this position. I then proceeded to facial flush the hamstring in the stretched isometrically resisted position.

The amount of "clicking" and "clunking" of the facia was considerable. The characteristic pain of facial flushing was also considerable even though the amount of pressure was less than generally used in this type of problem. I then rechallenged the facia with a stretch in the elongated isometric position and voila, the muscle tested extremely strong. Also, the total length of the hamstring seemed to be increased. Since that day I have used this technique on many patients and found it to be effective in finding and treating many hidden myofascial adhesions.

II Examination:

History: Patients with a history of muscle strains should be evaluated. It seems that during the healing process adhesions develop due to lack of motion. Also suspect, SIRP problems with patients who have had some type of immobilizing sprain or fracture at some time. Many times patients will forget about these sprain/strains especially if they occurred long ago. Patients who complain of extreme tightness in their muscles are also suspect especially if they can never seem to "stretch it out". This fault is also commonly found with recurrent subluxations.

Diagnosis:

1. Test suspect muscle- Tests strong
2. Facial stretch muscle- Tests strong
3. Facial stretch muscle while patient isometrically resists (SIRP)
Tests weak (usually dramatic)

III Treatment:

1. Put the muscle in the elongated isometric stretch position and "iron out" muscle by contacting either origin or insertion and keep steady contact on muscle until the end of the muscle has been reached. Repeat once or twice and reverse direction.

2. Rechallenge in the SIRP manner --Muscle tests strong

Nutrition: Not much investigation has been done at this time but Chlorophyll Complex and low dose B12 abolish initial weakness.

IV Conclusion:

By further enhancement of the traction upon myofascial adhesions, many hidden facial problems are diagnosed. Treatment of myofascial adhesions in SIRP facilitates the correction.

Bibliography:

1. 1978 AK Workshop Manual - Goodheart
2. 1979 AK Workshop Manual - Goodheart

Proprioceptive Neuromuscular Facilitation (PNF) Exercise and Stretching

James A. Kerner D.C. B.S.

ABSTRACT

Increases in flexibility can be facilitated through isometrically contracting a muscle during maximal stretch.

Introduction:

Extreme flexibility is necessary in particular sports. The most noted are Karate, Gymnastics, Yoga, and Dance. Why can certain people reach extremes in muscle flexibility where others can not? The factors to consider include genetics, age, state of mind, myofascial adhesions, inherent muscle length and pathology. We know spindles are responsible for setting the tone of the muscle. Could it be possible to reset the level of tension through the muscle spindle? Of course we do this in our offices all the time. But how about doing it on a patient or athlete that wants to increase general flexibility? I have been involved in researching this concept both scientifically and creatively for some time now by observing and partaking in the before mentioned activities. I discovered the following technique by surprise when I was stretching one day. I quickly reached a high degree of flexibility in the areas I worked in. Several years later I attended a workshop with Bill "super foot" Wallace, the undefeated but now retired PKA Full Contact Middle Weight Karate Champion. During the seminar Mr. Wallace demonstrated the same stretching technique. Anybody who has ever seen Bill in action will quickly agree that he is quite flexible. Incidentally he is a professor of Kinesiology in Memphis, Tennessee.

Recently I purchased a book entitled Powerlifting, a scientific approach by Fredrick Hatfield PHD. On page 81 through page 91, Dr. Hatfield presents through pictures and text a stretching entitled P.N.F. exercises for Flexibility Training.

-2-

These 10 pages are worth the price of the book, although I do recommend highly the entire book. Here again, Dr. Hatfield demonstrates the same stretching technique that I have been practicing.

The actual technique is very simple.

1. Stretch the muscle as far as it will go.
2. Contract the muscle in this position isometrically for 6 seconds.
3. Relax the muscle and let it stretch further.

Better control is usually achieved with a partner helping therefore greatly enhancing the degree of stretch.

The possibilities are only limited to your own creativity in figuring positions of stretching. At the meeting I will show some variations to the ones shown here.

Observations:

What appears to be occurring with this mechanism is a resetting of the muscle spindle. Perhaps the gamma motor neurons from the spindle are fired during the isometric contraction and override the outgoing afferent signals from the spindle. The outgoing afferent signals from the spindle would be transmitting information that would generally make the muscle resist stretching. Only 1000 rats and a big fat grant will ever tell.

Bibliography:

1. Personal Communications with Bill Wallace
2. Power Lifting - A Scientific Approach.
- Contempary Books Inc.
180 North Michagan Ave. Chicago Ill. 60601

THE ACCELERATOR - DEFENDER CONCEPT

Gary N. Klepper, D. C.

Abstract:

Spinal Column Stressology, as taught by Lowell Ward, D.C., is a system that involves analyzing the cranio-spinal-pelvic mechanism for specific areas of dural tension and irritation, and classifying those areas of meningeal involvement into those which are creating an increase in postural-gravitational stress (stress accelerators), and those which are protectively overstabilizing (stress defenders or overdefenders). The accelerator vs. defender concept is extremely important to understand and incorporate into any technique being utilized for mechanical corrections of the human frame. This concept is briefly reviewed here in the context of its application to standard AK correction procedures.

Viewing tension in the cranial and spinal dura as a major cause of mechanical dysfunction in the cranium, spine and pelvis is not a new idea. Decades ago, DeJarnette described a system of correcting mechanical disorders based on an understanding of the biomechanical significance of the meningeal structures.¹ This system, known as SOT, is at the heart of the significant mechanical corrections used by practitioners of AK. The work of George Goodheart, D.C., has added a significant aspect of objectivity to the approach of releasing meningeal tension and torque, stabilizing the sacroiliac articulations, and normalizing the cranio-sacral respiratory movements.

Dural Function

The dura mater functions somewhat like a postural support return spring: Proper tension is maintained in the dura by the adaptive movement of the coccyx which, by virtue of its dural attachment, is able to function as a lever to take up and release longitudinal tension in the dural mechanism.² Adequate dural tension will allow the spinal-pelvic unit to demonstrate a tremendous range of motion into flexion, extension, lateral flexion and rotation, and then to effortlessly return to a neutral postural position in which the body is held up against gravity with a minimum of muscular effort. Too much meningeal tension will create longitudinal compressive changes in the spine, disrupt the cranio-sacral respiratory mechanism, and cause a postural pattern which is less efficient in its ability to support the frame against gravity with a minimum of effort. This leads to degenerative changes in the spine, alterations in CSF flow, and increased energy utilization.

An example of the compressive effect of abnormal meningeal tension is demonstrated by the fact that a patient will often show an increase in height if measured before and after a coccygeal adjustment.³ This effect occurs when local damage to the coccygeal-sacral articulation has compromised its ability to compensate for alterations in meningeal tension, and thus the inability to feed slack into the dura by means of altering coccygeal position has resulted in a functional

longitudinal dural compressive tension.

Dramatic results with the release of meningeal tension were demonstrated by Alf Breig, M.D., who, in a technique known as functional neurosurgery, would remove wedges from vertebral bodies at strategic points in order to shorten the spinal column and thus release tension in the dura mater.⁴ Dramatic results have also been produced by more conservative means in our profession by appropriate manipulative therapy.

Accelerators vs Defenders:

A new concept being introduced to our profession by Dr. Ward is that local areas of meningeal irritation and tension can act to either aggravate a postural distortion pattern in such a way as to reduce the efficiency of the weight-bearing function of the cranium-spine-pelvis and meninges when viewed as a single functional unit, or to defensively stabilize against such distortion. A lesion which aggravates the distortion pattern is termed a stress accelerator. A lesion which defensively overstabilizes is termed a stress overdefender. An area of the spine which acts as an appropriate stabilizer without creating lesions is a normal defender. Dr. Ward professes that a stress overdefender will release spontaneously if the stress accelerating lesions are corrected; but, that if an overdefender is adjusted without correcting the accelerators, this will aggravate the meningeal tension syndrome.⁵

Categorizing Dural Tension

In viewing the normal dural mechanism from the accelerator-defender viewpoint, it can be seen that the posterior aspect of the spinal dura would act as a stress defender, similar to the way in which the extensor muscles function to hold the body up against gravity. Conversely, the anterior spinal dura would function as the accelerator meninges, just as facilitation of the flexor muscles would cause the body to collapse against gravity.

When subjected to stresses, be they mechanical, chemical, or psychological, there is the tendency to selectively stress-load or contract one side of the body versus the other side. This becomes the stress-dominant side or primary curve side of the spinal-pelvic distortion. Any increase in meningeal tension on this side of the body tends to increase the postural distortion. Thus, any lesion creating an increase in tension or irritation in the anterior dura or the dura on the stress-dominant side becomes a stress accelerator. Any lesion creating tension in the posterior dura or that on the side opposite the stress-dominant side is called a stress defender, and if it overstabilizes it is called an overdefender.

The side of stress dominance can be determined by comparing radiographs taken in the standing and sitting positions, or by a functional test that consists of stressing the meninges

and observing any change in leg length. If the head is tipped back and the spine stretched into extension while the doctor contacts and stabilizes the coccyx, this maneuver stresses the anterior (accelerator) dura. Immediately on returning to neutral position from this maneuver, a check is made of occipital tilt and/or leg length. The side which then shows contraction, as evidenced by posterior tilt of the occiput and shortening of the leg length, is called the side of primary curve or stress dominance. Conversely, when the head and spine are stretched into flexion while stabilizing the coccyx, on returning to neutral position one should see contraction on the side opposite of the stress dominant side as a reaction to the defensive dura being stretched.

Local Meningeal Challenge

Once side of stress dominance is determined, one may then test any lesion of the spine or pelvis by challenging it with a gentle, gradual A-P pressure and release, then checking which side of the body contracts. A contraction response on the side of stress dominance indicates that the lesion challenged is a stress accelerator. A contraction response on the opposite side indicates that the lesion challenged is an overdefender.⁶ It should be noted here that this form of challenge is not based on a rebound phenomenon, but simply notes the reflex response to minor meningeal irritation delivered to a specific level.

On investigating expected discrepancies between information

gathered by the Ward meningeal challenge method and standard rebound challenge used in AK, some interesting correlations were noted. Any lesion of the spine or pelvis that creates neurological irritation or proprioceptive disruption will show a positive challenge by classic AK methods, regardless of whether the lesion has characteristics of being an accelerator, an overdefender, or is neutral. A lesion determined to be an overdefender by the Ward meningeal challenge may or may not therapy localize.

Omnidirectional Challenge

The most interesting finding is that a lesion which would be determined by the Ward method to be a primary accelerator (causing a very obvious contraction on the side of stress dominance) will tend to TL and to yield a positive AK challenge, regardless of the vector of challenge used. In classical AK, this omnidirectional challenge phenomenon is attributed to being either a ligament stretch adrenal case, or a significant inflammatory lesion at the level of challenge which is causing any input at that level to be interpreted by the body as a traumatic insult. The adrenal involvement can be differentially diagnosed by checking the challenge against TL to the adrenal neurolymphatic reflex. It is certainly conceivable that the omnidirectional challenge could be a finding when localized meningeal irritation is present.

Vector of Correction

Addressing the issue of in what direction to adjust a segment which challenges in all directions, Ward suggests that an adjustment delivered to a spinal segment above the sacrum should always be delivered in an A to P direction in order to reduce stress from the accelerator meninges. Since the sacral meninges acts as a postural counterbalance to the spine above it, and will tend to be stressed in an A-P direction in response to an irritation in the anterior meninges, Ward suggests that lesions at the sacral level be adjusted in a P-A direction. Utilizing the model described above, it can be clearly seen that a P-A adjustment delivered in an attempt to correct a spinal lesion above the sacrum, especially in the upper dorsal spine, could iatrogenically aggravate a meningeal tension syndrome.⁷

What all this amounts to is the fact that we are dealing with at least two models of what is being done when we deliver an adjustment. One model deals with the identification and correction of spine-meningeal tension and irritation. The other model deals with the alleviation of local areas of neurological irritation. When subjected to random trauma, damage to the ligamentous and muscular structures can cause neurological irritation due to inflammation and altered proprioception. These areas are classically referred to as subluxations. Lesions of this nature, often of high velocity traumatic etiology, may need to be corrected by manipulation using a vector of correction which reduces the displacement that has been allowed due to the local ligamentous damage, and to break up any existing local fibrosis which is

maintaining the motor unit in a position which pathologically maintains abnormal proprioceptive input, even if the vector is one which would tend to aggravate an existing spine-meningeal tension at that level. However, if proper attention is placed on muscular balance and postural improvement, it is often not necessary to make a correction on this type of lesion more than once. It is also necessary that we utilize a method of demonstrating the need for this type of correction so that we know what the effects of delivering the adjustment will be in that patient before the adjustment is given.

In our teaching of AK we have often used the phrase, "Fix what you find". In my opinion, this is no longer acceptable advice to be giving those trying to learn AK. A thorough AK exam will reveal a multitude of data, but if the doctor does not have an adequate concept of what the findings demonstrate in terms of what corrections would actually create lasting improvement, then the treatment tends to be largely as ineffectual as general manipulation. A better concept to emphasize is, "Diagnose the need, supply the need, and evaluate the result". In other words, the doctor needs to establish clear parameters of what is to be accomplished by an adjustment in order to demonstrate that the desired effect has or has not been achieved.

In our teaching of AK, the student is inundated with a multitude of techniques which he tends to have difficulty keeping in perspective. Emphasis on the basic concepts of releasing meningeal tension, establishing proper cranio-sacral movement,

balancing postural stress, and normalizing sacroiliac function would clue the students as to what techniques would be of most value in managing a clinical presentation.

Special thanks to Dr. Lowell E. Ward for his editorial review.

References

- 1- Sacro-Occipital Technique 1977,
Major Bertrand DeJarnette, D.C.
Nebraska City, Nebraska
- 2- Private conversations with George Goodheart, D.C.
- 3- Private conversations with George Goodheart, D.C.
- 4- Adverse Mechanical Tensions in the Central Nervous System,
Alf Breig, M.D., 1977
Almqvist and Wiksell International,
Stockholm, Sweden
- 5- Spinal Column Stressology Procedural Manual,
James Scott Minick, D.C., 1983
SSS Press
3535 E. Seventh Street
Long Beach, California 90804
- 6- Information reviewed in the section of this paper subtitled Categorizing Dural Tension and up to this footnote is from material presented in the basic and advanced seminars in Stressology.
Spinal Stress Seminars
3535 E. Seventh Street
Long Beach , California 90804
- 7- The Dynamics of Spinal Stress,
Lowell Ward, D.C., 1980
SSS Press

THE PELVIC CATEGORIES AS RELATED TO
SELYE'S GENERAL ADAPTIVE SYNDROME

by Gary N. Klepper , D.C.

Abstract:

The Selye GAS is a useful model to incorporate into teaching and understanding the pelvic category system of DeJarnette.

DeJarnette's system of pelvic categories is one of the basic systems incorporated into the AK system of diagnosis and correction of mechanical problems. Too many doctors attempting to use AK do not adequately understand the functional significance of these categories. Comparing them with the stress progression process described by Hans Selye as the General Adaptive Syndrome can help us understand the process by which we, as chiropractors, can assist the patient in improving mechanical function, rather than just do patchwork mechanical corrections.

The GAS:

The General Adaptive Syndrome (GAS) of Selye was intended to describe the changes that occur in the body when subjected to stress. The first stage, called the Alarm Reaction Stage,

PELVIC CATEGORIES (page 2)

consists of adrenal defenses being used to the point of temporary exhaustion in order to meet a crisis state. This is similar to a wild deer, who when confronted with a predator, can show great speed and endurance in running away, only to settle down in a safe spot, totally relax and go back to calmly feeding itself.

The second stage of the GAS is called the Resistance Stage, in which the adrenal cortex hypertrophies in order to increase its reserve capacity in response to chronically repeated stresses. Here the body has not been able to let down and rebuild adrenal function faster than the stresses have utilized available adrenal function.

The third stage is known as the Exhaustion Stage. Here, adrenal function is reduced increasingly with time until irreversible exhaustion is reached.¹

The Categories:

Normal physiological Category I is a defense reaction in which, subjected to an environmental stress, the pelvis torques and locks, and the entire body assumes a defensive pose as if stepping back with one foot and preparing to fight.² This reduces sacral respiratory motion and induces dural

PELVIC CATEGORIES (page 3)

torque, often resulting in a lateral rotation cranial fault such as a temporal bulge. The stress could be mechanical, emotional, chemical, or whatever, but the key point here is that once the stress has passed, the defensive locking reaction spontaneously releases and the torque pressure relaxes. This physiological Category I can be compared to the alarm stage of Selye's GAS.

If the body fails to spontaneously release the physiological Category I when the stress has passed, or if the stress is prolonged, repeated or continuous, the body could adapt a permanent Category I defense and be unable to release it. This is the pathological Category I, and can be compared to the resistance stage of Selye's GAS.

Once the pelvic torque defense reaction has been chronically maintained, and stresses continued, the weight bearing function of the sacroiliac joints can deteriorate and result in an osseous slip and hypermobility in the sacroiliac joint unilaterally or bilaterally. This is the Category II, which can be compared to the initial exhaustion phase of Selye's GAS.

Eventually, all pelvic defense is exhausted and the lumbar discs begin to rapidly deteriorate. This is the Category III, which is a continuation of Selye's exhaustion stage.

PELVIC CATEGORIES (page 4)

Viewing this model, it can be seen that managing and re-building the sacroiliac function can help reverse the progression of stress-deterioration and allow a patient to be capable of handling all types of stresses more efficiently.

SELYE GAS	Alarm	Resistance	Exhaustion	
PELVIC CATEGORIES	physiological Category I	pathological Category I	Category II	Category III

REFERENCES

- 1- The Stress of Life,
Hans Selye, 1956
McGraw
- 2- David Denton, D.C.
Denver Sotak Seminar, Nov., 1983

PRODUCT EVALUATION

TROTTER TREADMILL

David W. Leaf

A Trotter treadmill, with the following characteristics, was recently installed in my office.

1. Variable speeds from 2 miles per hour to 9 miles per hour.
2. Incline variations from 0 degrees to 33 degrees.

USES

The treadmill has proven to be extremely usefull in observing a patient's gait pattern. With the patient in a set position, it is very easy to observe the lack of motion in the varying areas of the spine. Failure of proper motion of the pelvis and shoulders is obvious and if a large mirror is installed in front of the patient, he/she is also able to observe the abnormal patterns. The sound of the foot strike on the wooden board that the tread moves over is also very informative. Patients find it easy to tell the difference in the foot strike by listening to the difference in the sound created by each foot.

Recently, in dealing with athletes, it became evident that I was missing weaknesses that could not be found with normal muscle testing procedures. In the past, I had tested runners after varying distances that they had run. For example, if I was working with a marathon runner, I would test the runner before a workout, after 5, 8, 12 and 16 miles. Many times, I would find weaknesses showing up only after a specific amount of work had been performed.

Using the treadmill, I now have patients that are having chronic musculoskeletal pain walk for a distance before I test them. This will uncover many muscular weaknesses that have been missed in the past. For example, I have found quite a few recreational runners who fail to adequately bring the femur into flexion during their stride. All previously used muscle and gait tests were normal. However after three to four minutes of fast walking or light jogging, the rectus femorus tested extremely weak. This type of testing has uncovered specific weaknesses of the varying portions of the quadriceps, hamstings and of the foot muscles.

Another use of the treadmill is in educating the patient as to the cause of their problems. Patients with chronic fixations of the spine will generally exhibit abnormal walking patterns. If you stand, stradling the moving belt, behind the patient on the treadmill, and move the patients shoulders in coordination with the leg motion, taking in account the proper stride length, muscle tenderness will be alleviated and if proper correction of the fixations and the inhibition pattern in the upper trapezius-sternocleidomastoid-neck extensors had been accomplished on the last patient visit, the patient will test normal for all fixations after walking for fifty or more strides.

An example of this use is a patient who recently came to me who had been treated by three chiropractors and two dentists for chronic upper cervical, parietal and temporomandibular pain. After the third visit, he stated that he would feel fine after leaving the office for a day or so and then the pain would return and he wondered if he should go to another doctor. After clearing all cranial, gait, TMJ and spinal problems and locating a parathyroid imbalance, the patient was placed on the treadmill. He was fine for three tenths of a mile. At that point, he started to experience suboccipital pain which then radiated to the right rhomboid and then into the right TMJ. Just before the pain pattern began, he stopped bringing the right shoulder forward with the left leg. I then forced the action of the shoulder and the pain pattern stopped. Testing revealed a weak pectoralis sternal and a reactive pattern with the shoulder extensors that could only be found after walking that distance. These types of patterns appear to be learned patterns that have to be unlearned. One other point would be made here. We refer to opposite arm and leg motion, when in fact it should be opposite pelvic and shoulder rotation. We have all seen patients who flex and extend the arm without any shoulder motion. These patients will demonstrate extreme tenderness in the paravertebral muscles that can be alleviated by proper shoulder motion. Use of the treadmill makes this easy to spot, easy for the patient to see and aids in the reeducation of the patient.

Another use of the treadmill is in the evaluation of a proper walking routine for the patient. In this work a pulse meter is used and the variable speed of the treadmill is used to determine the correct speed for the patient to walk for proper aerobic exercise. The patient is placed on the treadmill and begins to walk for two minutes and the pulse rate is taken by the electronic pulse meter. The speed is then increased until the patient reaches the proper heart rate for their age. The speed is then read and calculated into minutes per mile. The subscapularis muscle is tested for weakness and the pectoralis muscle tested for tenderness. If the subscapularis is found weak and the pectoralis is tender, the patient is asked to chew a Myocardiodyn tablet, NutriDyn, and is then retested. This product supports the heart. If tenderness is found but no weakness of the subscapularis, the exercise is continued for up to twelve minutes and the subscapularis retested at two minute intervals. If no weakness is found test for parathyroid - calcium imbalances or gait imbalances. This procedure has proven useful for showing the patients the correct speeds to walk for exercise, levels of improvement as they can walk faster at the same heart rate and if vital capacity has been measured an increase in this value as the patient gains aerobic competency.

C. P. T. CODES

The following codes may apply to use of the treadmill:

97100	NEUROMUSCULAR REEDUCATION
97100	GAIT TRAINING
97100	THERAPEUTIC EXERCISES

SUBLUXATION OF THE HEAD OF THE RADIUS

by

James R. Lent, D. C.

ABSTRACT: Differentiation of subluxation of the head of the radius from carpal tunnel syndrome, in grip weakness, while the hand is pronated.

When testing a patient's grip strength with a dynamometer you may have found a difference in the grip strength, while the hand was in a pronated position, as compared to a supinated position. The patient may also have expressed a noticable occupational problem, or complained of a sharp pain in the wrist, when the hand was in a pronated position, while at work. However, testing this patient for a carpal tunnel syndrome would have proven negative.

Many years ago, before Applied Kinesiology came into being, the test for a subluxation of the head of the radius consisted of having the patient extend his arm, with the hand pronated, and attempt to pick up a heavy glass ashtray about five inches in diameter. This was using the opponens muscles. It was positive if the patient was either unable to pick up the ashtray, or hold it more than just a moment, and then being forced to drop it, while only a couple of inches from the table.

The carpal tunnel syndrome can be isolated with the hand in the supinated position, using the opponens pollicis and the opponens digiti minimi, as well as by therapy localization.

Using the same resistance test, of the same opponens muscles, with the hand pronated, will be indicitive of a subluxation of the proximal head of the radius. It too may be therapy localized at the proximal head of the radius.

2.

The proximal head of the radius articulates with the lateral side of the ulna, in a somewhat cylindrical articulation. Its motion is rotational when the hand is moved from supination to pronation, because the radius crosses over the ulna.

The direction of subluxation, in my experience, has always been to the posterior. The correction is performed in the following manner: Medially rotate the hand until the palm faces laterally with the arm at the side of the body. In the case of the patient's right arm, the doctor places the thumb of his left hand on the head of the radius, while maintaining the rotation with his right hand. He then gives a short thrust with his left hand, primarily with his left thumb, hyperextending the arm and moving the head of the radius to a more anterior position on the ulna.

Retesting of the opponens muscles in pronation, and therapy localization of the head of the radius, will then be negative. The patient will now be able to raise the ashtray with the hand pronated.

THE MANDIBULAR RESPIRATORY ASSIST

BY: BARBARA MCQUEENEY DC

ABSTRACT: A Bilaterally weak sartorius in the chronic hypoadrenic may indicate a need for a respiratory adjustment of the mandible.

This is a technique I've found of particular benefit to patients suffering from long term hypoadrenia. At the winter meeting of 1983, Dr. Goodheart demonstrated a technique evolved from his strain/counterstrain technique that would, so to speak, reconnect a loose adrenal circuit. I feel that the mandibular respiratory assist, if indicated, is a very good follow-up for this technique. It should be emphasized that it should be done after the adrenal strain/counterstrain since it frequently clears the mid-sternal pain used as an used as an indicator for that technique.

The concept of the mandible as the "pump handle" for the cranium has been well established, as has the interrelationship of the adrenal with temporomandibular joint problems. This technique therefore represents a practical means of resetting the timing mechanism of the cranium, and thereby balancing not only cerebral-spinal fluid flow, but normalizing adrenal function as well.

The most frequent finding suggesting the use of this technique is the recurrence of a bilaterally weak sartorius. To meet the indications for performing a mandibular respiratory assist, two further requirements must be met:

1. Therapy localization to the TMJ strengthens the sartorius
2. The weak sartorius strengthens with respiratory assistance

When dealing with patients with subclinical problems or patients in the resistance phase of Selye's General Adaptation Syndrome who do not have a weak sartorius, a different picture is presented. In this situation the strong sartorius will weaken with therapy localization to the TMJ while other non-adrenal related muscles will not. This is a similar situation to the sacroiliac joint in the patient with emotional backache. Again, as in the first situation, the phase of respiration that strengthens the now weak sartorius must be determined.

Correction of this fault is quite simple and easy to perform. It involves gently moving the mandible in the direction it would normally move on the phase of respiration that strengthened the weak sartorius. By far, in the majority of cases, in these situations inspiration will strengthen both weak sartorius. Therefore place your thumbs along the top of the lower teeth on both sides of the mandible so that you have a good firm grip of the bone. The patient should very lightly close the mouth, (obviously not enough to bite your thumbs) and totally relax the jaw. This is important since the more the patient is contracting muscles either opening or closing their mouth, the less successful will be the correction. Using 5-8 pounds of pressure smoothly rock the mandible inferior and slightly forward opening up the TMJ. Do this during slow deep respirations approximately half a dozen times. Then recheck the previously weak sartorius and any pain indicators that were used. If a posterior ilium exists in relation to the weak sartorius, the indications for that frequently disappear as well.

I feel that this technique is best used to fine tune an already normally functioning cranio-sacral mechanism. It is

another means of establishing the respiratory timing that we know to be so critical in this system. Therefore it is very important to correct any cranial or pelvic faults first. Since we are dealing with timing, special attention should be paid to the cranial muscles. Obviously the TMJ should also be balanced first, including caring for any interosseous subluxations, TMJ ligament interlink problems, hyoid imbalances and particularly strain/counterstrain of the internal pterygoid muscle. Only then can the mandibular respiratory assist be utilized to full advantage for our patients.

References:

- Goodheart, George J., DC Lecture ICAK meeting San Diego, Ca 1983
- Selye, Hans, MD "The Stress of Life", McGraw-Hill Book Co. 1956
- Walther, David S., DC Applied Kinesiology, Vol. 2, Head, Neck
and Jaw Pain and Dysfunction- The Stomatognathic
System. Systems DC, Colorado, 1983.

CONCEPTS OF HEALTH AND FITNESSIN RELATION TO EXERCISE

DR. PHILIP B. MAFFETONE

ABSTRACT

This paper will deal with defining the relationships of health and fitness to exercise. It has been accepted that exercise will promote a healthy state. This is not necessarily true, especially when one considers the many individuals who embark on an exercise program only to end in a heart attack or other ill health. Exercise will often make one "fit". A definition of "health" and of "fitness" will be proposed. A means of testing, (using accepted Applied Kinesiology standards) for this "imbalance" of "health" and "fitness" will also be discussed. This paper is meant as a continuation of a previous paper (16).

INTRODUCTION

The industrial society in the United States and in other countries has evolved so rapidly in the last two or three generations that we have not been able to properly genetically adapt to the change in levels of activity. Many people are aware that this lack of activity often results in a regression of normal body function, whether on a structural, biochemical or mental level.

As a result, many people turn to "forced activity" or exercise as a possible remedy. This is especially true when the cosmetic characteristics of the individual are affected. All this creates a "market" which brews erroneous information about what people should and should not do regarding exercise. As a result, many people with sincere intentions become less healthy. One of the problems seems to be the misunderstanding of the

terms "health" and "fitness". Many people attempt to be "fit" before they are "healthy", as this should be the reverse. A definition of "health" and one of "fitness" is in order.

HEALTH AND FITNESS

Many individuals consider themselves "healthy" because they subjectively feel good and have no major complaints of ill health in the form of symptoms. In the study and practice of Applied Kinesiology, however, we are able to observe imbalances in the body in structural, chemical, and mental ways that can adversely affect various levels of an individual's health. We should, therefore, discount the absolute state of health, for everyone has some type of imbalance, and say that we can only approach this state of ideal health to a certain degree. Optimal health then is a state, where all systems of the body are functioning at a peak balanced level. While in relatively good health, however, an individual is not necessarily able to achieve the abilities of a competitive athlete. For this characteristic, an added state of the physical and mental body, the word "fitness" is applied. The ability of the person to logically utilize their state of health in such a way as to produce the ability to achieve athletic endeavors, will also in return, further build their total health. This may mean jogging two miles a day, or training for a 26 mile marathon. There must be a return for your investment: the time you put into fitness endeavors should be returned as health. Because one has good athletic ability in no way implies they are healthy, and obviously those who are healthy are not necessarily the best athletes. A proper balance between the two is needed, as each will feed the other.

Health and fitness then have two separate definitions: "health" being a state of physical and mental well-being where body function is at an optimal level; and "fitness" as the ability to perform athletic endeavors, (for some this means competition).

It is sad to see the many unnecessary injuries that accompany exercise habits. It is even worse to see the accepting attitudes of these injuries as being "normal". It is not unusual to see a seemingly healthy person, athlete or not, die in the course of exercise. But perhaps these and others are, or were, in a state where they were trying to build fitness without being healthy. There are many good references citing deaths of seemingly healthy individuals, many while running. (1-15, 18) A recent paper by the author (16) relates exercise and efficiency showing how fitness, in the form of exercise, can promote health. An obvious problem with exercise and injury or death is the imbalance of aerobic and anaerobic activity by the body.

Studies, such as the one cited by Sheehan (17) clearly show that improper exercise can decrease health. He related a study done at Methodist Hospital in Houston which tested 41 male marathon runners who had run at least two years duration. After five years of follow up, 18 had developed a "posture stress test", indicating some type of cardiovascular problem had developed. Pritikin (18) feels that the key to the problem is to decrease dietary fat intake. In my practice it has been observed that in decreasing the general fat intake, many patients actually end up with improved ratios of the different essential fatty acids (EFA), presumably because they eliminate the more destructive fats: those that are rancid and hydrogenated. Too low a fat intake can be counterproductive since fats are essential to health. (19-21)

During aerobic metabolism, EFA becomes available to the muscle cell. Albumin and globulin makes this possible. Unusable fatty acids become a major problem when there is excessive anaerobic activity, or poor protein metabolism. Utilization of EFA is also very hormone-sensitive. This is another reason why improper hormone stage function is a necessity for the next stage, that of cardio-vascular function. Without this proper progression, cardio-vascular stress is induced. Many of the references relating to running and other exercise deaths have shown a gross atherosclerosis in the seemingly healthy person. Some of these people had been exercising for many years with great consistency. They were certainly quite fit but obviously unhealthy.

BLOOD FLOW AND EXERCISE

It has been shown that during the onset of activity blood flow is shunted from organs and glands to the working muscles. (22, 23) This is due to neurological, and hormonal influence. With anaerobic activity, this blood flow to the major organs may be diminished as much as 80%. (22)

We have accepted the standards set forth by the ICAK regarding muscle-function relationships. (24, 25) Utilizing this system of diagnosis, it is then possible to demonstrate in susceptible individuals that a rapid increase in the heart rate, which creates a shunting of blood to the muscles and from certain organs and glands will create an inhibition in those related muscles.

An Applied Kinesiology approach is presented as a means of diagnosing susceptible individuals. I will use only three sets of muscles: the Pectoralis Major Sternal, Psosas Major, and the Supraspinatus, although other muscles could be added. These muscles have an organ relationship with the

liver, the kidneys, and the brain respectively. In all individuals, a cleared strong indicator should be used. The steps are listed in Table I.

TABLE I

1. Test PMS, Psoas, and Supraspinatus bilateral
2. Correct any weakness
3. Check resting pulse
4. Have the patient run in place for one minute, with moderate intensity, attempting to bring the pulse rate to a high aerobic range, avoiding an anaerobic state.
5. Re-check pulse immediately and note
6. Retest the PMS, Psoas, and Supraspinatus muscles bilaterally.
7. Note weaknesses.

Approximately 80% of the muscles in a group of patients will weaken after this procedure, due to the decrease in blood flow to the related organs. A recovery period of 1 or 2 minutes is usually needed for strength to return. Repeating the same procedure but allowing two minutes for the pulse to rise to the same level will not result in the same weakness as previously seen. This apparently is due to a slower shunting of blood and proper adaptation to the blood changes. This becomes important in relation to exercise habits relating to "warming up" and "warming down". Slow, easy activity at the beginning and at the end of an exercise activity becomes a necessity not only for proper fitness but for health reasons as well.

REFERENCES

1. Tunstall-Pedoe, D. 1979, Exercise and Sudden Death, British Journal Sports, Med., 12: 215-219
2. Bassler, T.J., Lancet, 1972, 2:711
3. Bassler, T. J., Lancet, 1980, 1:57-58
4. Handler, J. B., et al., JAMA, 1982, 248:717-19
5. Aviation, Space, and Environmental Medicine, June 1979, P. 656
6. Bloom, M. Medical World News, November 27, 1978
7. Vuori, I., et al., Cardiology, 1978, 63:287-304
8. Danilevicius, Z., JAMA, 1978, 240:1754-55
9. Opie, L. H., N. Eng. J. Med., October 30, 1975, PP. 941-42
10. Opie, L. H., Lancet, 1975, 1:263-66
11. Reich, P., et al., JAMA, 1981, 246:233-35
12. Waller, B. F., and Roberts, W. C., Am. J. Cardiol., 1980, 45:423
13. Cantwell, J. D., and Fletcher, G. F., JAMA, 1969, 210:130-31
14. Thompson, P. D., et al., JAMA, 1982, 247:2535-38
15. Newsholme, E., and Leech, T., The Runner,
16. Preliminary Observations, Collected Papers of the Members of the ICAK, 1983
17. Sheehan, G., Runner's World, 1982
18. Pritikin, Nathan, The Pritikin Promise, Simon and Schuster, 1983
19. Mountcastle, Vernon B., Medical Physiology, 13th Edition, Volume I & II) the C. V. Mosby Company, Saint Louis, 1974
20. Exercise and Lipid Metabolism, Lawrence B. Oskal, Progress in Clinical and Biological Research, 1981; 67:383-90
21. Changes in Blood Chemistry, E. B. Altekruze, M.D. & J. H. Wilmore, Ph.D. Jrl. of Occupational Medicine, 1973; 1 (2); Fed; 111
22. Falls, H. B., The Cardio Vascular System in Exercise
23. Starling and Evans, Principles of Human Physiology, Philadelphia, Lea & Febiger, 1968
24. Goodheart, George J., D.C., Applied Kinesiology, Workshop Manual, 1972
25. Walther, D. S., D.C., Applied Kinesiology, Volume I, Systems D.C., 1981

ANCILLARY EXAMINATION PROCEDURES:
TRAINING SUPPORT PERSONNEL

by Kerry M. McCord, D.C.

Abstract: Confronted with the potential of ever-changing personnel, ancillary examination procedures, unique to the practicing Applied Kinesiologist, may need to be taught again and again. In an effort to simplify the training process, an outline of some of those procedures is presented in a manner that can be easily understood by those to whom this responsibility is given. Postural blood pressure, pulse, respiration, axillary temperature, lingual ascorbic acid test, Koenigsburg, Sulkowitch and Standard urinary testing procedures are explained step by step.

POSTURAL BLOOD PRESSURE

Inform the patient that you will determine blood pressure in three positions. This helps the doctor observe the response of the body to position change as it relates to the kidney and adrenal glands, especially.

Sitting:

1. Pick up blood pressure cuff from shelf. Pick up stethoscope from shelf and place around your neck.
2. Step alongside patient. Place the cuff appropriately around the patient's biceps,¹ securing velcro fastener.
3. Place earpieces of stethoscope in your ears. Place the diaphragm of stethoscope in the inside bend of the patient's arm.² Make sure the valve of bulb is tight. Pump the cuff to appropriate level. (Until no heart beat is heard--usually 180-220 mm/Hg).
4. Slowly release pressure listening for first audible beat (make mental note of dial reading). Should be released at approximately one beat per second. This rate of deflation is important for an accurate reading. The first audible sound (faint rhythmic tapping or thumping sound) is the systolic (upper) blood pressure reading.
5. Allow the pressure to continue dropping at the same rate as before. Listen carefully. The sounds you hear will change in phases. From the first sharp tapping or thud, they will change and soften to a blowing or swishing sound. Watch the falling gauge needle. At the exact point when you can no longer hear the sounds, read the gauge. This is the diastolic (lower) blood pressure reading. (There may be an intermediate area where no sounds are heard. This is normal.)

¹preferably left arm

²over artery

6. Release all air from the cuff.
7. Record systolic and diastolic blood pressures for this position on patient chart.

Lying:

Ask patient to lie down. Repeat Steps 3 through 7.

Standing:

Inform patient that you will inflate the cuff and then ask him/her to stand up (on the same side of the table as you). Repeat Step 3. Ask patient to stand. Repeat Steps 4 through 7.

PULSE AND RESPIRATION

Ask patient to sit on table. You will sit alongside of patient. Place index finger medial to patient's radial epiphysis. When you can feel the pulse, count pulses for 30 seconds.

Continue to hold fingers medial to radial ephysis and begin to observe patient's respiration. Count respiration for 30 seconds. (Do not tell the patient what you are doing.) Record.

The ratio between pulse and respiration should be four to one. Any alteration in that ratio may indicate a problem with cranial respiratory synchronization.

AXILLARY TEMPERATURE

Place thermometer under patient's arm. Metal tip must touch skin. Wait 5 minutes for reading. Record.

Normal axillary temperature is 97.8 - 98.2. A temperature below 97.8 may indicate lowered basal metabolic activity and the possibility of thyroid dysfunction.

VITAMIN C TEST (Lingual Ascorbic Acid)

Procedure for Testing:

1. Give patient a cup of water. Instruct patient to rinse mouth and drink the water.
2. Take cap off Vitamin C test bottle and explain that the end is not a needle. It is just a tube that allows only one drop of liquid to come out at a time.
3. You may further explain that the liquid is a sodium solution (DICHLOROINDOPHENOL) that is absorbed by Vitamin C in the tissues and that we will be using this test to determine how much Vitamin C is being retained by the patient's tissues.
4. Have patient dry tongue as dry as possible with tissue. (Stroke tongue to raise papillae.) Instruct patient to keep tongue out.
5. Drop two drops of the blue solution on the tongue, one on each side and, at the same time start timing.
6. While the patient is waiting, explain that Vitamin C is necessary for healing and, if suffering from injury or illness, (backache, muscle strain, disease, etc.) the body may need more Vitamin C than usual. Encourage patient to keep tongue out so that you can watch the drops disappear.

7. At conclusion explain test results to patient:

Under 10 - excellent

10-20 - fair/good

over 20 - poor (patient needs more Vitamin C)

Anything over 60 seconds may simply be recorded as 60+.

See Appendix A.

URINALYSIS

The urinalysis consists of a standard urinalysis and two other tests. The procedures are as follows:

Place container with urine sample on a paper towel on the lab table.

Place two plastic test tubes and the eye dropper on the towel.

Place 10 drops of urine in each test tube.

Sulkowitch Test for Urinary Calcium Excretion:

Select one test tube with urine. Add 10 drops of Sulkowitch Reagent using dropper in bottle. Mix thoroughly by spinning tube. Wait 1-2 minutes. While waiting, perform other tests.

Interpretation: Measure the amount of calcium precipitate on a scale of 1 to 4 as follows:

<u>GRADE</u>	<u>PRECIPITATE (Cloudiness)</u>	<u>APP. BLOOD Ca. LEVEL</u>
1	None- clear solution	5 - 7.5 mg.%
2	Light ppt. - can read print through test tube	7.5 - 8.9 mg.%

- | | | |
|------------|---|-----------------|
| 3 (Normal) | Fine white ppt. -
translucent appearance -
enough so that print can be
seen through test tube, but
not clear enough to read | 9.0 - 11.0 mg.% |
| 4 | Heavy, milky ppt. - opaque | over 11.0 mg.% |

Record Grade on Initial Exam form.

See Appendix B.

Koenigsburg Test for Urinary Chlorides Excretion:

1. Use second test tube with 10 drops of urine.
2. Add one drop of 10% potassium chromate solution. Mix.
(The solution has a high yellowish color at this time.)
3. Add 0.74% Silver Nitrate Solution DROP BY DROP, counting the number of drops. Observe for change of color in the solution. Continue adding drops (up to 40) until the solution becomes red-orange to brick red. While adding drops, periodically mix the solution by spinning tube.
4. Record number of drops of Silver Nitrate Solution on Initial Exam form.

See Appendix C.

Reagent Strip:

While reagent strips are convenient to use, strict compliance with directions is required to achieve reliable test results.

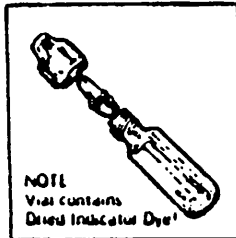
1. Completely immerse all reagent areas of the strip in FRESH urine (urine in container - not test tube).

2. Tap edge of strip against container to remove all excess urine. Hold strip in a HORIZONTAL position to prevent possible mixing of chemical from adjacent reagent area.

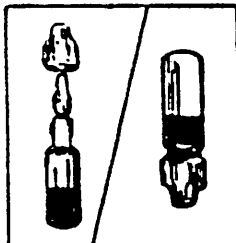
When all tests have been completed and recorded, take urine container, test tubes, and dropper into bathroom. Pour urine and solutions from test tubes into toilet. Flush toilet.

Lingual Ascorbic Acid Test™

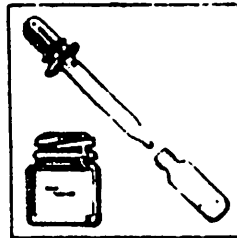
HOW TO PREPARE THE LINGUAL-C[•] DISPENSING SYSTEM



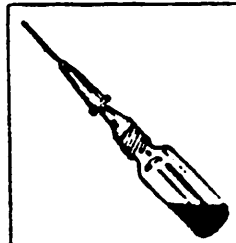
1. Remove the plastic cap from the Lingual-C[•] Dispensing Bottle, then remove the inner plug.



3. Replace inner plug and plastic cap — invert until dye is completely dissolved into solution.



2. Draw the Activator Solution to line on dropper and discharge into Dispensing Bottle.



4. Remove and discard plastic cap — Place a Dispensing tip on inner plug Stem-assembly is now ready for use

NOTE

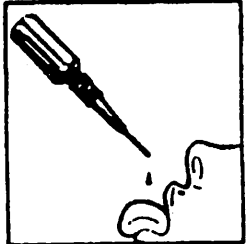
The freshly reconstituted solution should be tightly sealed to prevent evaporation, kept in the dark when not in use and should be discarded after five days.

HOW TO USE THE LINGUAL ASCORBIC ACID TEST™

PATIENT PREPARATION:

1. The patient should be seated in an area where the tongue may be directly illuminated.
2. After rinsing the mouth thoroughly with tap water, the protruded tongue should be grasped and held with a gauze pad.

TEST PROCEDURE:

1. With the subject's mouth opened wide, the dorsum of the tongue in the vicinity of the junction of the anterior and middle one-third may be observed. Dry this area with a gauze pad being careful to stroke the papillae so that they stand erect.
 2. Hold Dispensing Systems at a 45° angle over selected area—squeeze bottle to dispense ONE drop onto dorsum of tongue for each test performed.
- 
3. Begin timing (preferably by stopwatch) the reaction immediately after the drop touches the tissue and continue until the blue color has disappeared.
 4. Record the elapsed time, in seconds, required for complete decolorization of the solution and instruct the patient to rinse vigorously with tap water.

DETERMINATION:

Less than 20 seconds, normal; greater than 20 seconds, indicative of a poor tissue ascorbic acid level.

GENERAL INFORMATION

The purpose of this tissue screening procedure is to determine ascorbic acid status using the dried dorsal surface of the tongue as the sample site. This is an accurate, rapid and completely painless method of measuring vitamin C nutriture. It has been tested extensively. These investigations verify its reliability. It has been shown to correlate with plasma levels, vitamin C supplementation, citrus intake, and the vitamin C content of internal organs of human subjects. Tissue levels of ascorbic acid as measured by this test have been shown to correlate with gingival state, tooth mobility, sulcus depth, alveolar bone loss, plaque and calculus scores, as well as other health parameters.

The test utilizes an oxidation-reduction reaction between L-ascorbic acid and 2,6 dichlorophenol-indophenol. During this reaction the dye (2, 6 dichlorophenol-indophenol) is reduced by L-ascorbic acid in the lingual tissues to its colorless form. In accomplishing this reaction, L-ascorbic acid is oxidized to dehydro-L-ascorbic acid.

TECHNIQUE

The patient should be seated in an area where the tongue may be directly illuminated. After rinsing the mouth thoroughly with tap water, the protruded tongue should be grasped and held with a gauze pad. With the subject's mouth opened wide, the dorsum of the tongue in the vicinity of the junction of the anterior and middle one-third may be observed. Dry this area with a gauze pad being careful to stroke the papillae so that they stand erect. Select a papillated area to the left or right of the middleline of the tongue and deposit 9-10 microliters of the 2, 6-dichloroindophenol dye. Begin timing (preferably by stopwatch) the reaction immediately after the drop touches the tissue and continue until the blue color has

completely disappeared. Record the elapsed time, in seconds, required for complete decolorization of the solution and instruct the patient to rinse vigorously with tap water. The recorded number may be referred to as "the lingual time".

INTERPRETATION

If the lingual ascorbic acid test is carefully executed according to instructions, a satisfactory tissue ascorbic acid status is indicated by a lingual time of less than 20 seconds. Lingual times greater than 20 seconds are indicative of poor tissue ascorbic acid status. The timing need not be extended beyond 60 seconds since the end-point of decolorization is difficult to determine.

FACTORS CONTRIBUTING TO VITAMIN C 'TISSUE' DEFICIENCY

Lifestyle	Diet	Disease
Pregnancy	Lactation	Smoking
Alcoholism	Menstruation	Stress
High Fever	Exercise (Strenuous)	
Prolonged Administration of Antibiotics or Cortisone		
Inhalation of Fumes of Petroleum As Well As DDT		
Ingestion of Aspirin or Other Pain Killers		
Drinking Excessive Amounts of Water		

FACTORS CONTRIBUTING TO FALSE POSITIVE AND FALSE NEGATIVE RESULTS

- Natural Coating On Tongue
- Wet Tongue
- "Pooling" Of Dye In Midline Of Tongue Or In Small Cracks Or Crevices
- Lipstick On Tongue
- Medications
- Mouthwashes
- Ingestion of Foodstuffs Immediately Prior To Testing

SULKOWITCH TEST FOR URINARY CALCIUM EXCRETION

Reagent: Sulkowitch Reagent

Procedure: Place equal parts (e.g., 10 drops of each) of reagent and of urine (first morning sample recommended) in a test tube. Mix thoroughly and observe for calcium precipitate.

Interpretation: Measure the amount of calcium precipitate on a scale from 1 to 4 as follows (listed also are the approximate serum levels of calcium for each classification)

<u>GRADE</u>	<u>PRECIPITATE (Cloudiness)</u>	<u>APPROXIMATE BLOOD Ca. LEVEL</u>
1	None - clear solution	5 - 7.5 mg. %
2	Light ppt.- can read print through the test tube	7.5 - 8.9 mg. %
NORMAL 3	Fine, white ppt.- translucent appearance - enough so that print can be seen through test tube, but not clearly enough to read.	9.0 - 11.0 mg. %
4	Heavy, milky ppt. - opaque	over 11.0 mg. %

The level of calcium in the blood is paralleled by the level of calcium in the urine.

Calcium spills into the urine at 9.0 mg.%, so the blood calcium level may be approximated by the urinary calcium level. Also taken into consideration is the relative hydration of the patient. Low urinary calcium may be due to inadequate dietary calcium or poor intestinal absorption. Absorption may be aided by making sure the small intestine is on the acid side (it may be necessary to increase HCl intake) by eliminating foods which contain calcium binding substances such as oxalic, benzoic, or phytic acids and by making sure that thyroid function is adequate.

High urinary calcium can be due to excessive calcium intake (which is not too common) and a variety of other nutrient imbalances which are discussed in Dr. Goodheart's article, "Quick...Simple...Valid...Urinary Testing Methods," which is found in his book of reprints. It may also be elevated due to a variety of pathological conditions such as malignancy, parathyroid dysfunction, nephritis, and others.

Adapted from Common Glandular Dysfunctions in the General Practice by Walter H. Schmitt, Jr., D.C.

KOENIGSBURG'S TEST FOR URINARY CHLORIDES (SODIUM) EXCRETION

Koenigsburg's test is a simply-performed test which we do on the first morning urine specimen. (before eating or drinking anything) on every new patient we see. We also use this test as a follow-up procedure to monitor the progress of hypoadrenic patients in whom it is abnormally high or low initially.

The test is a titration which requires the use of two reagents: 10% potassium chromate, and 0.74% silver nitrate. The procedure is as follows:

1. Place 10 drops of urine in a test tube.
2. Add 1 drop of 10% potassium chromate solution. Mix. The solution has a yellowish color at this point.
3. Titrate drop by drop the 0.74% silver nitrate solution. Observe for a change of color of the solution. The color will become red-orange to brick red, not unlike tomato juice.

Titrate drop by drop, mixing the solution periodically to ensure equal mixture. The end point of the test is when the entire solution turns to brick red (or red-orange) color after mixing.

The number of drops in a normal specimen is 17-25 drops.

If the patient is spilling excessive sodium (and chlorides) into the urine, the number of drops will be high (over 25). If there is less than normal sodium (and chlorides) spilling into the urine, the number of drops will be low (less than 17). It is important to determine the level of sodium (especially salt) intake of the patient because of heavy salt user will necessarily be spilling sodium (and chlorides) into the urine.

The most common reason for an alteration in Koenigsburg's test, given a moderate salt intake, is functional hypoadrenia. Hypoadrenia will cause either a high result or a low result on the Koenigsburg's test in the majority of patients with stress-related illness. In the early stages of hypoadrenia, the lowered aldosterone levels will allow extra sodium to spill into the urine, resulting in a high number of drops (over 25) being necessary to reach the end point. In the hyperadrenic periods of the G.A.S., (General Adaptation Syndrome) resistance stage, the increased aldosterone output might cause the body to retain sodium, and the number of the drops may be lower than normal (less than 17).

In the early exhaustion stage of the G.A.S. the amount of sodium in the urine will be reflected by very elevated levels of sodium, sometimes requiring over 60 drops of reagent to reach the end point. But in the late stages of the exhaustion stage, there will be such a loss of sodium over a period of time that there will not be enough sodium left in the body to spill into the urine and the number of drops will be quite low, sometimes as low as 5-7 drops.

It is these patients who will most likely exhibit the paradoxical pupillary reflex or who will be experiencing edematous symptoms. You can correlate the level of sodium in the urine with these other findings and extrapolate the patient's position in the G.A.S.

Patients who are showing excessive sodium or very low sodium in the urine will often crave salt. The obvious attempt by the nervous system to help this condition is the cause of this salt craving. Some authorities state that salt will actually suppress adrenal function. Their stand is based on the fact that extra salt will, in a normal patient, suppress aldosterone secretion by a negative feedback loop to allow the body to get rid of the extra sodium.

Sodium restriction in the patient in the exhaustion stage is probably ill-advised. However, instead of adding salt as a source of sodium, we rather recommend more natural sources of organic sodium. The foods with the highest levels of sodium are zucchini squash, green beans, and celery. We sometimes recommend a "zucchini soup" be added to the patient's diet to replace the lost sodium. The recipe is as follows:

VEGETABLE SOUP

1 can or pkg. French green beans	1 cup tomato juice
1 cup chopped celery with leaves	1 cup water
1 medium zucchini, quartered lengthwise & sliced	2 T. honey
2 T. dehydrated onion flakes	1 t. paprika
	pepper to taste

Combine ingredients and simmer 1 hour, until tender. Serve hot or cold.

The level of potassium intake may also affect the hypoadrenic patient in different ways at different stages of the G.A.S. In the exhaustion stage, potassium should be restricted, due to its excess in ratio to sodium. Extra potassium intake in these periods of exhaustion can aggravate the altered sodium-potassium ratio, resulting in elevated potassium symptoms, such as edema or even cardiac abnormalities.

However, during hyperadrenic periods of the G.A.S., the increased aldosterone output causes a sodium retention and a potassium loss. At these stages the patient may be benefitted by potassium and will often crave potassium-rich foods. Potassium content is high in green, leafy vegetables and many fruits, particularly oranges and bananas.

Adapted from Common Glandular Dysfunctions in the General Practice by Walter H. Schmitt, Jr., D.C.

EFFICIENT SPINDLE CELL ACTIVATION

Donald A. McDowall, D.C.

Abstract

This paper presents a technique designed to efficiently activate the spindle cell mechanism of a muscle when a muscle that weakens in the clear is strengthened by positive therapy localisation to the spindle cell. Explanations are given regarding the development of treatment of the spindle cell mechanism in a muscle as well as anatomical and kinesiological considerations.

Introduction

The classic method of treating a spindle cell inactivity has been described by Goodheart as pulling the belly of the muscle apart to strengthen the muscle and pushing the belly of the muscle together to weaken the muscle (1). My experience with this particular technique has illustrated its effectiveness and consistency with alleviating many muscle weaknesses. I propose that an addition to this mode of therapy is to contract the specific muscle that has been diagnosed at the same time the spindle cell is activated to produce strength. This appears to be a more functional treatment involving the co-operation of the patient. It requires a conscious effort to activate the muscle by the patient producing a forceful request by the muscle to activate its spindle cell to resume its normal tone. Stimulating the spindle cell in this environment seems to be a more efficient and quicker mode of therapy for common muscle strain injuries.

I will attempt to discuss my thoughts and reasoning of this observation in the remainder of this paper, as well as hoping to conclude that this material will be put to effective trial by colleagues who are willing to observe its results.

Discussion

The neuro-muscular spindles are part of the group of muscle proprioceptors. They provide both afferent and efferent nerve communication with the central nervous system. These spindles interpret the rate of change of the muscle length as well as any change in tension of the muscle. A dynamic stretch reflex can cause the neuro-muscular spindle to be stimulated and the muscle to contract, such as a knee jerk reflex. A static stretch reflex *occurs* when a neuro-muscular spindle is stimulated from a slow and continued stretch of the muscle such as sitting or prolonged exertion of muscle force.

These neuro-muscular spindles not only influence the muscle in which they reside, but also its synergist, antagonist and fixator muscles. This fine motor and sensory co-ordination can easily become upset in a strain trauma (2).

The proximity of the muscle spindle to the nerve bundle has been observed by photograph and is an important consideration for the chiropractor who uses this technique understanding many of the referred pain symptoms and complaints that can occur due to inactive proprioceptors (3).

Methods of treatment to reduce the trauma of a neuro-muscular spindle are varied. Goodheart describes an approach that involves stretching the neuro-muscular spindle to activate the weakened muscle to contract, or contract the spindle cell to cause the hypertonic muscle to relax. Jones postulates his method of treatment of inappropriate proprioceptor activity as markedly shortening the muscle that contains the malfunctioning spindle cell by applying mild strain to its antagonists. In other words, the inappropriate strain reflex is inhibited by application of a counter-strain (4). Goodheart proceeds to adapt Jones work by palpating the tender muscle spindle and flexing or extending the spine until that tenderness disappears. He then stretches the spindle cell while the spine is positioned. This posture is maintained until the spindle cell has become active and the spindle cell sensitivity has disappeared (5).

Travell has recorded her approach to muscle inactivity by stimulating the dermatomes on the surface of the muscle using cold therapy such as fluoro methane or ethyl chloride sprays during a mild stretch of the inactive muscle (6). This technique has been further refined by Goodheart to enable specificity of application using the muscle stretch test technique (7).

I have found all of these techniques helpful and useful at times, but do not consider them complete in activating observed spindle cell therapy localisation in observed muscle weaknesses on a consistent basis.

During contraction the active muscle function is to approximate the origin and insertion. Maintaining this contraction activates and integrates the neuro-muscular spindle. This primary function co-ordinates with the antagonist, synergist and adjacent fixated muscles to allow efficient function of the active muscle.

Diagnosis

This treatment is diagnosed by evaluating a muscle's strength. If the muscle is weak in the clear and therapy localises to the spindle cell, then this technique will greatly enhance the static spindle cell activation as proposed by Goodheart and illustrated by Walther (8). When a muscle tests strong in the clear and therapy localises to the spindle cell, as illustrated in a "51 percenter", then this technique will also speed recuperation of the muscle injury.

The procedure to follow in making this action more efficient is to have the patient forcibly contract the previously diagnosed weakened muscle at the same time the doctor attempts to lengthen the spindle cell according to Goodheart's observations. The neurological reflexes and proprioceptive co-ordination that is coincident with the doctor's treatment can be observed to greatly encourage the result. Re-testing the weakened muscle will show increased strength. Therapy localisation to the spindle cell will be abolished and pain, as well as tenderness of the weakened muscle, will disappear.

My observations show that this procedure works extremely well in acute trauma situations as well as adjunctive to chiropractic adjustments. Support of the subluxated structure is greatly enhanced using this technique. Clinical experience indicates that patient co-operative during treatment greatly assists the results for long term stability.

Flexion or extension of the spine as regards Jones' strain and counter strain technique is not considered in this particular application

My observations show that when this technique has been used and a reasonable trial given for the patient to evaluate the results, that any re-occurrence of discomfort will be effectively assisted by diagnosing for the strain/counter strain or muscle stretch technique. My observations also show that this technique is more primary in sequence to the latter techniques.

Summary

An efficient proprioceptor technique has been presented that can be utilised in an active exercise situation by the patient

and doctor to approximate the effects and environment of the original

4.

injury that the patient may have suffered. It will quickly stabilise an injury and provide a quicker recuperation for spindle cell trauma. This technique can be used in addition to the already existing spindle cell techniques. It will assist with the repair of muscle strain that is seen in the normal chiropractic practice. Support of the subluxated structure will be enhanced and reduction of direct and referred pain will be improved.

References

- (1) George J. Goodheart, Jr., "Applied Kinesiology and Golgi Tendon Organ and Spindle Cell" (Digest of Chiropractic Economics, Volume 18, No. 3, November/December 1975), page 18.
- (2) David S. Walther, "Applied Kinesiology Volume 1, Basic Procedures and Muscle Testing" (Systems DC, Pueblo, Colorado, 1981), pages 143 and 144.
- (3) Lee D. Peachey, "Handbook of Physiology", Section 10, Skeletal Muscle (1983 American Physiological Society, Bethesda, Maryland), page 88.
- (4) Lawrence H. Jones, "Strain and Counter Strain" (The American Academy of Osteopathy, Colorado Springs, Colorado, 1981), page 11.
- (5) George J. Goodheart, "Applied Kinesiology Research Tapes" (privately published, 542 Michigan Building, Detroit, Michigan, 1983).
- (6) Janet G. Travell and David G. Simons, "Myofascial Pain and Dysfunction - The Trigger Point Manual" (Williams & Wilkins, 1983).
- (7) George J. Goodheart, "Applied Kinesiology Research Notes" (privately published, 542 Michigan Building, Detroit, Michigan, 1981).
- (8) David S. Walther, "Applied Kinesiology Volume 1, Basic Procedures and Muscle Testing" (Systems DC, Pueblo, Colorado, 1981), pages 144 and 145.

Donald A. McDowall, D.C.
4 Weedon Close,
Belconnen, A.C.T., 2617,
Australia.

MALOCCLUSION & IATROGENIC SIDE EFFECTS

Richard MELDENER D.C.

Diplomate of the International College of Applied Kinesiology

ABSTRACT

Lateral excursion malocclusion appears to modify nervous system activity as measured by manual muscle testing & Electroencephalography .

INTRODUCTION

Hans SEYLE describes the difference between discovery and research :

Discovery is finding something new that is unexpected & which increases the body of knowledge in science .

Research follows discovery by taking discovery to the laboratory for definition & quantification development .

New knowledge is acceptable to the scientific community only after control & statistical laboratory evaluation .

This paper discusses a discovery I have made which has since received validation in research laboratory .

MALOCCLUSION & IATROGENIC

SIDE EFFECTS

Richard MELDENER D.C.

Page 2

During 1982 , Louis NAHMANI Professor at the University of REIMS Dental School has conducted the research :
" Electroencephalography & Electromyography study on experimentally induced occlusal contacts . "

This study has been conducted in both departments of :

- Gnathology & Occlusion Pr NAHMANI
- Neurophysiology Pr MORICE

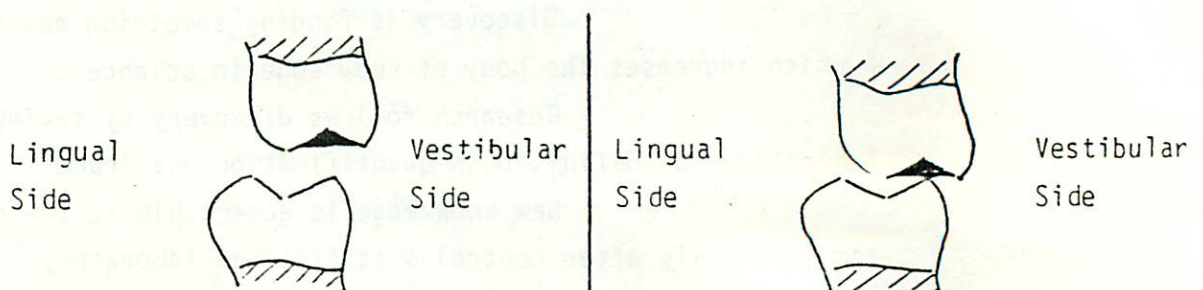
The study consisted in the investigation for possible iatrogenic effects on brain activity following experimentally induced malocclusion .

Experimental malocclusion was constructed on subjects with normal occlusion & on which occlusal premature contact was placed for experimental purposes .

Brain activity was evaluated by Electroencephalography (EEG) with the assistance & expertise of the EEG Neurophysiology department staff of Pr MORICE.

EEG recording was made with the suroclusive material in the central fossae on the upper first right molar .

The subject brain activity was recorded in two different mandibular positions :



I. Rest Position
(Frontal Plane)

2. Centric Occlusion Position
(Frontal Plane)

MALOCCLUSION & IATROGENIC
SIDE EFFECTS

Richard MELDENER D.C.

Page 3

During each EEG recording the subject was placed supine on the examination table with the EEG electrodes fasten to the head without chin strap to provide temporomandibular freedom .

No difference in brain activity was recorded between the two distinct mandibular positions .

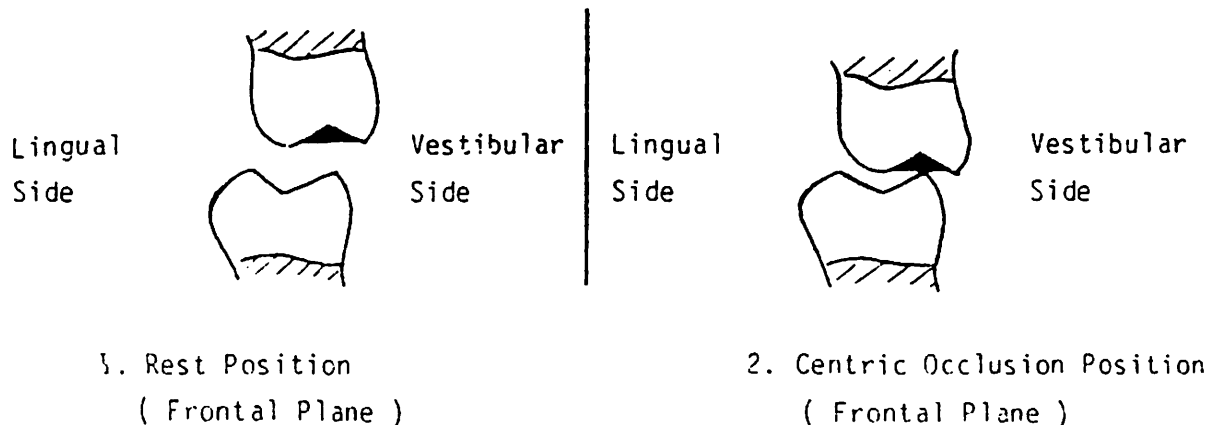
When Louis NAHMANI (L.N.) told me about his ongoing research , I wondered if Applied Kinesiology could assist and take part in the advancement of this research study .

He gave me the suggestion to use a fragment of a wooden match to create an occlusal interference .

With this practical usefull advice , I started investigating malocclusion using the Applied Kinesiology manual muscle testing diagnostic tool .

My first series of investigation consisted in reproducing the same protocole L.N. had followed with the suroocclusive material (a fragment of a wooden match) placed in the central fossae of the upper first right molar .

My interest was alerted by observing that in both mandibular positions :



MALOCCLUSION & IATROGENIC
SIDE EFFECTS

Richard MELDENER D.C.

Page 4

I could observe no manual muscle testing strength difference on any one of the following muscle : Deltoid , Pectoralis Sternal and Clavicular , Psoas , Quadriceps , Tensor Facia Lata .

Somehow I was pleased to observe that manual muscle testing confirmed the absence of EEG findings.

With these observations in the back of my mine , I then gave some thoughts to the work of GOODHEART D.C. concerning the periodontal ligament .

In 1976 (Reference N° I) discussing what he called a Neurologic Tooth , GOODHEART observed that a tooth could sbluxate in its alveolar socket interfering with the periodontal proprioceptors .

He proposed a system of diagnosis & treatment for such abberation .

I had used extensively this technic with good consistant results at times and reoccurring imbalance at other times .

I knew a tooth could subluxate either toward :

- INGRESSION
- ERUPTION
- ROTATION
- MESIO-VERSION
- DISTAL-VERSION
- VESTIBULO-VERSION
- PALATAL / LINGUAL VERSION

But I also knew from clinical experience *that tooth* vestibulo & lingual excursion was the category occuring by far the vast majority of the time .

MALOCCLUSION & IATROGENIC

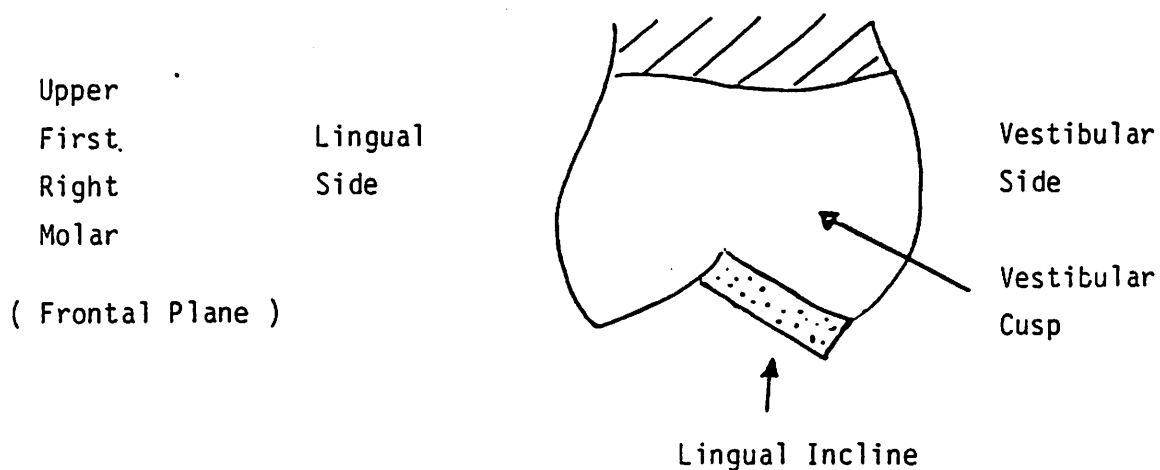
SIDE EFFECTS

Richard MELDENER D.C.

Page 5

With both, this observation & L.N. study the hypothesis came to my mind that may be iatrogenic malocclusion was produced by tooth vestibulo &/or lingual excursion .

I decided to start monitoring this hypothesis & placed a surocculsive material (a fragment of a wooden match) on the lingual incline of the vestibular cusp on the upper first right molar .



I manually muscle tested the same five different muscles than during the previous test protocole : Deltoid , Pectoralis Major Sternal & Clavicular , Psoas , Quadriceps , Tensor Facia Lata .

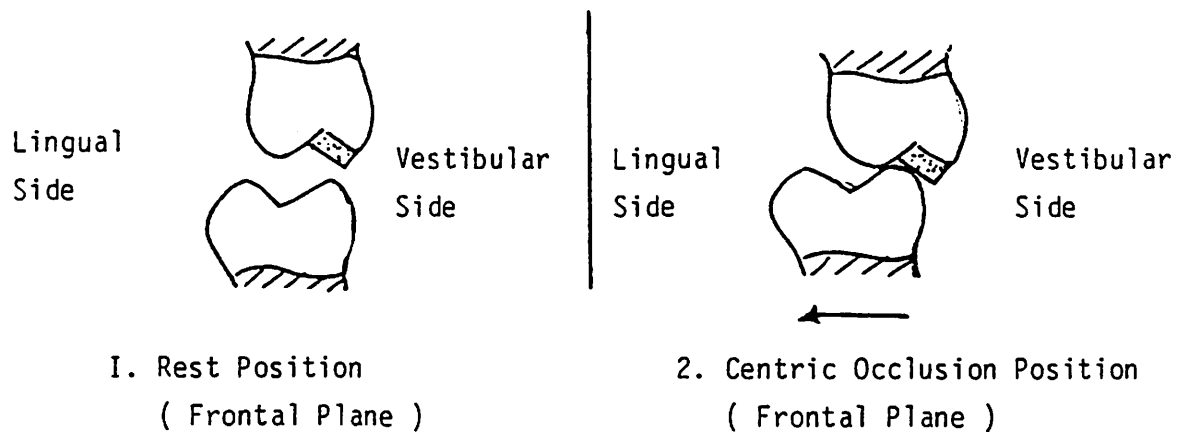
These various tests were made both in the two mandibular positions :

1. Rest position
2. Centric occlusion position

MALOCCLUSION & IATROGENIC
SIDE EFFECTS

Richard MELDENER D.C.

Page 6



The five muscles that were strong on manual muscle testing while the mandible was in the rest position became all weak during centric occlusion position .

This observation revealed to be consistent & manual muscle testing weakness was obtained on every strong muscle I would test while the subject was maintaining the same lateral excursion malocclusion .

This original observation was made in my office in PARIS on Sunday January 16 1982 .

On Monday afternoon January 17 1982 I repeated the same experiment at the University of REIMS Dental School in the department of Gnathology & Occlusion in the presence of Louis NAHMANI PhD , Alain MARCHAND D.C. , & a dozen of dental student (TAIEB , DEFAR , ...)

Cold cured acrylic material was used to create malocclusion in this experiment.

MALOCCLUSION & IATROGENIC

SIDE EFFECTS

Richard MELDENER D.C.

Page 7

A consistant muscle weakness was obtained as evaluated by manual muscle testing when the subject would bite with the suroclusive material creating experimental lateral excursion .

On Tuesday morning of January 18 1982 , I repeated the same demonstration with the same protocole with plastic acrylic suroclusive material placed on the lingual incline of the vestibular cusp on the upper first right molar .

But that time I was in the EEG room of the Neuro - physiology department of Pr MORICE .

Manual muscle testing revealed consistant muscle weakness every time the subject was biting in centric occlusion position .

EEG recording immediatly followed manual muscle testing both in :

- I. Rest position
2. Centric occlusion position

For the first time EEG graph recording revealed an extensive & objective aberation during experimentally induced occlusal contacts .

Since my original observation the team conducted by L.N. has with DEFAR & others validated my discovery confirming that lateral excursion occlusion appears to create iatrogenic effects on brain activity as evaluated by EEG .

MALOCCLUSION & IATROGENIC

SIDE EFFECTS

Richard MELDENER D.C.

Page 8

DISCUSSION

Further investigation appears desirable to determine which proprioceptors are activated during this lateral excursion malocclusion affecting brain activity .

Are the nociceptive nerve impulses released at the level of the periodontal tissue , at the level of temporomandibular joint , at both levels or somewhere else in the stomatognathic system?

CONCLUSION

Slide into lateral excursion induced by an occlusal contactinterference appears to modify brain activity .

This observation implements DAWSON 's observation about the effects of minute occlusal interference to create occlusal disfunction and eventual muscular spasm . (Reference N° 2)

AKNOWLEDGMENTS

.. I want to thank Louis NAHMANI to have given me the opportunity to be a part of this research study project which results should draw the attention of various health professionalsconcerned about the stomatognathic system & brain activity .

MALOCCLUSION & IATROGENIC
SIDE EFFECTS

Richard MELDENER D.C.

Page 9

REFERENCES

- I. P.E. DAWSON Evaluation , Diagnosis and Treatment of
Occlusal Problems . St LOUIS C.V. Mosby CO 1974
 2. G.GOODHEART Audio tape N° 3I Detroit Private Pub May 1976
-

TOXICITY OF AMALGAM DUE TO MERCURY POISONING

by

Carl Mestman, D.D.S.

January 1984

ABSTRACT: Many people are suffering from mercury poisoning due to their amalgams (silver fillings). Amalgams can be releasing mercury into your system. How that happens, what to do about it, and when to do it is the subject of this paper. I wish to make you aware of the problem and how it can affect you, your family, and your patients.

Mercury is a poison to the body. An amalgam is a combination of 65% silver, 25% tin, 6% copper, and 2% zinc.⁽¹⁾ It is mixed approximately using nine parts of alloy to eleven parts of mercury by weight. This is an average method since there are now numerous types of amalgams utilizing many different alloy to mercury ratios. Dentists are taught that once the amalgam is packed into the tooth preparation and set, it no longer releases any mercury. It has recently become known that trace amounts of mercury are released every time the amalgam is compressed by an opposing restoration or tooth. Dr. Voll's⁽²⁾ Electroacupuncture (EAV) machine exhibits a readout on its potentiometer showing how some amalgams are releasing large amounts of mercury or whether that particular patient is exceptionally sensitive to the amount of mercury being released. Old amalgams that are loose or leaking are releasing more mercury than amalgams that are still sound. Even sound amalgams are suspected of leaking. When amalgams are placed in the mouth they contain about 50% mercury and as they age they can give off a total of about 500 mg. of mercury.⁽³⁾

Karl O. Frykolm published an article, "Allergy to Mercury From Amalgam Restorations," in 1957.⁽³⁾ He found that intraoral re-
spired air contains transient amounts of mercury vapor. He claimed
that saliva sealed off the vapor making it harmless. The American
Dental Association still believes this despite the fact that in
1979 Gay⁽³⁾ proved this to be untrue. Huggins⁽³⁾ has also shown
mercury escaping with the use of the Bachrach Mercury Sniffer.

Harold Stanley, D.D.S.⁽³⁾ Chairman of the Department of Oral Medi-
cine of the University of Florida said, "As far as I know mercury
within a set amalgam is of no concern to man. If there was a prob-
lem certainly it would have shown up in over a hundred years of use
across the world." N. W. Rupp, DDS, M.S.⁽³⁾ Research Associate of
the American Dental Association said, "to date we see no danger
for anyone other than a few sensitized patients....." The ADA
News, January 2, 1984 writes, "Mercury in small quantities is found
naturally in the human system. And the average mercury level found
in the general public is more than one hundred times lower than the
level at which harmful effects are usually reported." These are
statements from responsible dental authorities. It is obvious to
any investigator who has searched the literature that the above
statements cannot be accepted as authoritative. Mercury is a poi-
son to the human system in any trace amount. I have never read any-
where where trace amounts of mercury are normal or safe for human
beings.

Two dentists from Orlando, Florida, Michael Ziff, D.D.S. and James
Hardy, D.D.S.⁽³⁾ have done an exhaustive study on mercury poisoning.

They reported that one dental assistant had chest pain and arm pain; another had a right hand like ice. The amalgams were removed and the problems disappeared. A patient developed epigastric pain and nausea. At the hospital he was diagnosed as a heart attack with AV block and PNCS. They treated him with Inderal. He spent ten days in the hospital. On the fourteenth day he had a stress test and was found in the 90th percentile (very healthy). After removal of his amalgams he no longer needed two aspirins twice a day for headaches. Heart irregularities can be caused by mercury.

In 1819 dental silver amalgam was invented by an English Chemist. The American Society of Dental Surgeons required its members to sign an agreement not to put amalgam fillings in patients mouths because they were considered toxic. Members violated their agreement, the organization dissolved, and the American Dental Association was born. Yes, over one hundred years ago the toxicity of amalgams was known. Why has this been allowed to continue? Economics plays a large role. Amalgams are considered the backbone of dentistry.

Electroacupuncture by Voll₍₂₎ (EAV) has demonstrated mercury intoxication by mercury from amalgams. His machine measures vagrant buccal currents of the order of 100 milli-volts and above. The new Vegatest₍₄₎ machine is a so called bio-energetic regulatory technique and is more sensitive. It will reveal the buccal vagrant currents more readily.

If patients have been responding poorly to treatment have their amalgams checked by the proper test. Some patients have a very

high threshold and may not exhibit any visible symptoms other than the reading on the Vegatest. The choice is then theirs to make. At least they have been informed.

The restoration of choice to date is gold. So far no one has found any toxicity with well executed gold restorations. Gold restorations however are very expensive and the average patient cannot afford it. Composites are the restorations of choice for the average person. These are the new plastics that are bonded to the tooth. They are not as wear resistant as amalgam, but are developed enough to give good service when properly executed. The material of choice to date is P-10 with scotchbond as the best adhesive. The manufacturers are producing newer and better composites and adhesives every year. In a short time I believe that they will have a composite equal to amalgam. At the present time it may be necessary to replace your posterior composites a little more often than your amalgams. I think it is worth it to feel better all over.

Composites are also toxic. They should also be detoxified before being used. I use the Thea-lite⁽⁵⁾ to detoxify the material as soon as it enters my office. After the composite has been mixed and placed in the tooth I further detoxify it. The chemical reaction arising from polymerization of the plastic produces toxicity. I detoxify the set composite with a fiberoptic light and a three thousand gauss magnet.

Patients suffering from any type of debilitating disease such as multiple sclerosis, muscular dystrophy, Parkinson's Disease for

example, should have their amalgams replaced with composites.

Future research will prove the importance of this procedure.

References:

1. Operative Dentistry, by Mc Gehee, True & Inskipp, published by Mc Graw/Hill Book Co. Inc. 1950 pg. 417.
2. Electroacupuncture by Voll, c/o Walter Strum, Ph.D., P.O. Box 1089, San Bruno, California 94066
3. Comprehensive Report on Mercury, by Michael Ziff, D.D.S. and James Hardy, D.D.S., Orlando, Florida (Karl Frykolm, Hal Huggins, Harold Stanley, N. W. Rupp)
4. VEGATEST, by J. Fehrenbach, H.Noll, M.D., H.G.Nolte, M.D., H.W. Schimmel, M.D., J. Kenyon, M.D., VEGA Grieshaber GmbH & Co. Postfach 1142, 7622 Schiltach/Schwarzwald, WEST GERMANY.
5. Thea-Lite, Hazel Parcells, Ph.D., N.D., 1605 Coal St., S. E. Albuquerque, New Mexico 87106

SUTURE-INDUCED SCIATICA

EVAN MLADENOFF D.C., D.I.C.A.K.

ABSTRACT

A case history, examination and treatment proceedings of a chronic sciatica patient are presented. The final cause of the sciatica was determined to be a cruciate suture fault. The case history is representative of the co-operation needed between a dentist and a chiropractor for the patient's best interest.

The following case history is presented in an attempt to illustrate the importance of cooperation between the dentist and the chiropractor.

Case History

Patient's first recollection of a jaw problem was at age 17 when a friend mentioned that while he was eating, his clicking jaw drove him crazy. Apart from the clicking noise, patient's jaw never really created any problems. Other medical problems, however have effected the patient's life substantially and fall into three main categories:- 1) lower back pain, 2) sinus and bronchial problems, and 3) menstrual hormonal problems.

1) Low Back Pain

In January, 1974 the patient went on a skiing trip. Never having skied before the patient fell repeatedly on packed snow which resulted in bruising to both thighs. Shortly thereafter the patient began to experience severe back pain with pain shooting down the left leg. After a myelogram in May 1974 it revealed no obvious problem. The patient was in such pain it was decided that an exploratory operation would be done. The patient recalls that two or three lumbar disks were explored, no damage was found and the patient was then sewn up.

For many months after there was severe pain and toward the end of the year the patient was sent to Boston to see a neurosurgeon who diagnosed degenerating discs and prescribed vitamin therapy. The pain slowly eased to the point where the patient could resume full time work as a secretary with the aid of a butacoat or a bufferin type medication.

She had had two children, born 1975 and 1976, and stayed at home with them until June 1978. Patient can vaguely remember the constant pain and spending hours on the floor with the babies to rest her back. She used to pick things up off the floor with her feet to avoid bending. In December 1977 the patient was in so much pain she was all ready to be fitted with a surgical brace when someone suggested yoga.

After six months of this form of exercise done daily at home patient felt better than she had in years. In September 1978 she started jogging and found she really enjoyed it. In May 1979 she

was able to complete a half marathon slowly. By September of 1979 she was again in pain but kept running anyway. Also, she had constant throat infections and bronchitis episodes. By the summer of 1980 she had given up running.

By November of 1981, the patient was in agony. She could not roll over in bed without awakening, she could not lean over a sink to dry her hair, her feet, or whatever. The pain radiated from the low back down into the left leg and into the left foot. The patient called them shooting pains in her lower back or a twinkling kind of light. Standing was unbearable. By Christmas of 1981 dull pain developed in between shoulders, her arms felt swollen and too heavy to lift. She asked her general practitioner to refer her to a local orthopaedic specialist who suggested physiotherapy.

The physio was unable to touch the patient's lower back because it was too painful to touch. The work was concentrated on trying to relax the upper back.

During Easter of 1982 something popped between the patient's shoulder blades and she was in extreme pain. The orthopaedic surgeon called it referred pain and offered no treatment.

In June/July of 1982 she had a therapeutic epidural. It worked on her right leg instead of the left. Patient reported some relief for six weeks then the pain came back with a vengeance. At this time white lumps appeared on the patient's tailbone which also hurt and felt swollen. In October of 1982 the patient was severely depressed and in excruciating pain. She had been told that she was tall and thin and had to learn to live with her discomfort. On her husband's intervention and insistence she was referred to an orthopaedic surgeon in Boston.

In January of 1983 she visited the surgeon in Boston and had a CATscan. The surgeon suggested surgery to widen the channel in the vertebra to allow more room for the nerve to pass through. Also, he wanted to do nerve injection as a diagnostic evaluation.

In May of 1983, she was scheduled to have the above procedures done in Bermuda, however the patient had had such bad experiences with mylogram and therapeutic epidural that she refused the nerve root injection. She at this point was told by the surgeon, no injection--no surgery. The patient refused both.

In June of 1983 was worse than ever so she called the orthopaedic surgeon and to date has not received any return calls. In August of 1983 she discussed the pain with her general practitioner who offered to refer her to neurosurgeons in Montreal. Her husband insisted that before taking this step she visit a chiropractor who had been highly recommended to him by a friend who knew of her problems.

In August of 1983 the chiropractor began correcting a hip imbalance which reduced the back pain considerably, increased her

flexibility and gave her hope for the first time in ten years. September 2, 1983 the chiropractor had worked on her upper back finding various problems and on September 2 he manipulated the patient's neck. She experienced tremendous relief from the neck stiffness and was able to go on one week's vacation. The vacation was very hectic and exciting, the patient kept going all day long and this, in itself, was a miracle to her. Only standing bothered her leg and she took medication to relieve this.

On return from her holiday September 10 on return to the chiropractor's office the neck stiffened up and she had a constant headache. On September 16 the chiropractor tested her and suggested she had a jaw problem which could be causing some of the other problems. Patient reported that she had only had popping jaw problems. The chiropractor manipulated the jaw and gave her a book to read by Dr. Harold Gelb.

2) Sinus and Bronchial Problems

Patient reported in late teens and early twenties she was prone to bronchitis and it seemed to always occur at Christmas time or whenever she was overtired and tense. In January 1979 she had had mumps and felt she never really got over it. After the mumps she experienced difficulty swallowing and at night found it difficult to get to sleep because she kept gulping and would get a sore throat as a result. She started getting bronchitis more and more frequently. From mid 1979 to mid 1981 she had approximately 30 prescriptions for antibiotics and decongestants. She was referred to an ear, nose and throat specialist, and in June 1981 had her sinuses washed. In September of the same year he performed a Caldwell Luc operation. She immediately had another sinus infection and still was prone to lung infections. She was ill with a lung infection in early August 1983. Since the operation her nose has dripped on the right side with the operation being performed on the left.

3) Menstrual/Hormonal Problems

With the onset of menstruation at age eleven, patient suffered severe cramps, nausea, vomiting, headaches, not to mention flooding. Her grandmother treated her with hot gin. At age 18 she went on the pill and this alleviated almost all of the above symptoms. She was married at age 20 and had three miscarriages before her daughter was born in 1975. For the first five months of the pregnancy she was given weekly hormone injections. During the pregnancy she complained to her dentist of ringing in the ears. He thought it might be a hormonal problem effecting the middle ear. Fourteen months later in 1976 she gave birth to a son. Again, ringing ears a problem during pregnancy, then a hollow sea surf sound which was very annoying. Also, the hormonal therapy continued during the pregnancy. Since the birth of her children she has not taken birth control pills and

menstruation has been long and painful. She also developed premenstrual tension so badly that she reported it to her general practitioner. She finally went back on the birth control pill in July 1983 to try and alleviate the above symptomatology.

In September of 1983 the patient was referred to an orthodontist who specializes in malocclusion. Dr. James placed her in a mandibular splint to assist in mandibular repositioning. She was then referred to our office for applied kinesiology care.

Presenting Complaints

- 1) pain in left leg from the hip to the foot
- 2) difficulty in moving the left foot, a very strong sensation. Approximately two weeks ago everything seemed to bottom out and pain was very severe. Things seemed to get worse after putting the splint in her mouth. Her neck was constantly stiff and she felt that she was in a cold sweat at all times. Other symptoms included decreased libido to the point of non existence, light sensitivity, digestive upset, bloating very easily, constipation, of course recurrent bronchial and sinus infection, the menstrual upset that was previously discussed. The patient also complained of swollen lymph glands, bright lights bothering her eyes.

Examination Findings

1) Laboratory Examination

lingual ascorbic acid test- 35 seconds
 petechiometre- 30 mm pressure negative
 photomogram analysis- 307 milliseconds indicating hypothyroid
 axillary temperature- 95.4 deg.F
 blood pressure-sitting 110/68, laying 100/80, standing 104/64.

2) Postural Evaluation

elevated occiput on the right, elevated shoulder on the left, elevated iliac crest on the right, elevated PSIS on the right, elevated ischial tuberosity on the right.

3) Manual Muscle Testing

The following muscles were found to be weak upon manual muscle testing: left gluteas medias, left gracilis, left piriformis, left sartorius, left tensor fascia lata.

4) Cranial Faults

Right and left sphenobasilar inspiration assist on the right and the left, an internal frontal on the left, a cruciate suture, glabella, and a sagittal suture.

5) General Applied Kinesiology Faults

Right closed TMJ and a left open TMJ, and a uterine lift.

6) Structural Faults Present

category II pelvis on the right and the left, a sacral inspiration assist, a sacral wobble on the left, a tarsal tunnel syndrome on the left, an L5-S1 category III and an L5-S1 fixation

pattern.

7) Endocrine Involvement

functional hypoadrenia, hypogonad function, hypothyroid and hypothyroid.

Diagnosis

The clinical picture described above in history and examination findings leads one to believe there are four major problem areas in this patient. These are a tarsal tunnel syndrome, the upset in the stomatognathic system, low back disturbed mechanics and fourth, the upset in the stress system. We see, according to Selye's 'Just Being Sick Syndrome' she has involvement of adrenals and of thymus and so she is headed toward the third stage of the Just Being Sick Syndrome.

Treatment

This patient was seen on a daily basis for three weeks because she was staying in Toronto from her home in Bermuda.

The first major area of treatment was the tarsal tunnel syndrome and this provided the first relief she had had in many years. The next major area in terms of treatment was the low back mechanics. The third major treatment centre was the stomatognathic system. Nutritionally the patient was evaluated and placed on adrenal substance and a thymus and spleen combination for the immune system. Within one week's time the patient's energy began to change.

After the first week of treatment the patient's mandibular splint was adjusted so that the mandible would place the disc in a more anterior position. The patient seemed to plateau until we were able to get the Straight Leg Raise sign to 45 degrees. We found, in the second week of treatment, that if we would literally hold the cruciate suture in separation, i.e. separating the cruciate suture, we could abolish a Straight Leg Raise orthopaedic sign on the left hand side. This was quite amazing, both to the patient and to myself. We treated the cruciate suture with an inspiration assist and we instructed the patient to do this at home, especially in the morning, which seemed to be the worst time of the day when the leg would act up the most, and the low back as well.

Over the next two days of treatments we were unable to make the cruciate suture correction hold. At this point, we had the patient consult Dr. James and she was fitted with a maxillary appliance that allowed for spreading of the cruciate suture with a small key. It was activated four times which would be approximately one half millimeter. The next morning she reported that there was no pain in the low back upon arising first thing in the morning, the first time that this had occurred in the ten years of the problems. We continued to monitor the patient for three more days and the low back progressed very quickly from that point on. The patient, Dr. James and myself came to the

conclusion that it was almost unheard of that a cruciate suture could create the sciatic problem. Dr. James noted that in his diagnostic workup he noted problems with the central incisors and occlusion but felt that it was so minor that it did not warrant any further investigation.

The patient's impression was that she would much rather continue her life with the orthopaedic appliance in her mouth than continue on with the pain. The patient was then sent back to Bermuda very pleased with the success that was achieved. We will have a follow up visit with the patient in approximately three to four months time to observe her progress, however she has within two months not reported any relapse of the present or past problems.

The hypoadrenia and hypothyroid conditions are continuing to be monitored. They probably will be the slowest areas to evolve to a normal state.

DISCUSSION

This case history is presented in the spirit of professional cooperation. It is absolutely essential that the practitioner be interested in the patient's best welfare and this must occur at all costs. Working hand in hand with the dentist has provided us the greatest opportunity to see some of the most devastatingly sick patients and also some of the most miraculous recoveries and cures. Hand in hand, the dentist and the chiropractor who practise applied kinesiology afford the patient the best possible health care available today.

ESSAY ON JING[WELL] POINT OF LIVER MERIDIAN

by IN E. MOON, D.N., C.A., O.M.D.

Abstract: In this paper, author discusses exceptional location of well point of Liver Meridian and unusual roll of Sp6.

INTRODUCTION: Beginning of studying acupuncture, many of us frequently asked questions why there is only one point on the bottom of foot while there are many points on palm of hand, and why there is one well point on thumb while there are two points on big toe, and why there is one well point on middle finger but none on middle toe, and why Liver Meridian does not run on middle toe similar to Pericardium Meridian.

As we see in the Chart 1, there are three divisions of six yin meridians also three divisions of six yang meridians. Three yin divisions are Taiyin, Jueyin and Shaoyin, in each division there are two meridians one runs into the hand the other runs into the foot. Three yang divisions are Yangming, Shaoyang and Taiyang, similar to yin division, two yang meridians are belong to each division one runs into the hand the other runs into the foot.

Let us study about regularity of location of well points of meridians in the same division, well points of Yangming meridian are located on second distal phalanges of hand and foot, those of shaoyang meridians are located on fourth distal phalanges of hand and foot, similarly those of Taidyang meridians are located on

lateral aspect of fifth distal phalanges of hand and foot. The well points of Taiyin meridians are located on medial aspect of first distal phalanges of hand and foot, those of Shaoyin meridians are located medial aspect of fifth distal phalanges of hand and foot

Alas! at last we are no longer enjoying simple regularity when it comes to discuss the well points of Jueyin meridians which are Liver Meridian and Pericardium meridian, this is only one exception out of six divisions of twelve major meridians.

How should we deal with this exception? How should we accept the unusual exception? Why did no one question about the exception? Is that somebody's mistake inherited since ancient time? If it is a mistake, why, when and who made the mistake? Then why did so many scholars and masters accept through the generations? Then is it true that Liver Meridian runs exceptional manner as classically mapped? If so why that kind of only one exception happen on Liver Meridian? In any case, what does it mean in clinical application? Are there any methods to experiment scientifically and answer those questions?

DISCUSSIONS: we would like to discuss following possible cases;

Case 1---Once upon a time one great master made a mistake and then every one copied since, therefore real true well point of Liver Meridian is located on the distal phalanx of middle toe which we will call Lv1M(Moon Dadun, _____).

Case 2---It is true that Liver Meridian runs as classically described and its well point is located on the lateral aspect of first distal phalanx of foot which is Lvl(Dadun) classically.

Case 1: It is impossible to believe everybody made the mistake through the generations for thousands of years. However, LvlM works as a Liver Meridian well point in certain controlled situations we will discuss later in this paper.

Case 2: Empirically there are many evidences that Lvl demonstrates Liver Meridian symptoms rather than LvlM.

Sometimes Case 1 makes sense and the other times case 2 makes sense, then we have to understand the differences between them therefore the auther is presenting the methods of evaluating the cases.

The first method we want to introduce here is the evaluation through Applied Kinesiological examinations.

The author found a method in AK to determine the deficiencies and excesses of acupuncture meridian point as follows; When patient touch an acupuncture point, it is called therapy localization(abbreviated TL), and previoly strong indicator muscle become weak, then the point is defficient. If double TL, i.e. touching two hands on same point samultaneously, makes previously strong indicator muscle(abbreviarted SIM) weak, then the point is excess

Using above technique, we found that when mu point of Liver Meridian(Lvl4) we found the well point(Lvl) is also deficient, but not LvlM!!!

However, here comes very interesting phenomena we found that the LvlM(Moon Dadun) show deficient instead of classical Lvl, if we TL right after treat Sp6 with manipulation or needling.,

Sp6 is the place the three yin meridians of foot meet together, therefore there is a high chance of meridian jamming which is sometimes known as switching in AK.

The second method is measuring electrical resistance between Lv5 and Lvl, then compare with the electrical resistance between Lv5 and LvlM.

With the second method, the electrical resistance between Lv5 and Lvl is less than between Lv5 and LvlM, before treatment on Sp6.

But we found opposite result after a treatment on Sp6.

Assuming that the treatment normalize the point but not cause jamming of meridian point, we get very important logical conclusions.

Conclusions: Almost everybody's Sp6 is jammed, therefore Lvl works as a well point of Liver Meridian before we treat Sp6. But if we normalize Sp6, then LvlM(Moon Dadun, _____) will be a

true well point of Liver Meridian.

Considering high incidence of jamming on Sp6 and the twisted path ways of three yin meridians of foot at Sp6, we can highly suspect embryological history of rotation of skin and meridians at this level, which is not found any embryology text yet today.

When we treat the Liver Meridian below Sp6 level after treating Sp6, it is more sensible to choose the Mōon's Liver Meridian points than classical points.

RELATIVITY PRINCIPLE

HUMAN FACTOR IN MUSCLE TESTING

By In E Moon, D.N., C.A., O.M.D

THERE IS EXISTENCE BECAUSE OF NONEXISTENCE.

LONG AND SHORT ARISE FROM COMPARISON.¹

Lao-Tzu, Chpater 2

ABSTRACT: In general, all of the scientific measurements have been relative or comparative to certain set standards. In order to make muscle testing accurate and scientific, we should set a standard or reference for comparison. However, we have not realized that we have used these standards without knowing what they were, because these standards are neither fixed standards in a sense nor national standards nor international standards. These standards are highly individual variables for both tester and testee from person to person. In this paper we will discuss past cases in Applied Kinesiology practice, our goal is to synthesize various findings into one principle. This, in turn, will expand our knowledge and conceptual thinking as well, for the exploration of new techniques and the elimination of doubt and confusion.

* * *

INTRODUCTION: Scientific measurement for weight rather mass is gram, kilogram and ton which is comparative value against standard kilogram which is a cylinder of platinum-iridium, it was originally intended to have a mass equal to that of 1000 cc of pure water at 4 degree Centigrade but more precise measurements have shown that this is not exactly true. The pound mass is now defined in the U.S. as a body of mass 0.4535924277 kilogram.

The international standard of length is a bar of platinum-iridium alloy of X-shaped cross section called the standard meter. The distance between two lines engraved on gold plugs near the end of the bar, when the bar is at the temperature of melting ice, is called one meter, and one one-hundredth of this distance is one centimeter. The meter was originally intended to represent one ten-millionth of the earth's quadrant through Paris, but later, more accurate measurements, have shown that it differs from its intended value by a small amount. The standard meter has been carefully compared with the wave length of one particular color of light emitted by cadmium vapor in an electrical charge, and if it were ever destroyed it could be replaced with an accuracy better than one part in a million. The yard, originally embodied by a physical standard like the meter, is now defined as $3600/3937$ of one meter. The standard kilogram cylinder and the standard meter stick are kept at the International Bureau of Weights and Measures at Sevre, near Paris. The copies of the Paris meter have been distributed to the standardizing agencies of various nations, such as the National Bureau of Standards at Washington, D.C.

The unit of time used in scientific work is the second, defined as $1/86,400$ of a mean solar day. The fundamental unit of time is the mean solar day, the average time for the earth to make one revolution on its axis with respect to the sun. The length of a solar day increases and decreases gradually in the course of a

year because of the orbital motion of the earth. The length of a solar day averaged over a year is the mean solar day.

When we test muscle we use force, then how do we define the force? Have we tried it? When we try to measure the force, what kind of standard value do we use to compare with?

Let us find out and think about what the scientists studied in the past. Mechanics is the branch of physics which deal with the motion of material bodies and with the forces that bring about the motion. When we push or pull on a body, we are said to exert a force on it. Forces can also be exerted by inanimated objects; a stretch spring exert the forces on the bodies to which its ends are attached, compressed air exerts a force on the walls of its container. Gravitational forces, electrical forces and magnetic forces can act through empty space without contact. Commonly said one pound of weight is a gravitational force which is exerted on one pound of mass by earth. The unit of pound used in measureing both mass and force which we call weight.

The instrument most commonly used to measure force is the spring balance, which consist of a coil spring in a case for protection and carrying at one end a pointer that moves over a scale. Measuring force is reading the scale for change of length of spring. The balance can be calibrated as follows. The standard pound is first suspended from the balance and the position of the pointer is marked 1 lb. Any number of duplicates

of the standard can then be prepared by suspending a body from the balance and adding or removing material until the index again stands at 1 lb on scale. Then when two, three, or more of these are suspended simultaneously from the balance the force stretching it is 2 lb, 3 lb, etc. The calibrated balance can then be used to measure any unknown force in pounds.

As we reviewed, every basic scientific measurement is a comparative or relative value respect to a certain standard which everybody agrees upon. Why must that be so? That is observer's HUMAN FACTOR and comparing capacity of human sense or perception. This particular human factor and capability of human sense have been a subject of study to the group of scientists, who are the industrial engineers, industrial psychologists and so on.

TESTING MUSCLE in our discussion, especially in applied kinesiology, can be understood as a measurement of force of given muscle in maximum strength. Then what is a standard to compare with this force from given muscle? There have been many attempts that we tried to use a pound as our standard of measuring muscle strength, and then some sophisticated instruments employed to get the value of muscle strength in pounds, but it has not been successful. Even though we fail to get the desired results from the instrument, as we are trained muscle tester, we feel the muscle is weak and the other muscle is strong. There could not exist any weak muscle alone. It is absolutely impossible to state

that a muscle is weak by itself. Accurately saying, a muscle is weaker than a specifically defined standard force. In the same manner, it is impossible to have a strong muscle without a comparison to a weaker standard muscle than the subject muscle.

DISCUSSION:

There are many experimental data that relative demonstrate discriminatory capabilities are far superior to absolute ones. For example, the discrimination abilities of vision on various hue are amazing, a medium intensities there are about 128² discriminable hues on a relative basis, but there are only 12 to 13 hues on an absolute basis.³ For interrupted white light, at moderate intensities and with a duty cycle of 0.5, it is possible to distinguish 375 separate rates of interruption in the range of 1 to 45 interruptions per second when we test relatively,⁴ but no greater than 5 to 6 interruption rates can be positively identified on an absolute basis.⁵ There are about 570 discriminable intensity differences with white light in a practical range,⁶ but there are only 3 to 5 absolutely identifiable intensities in a range.⁷ For audition of pure tones, there are approximately 1800 discriminable steps between 20 cps and 20,000 cps at 60 db loudness when tested relatively,⁸ but

there are only 4 to 5 tones on an absolute basis.⁹ For the audition of interrupted white noise, it is possible to distinguish 460 separate interruption rates in the range of 1 to 45 interruptions per second.¹⁰ For mechanical vibration, there are 180 discriminable frequency steps when sensed relatively.¹¹ In the chest region a broad contact vibrator with amplitude limits between 0.05 mm and 0.5 mm provides 15 discriminable amplitude relatively,¹² but 3 to 5 steps absolutely.¹³

It is widely held notion that man has only five senses, sight, hearing, taste, smell and touch, but when in truth, he has a great many more, such as rotation, linear motion, vibration, pressure, temperature, position and movement, kinesthesia and etc.¹⁴

As we found, our sense organs are very sensitive and capable to compare the slight differences between two even though we could not distinguish the differences without the comparison.

When a patient senses a Therapy Identification,¹⁵ it is obvious that he can sense it better and respond well when it is given right after some other T.I.(=Therapy Identification) to compare with. Here we will have some examples:

EXAMPLE I, Preference of light sources by muscle response.

There have been many controversial claims about fluorescent light. One doctor #1 claims that a fluorescent light make muscle weak, but the other doctor #2 claims that he works in the basement office where only fluorescent light is available and there is no problem to do applied kinessological examination under the fluorescent light, therefore, I do not think the fluorescent light does not make my patient weak. We will clarify the matter by relativity principle. Let's do some experiment after clear all the switching factors and the meridian jammings. First unswitch the patient under fluorescent light and find one strong indicator muscle, it is strong now. Then test the same muscle while showing him incandescent light, now the SIM is strong. Then test that SIM while showing him fluorescent light right after seeing the incandescent light, you will get remarkable weakness of that SIM which was strong under the same fluorescent light while ago. Then can we conclude that a fluorescent light make the muscle weak and incandescent light make the muscle strong? Wait, wait a moment, it is too early to make a conclusion. Let's do one more experiment. Test that SIM under the incandescent light to find the muscle is still strong, you will get the muscle test strong. However, you will get that SIM test weak under the same incandescent light if you show him sunlight

16

right before that test. Body compares!

As we saw above example, our body can sense very well when they are presented comparative or relative, but our body can not distinguish them when they are presented on absolute basis. Absolute basis can be achieved by manipulating umbilicus and K-27. The STANDARD for muscle testing under present challenge or T.I. to compare with is the challenge or T.I. which we apply right before the present challenge or T.I. Let's call the first T.I. as a STANDARDIZED T.I. So the body is setting constantly variable standard every time we test a muscle whether or not tester knows about it. Knowing what was a STANDARDIZED T.I.

every case enhances our understanding muscle responses in great deal.

EXAMPLE II, Distilled water, tap water, orange juice, coffee for the dehydrated upper trapezius.

We often find very weak upper trapezius with dehydrated person, but they say that they drink lots of liquids. Then test their weak upper trapezius right after having them drink a cup of water, the muscle is not weak any more. Then try fruit juice right before the test, you get weak response. However, we will get strong muscle with the same juice if the patient tried coffee right before the juice. For dehydration, distilled water works better than tap water, orange juice or coffee, tap water works better than orange juice or coffee, then orange juice is better than coffee, diluted orange juice is better than full orange juice and so on. you may find something better than distilled water if you keep trying different nutrient.

EXAMPLE III, Priority testing of T.I.'s.

This is a elimination process of less important T.I. by comparing two at a time.

EXAMPLE IV, T.I. right after pinch any part of skin.

T.I. is compared with pinch to ask body which one is more important.

EXAMPLE V, T.I. right after scratch skin.

EXAMPLE VI, Reactive muscle testing.

A muscle strength is compared to antagonist or synergist.

EXAMPLE VII, Refreshing T.I. after failure of prolonged T.I.

This case, body forgot the standard to compare or body confused present T.I. as a standard.

EXAMPLE VIII, Black or blue for water of five element.

Test will prove black is better to represent water element of color

EXAMPLE IX, Blue or green for wood element.

Blue is better for wood element.

EXAMPLE X, Surrogated relativity, Testor's muscle v.s. testee's muscle.

When Doctor's muscle is weak, he can not find the same muscle weakness from patients. Doctor with weak deltoid can not find deltoid weakness from patients, because patient's body compares its deltoid with doctors deltoid.

EXAMPLE XI, Comparing with memory.

We can use memorized standard, as in Example I, when sun light is not available we can ask patient imagine sun shine right before show him artificial light source.

EXAMPLE XII, Determine the better therapy out of two therapy.

When we test SIM right after subsequent two quick trial therapy challenge, if we get SIM unchanged then 2nd therapy is the better one or at least is the same as 1st one, if we get SIM weaker then definitely 1st therapy is the better one than 2nd one.

EXAMPLE XIII, Wedging, DeJarnette v.s. Goodheart.

EXAMPLE XIV, Wedging, DeJarnette v.s. Moon.

Moon's method of wedging has been used by the author since 1981 and taught at private seminars since 1982. The method is applying wedges similar to DeJarnette's on pelvis but with different diagnostic procedures, and plus TWO MORE WEDGES on the trunk, one at the corner of shoulder and another on the corner of lower edge of rib cage, after structural analysis and applied

kinesiological examinations. It requires total of FOUR WEDGES. SIM becomes weak if we test it when patient on the wedge DeJarnette's way right after Moon' wedging. That means Moon's wedging is better for the patient than DeJarnett's wedging.

EXAMPLE XV, Wedging, Goodheart v.s. Moon.

CONCLUSION:

NOTHING CAN BE SAID STRONG, UNLESS THERE IS SOMETHING WEAKER.
 NOTHING CAN BE SAID WEAK, UNLESS THERE EXIST SOMETHING
 17
 STRONGER.

It is important to set a standard before muscle testing in order to understand clearly and to prevent confusions.

Another important thing to pay attention is that we have to test a muscle before the patient's body forgets the set standard.

Our standard to compare with muscle testing is constantly changing and highly individualized for both testor and testee.

When we made a weak muscle strong, we made it relatively stronger than it was, may not be enough for correction of functional disorder.

COMPARISON IS POSSIBLE ONLY IF THERE ARE TWO AT A TIME.

Relativity Principle can determine which one of two therapy technique is suitable for each case.

Relativity concept helped us to developed better techniques for both testing and treating.

* * * * *

REFERENCES

1. Translation from Chinese text
2. Parsons, J.H., An Introduction to the Study of Colour Vision, Cambridge University Press, Cambridge, England, 1924
3. Halsey, Rita M., and Chapanis, A., On the Number of Absolutely Identifiable Spectral Hues, Journal of the optical Society of America, Vol. 41, 1951, pp. 1057-1058
4. Gebhard, J.W., Mowbray, G.H. and Byham, C.L., Difference-Limems for Photic Intermittence, Quarterly Journal of Experimental Psychology, Vol 7, 1955, pp.49-55.
5. Systems Research Psychological Laboratory, Institue of Cooperative Research, The Johns Hopkins University, Report No. 166-I-105, Preliminary Recommendations on the Types of Visual Codes Proposed for the Integrated Electronic Display System, by J.W.Gebhard, November 1, 1949.
6. Wright-Patterson Air Force Base, Technical report No. 5919, A Comparison of the Visual and Auditory Senses as Possible Channels for Communication, by P.G. Cheatham, 1950.
7. The Johns Hopkins University, Report No. 166-I-105.
8. Stevens, S.S., and Davis, H., Hearing. Its Psychology and Physiology, John Wiley and Sons, New york, 1938.
9. Pollack, I., The information of Elementary Auditory Displays, Journal of the Acoustical Society of America, Vol 20, 1952 pp. 745-749.
10. Mowbray, G.H., Gebhard, J.W., and Byham, C.L., Sensitivity to Changes in the Interruption Rate of White Noise, Journal of the Acoustical Society of America, Vol. 28, 1956, pp. 106-110
11. Applied Physics Laboratory, The Johns Hopkins University, Sensitivity of the Skin to Changes in the Rate of Intermittent Mechanical Stimuli. Paper delivered to the Eastern Psychological Association by Mowbray, G.H. and Gebhard, J.W., at Atlantic City, N.J., March, 1956.
12. Geldard, F.A., Hearing through the Skin, Research Reviews, Office of Naval Research, Washington, D.C., Ocdober 1954, pp.15-20.

13. Geldard, F.A., The Human Sense, John Wiley and Sons, N.Y., 1953.
14. Selected Papers on Human Factors in the Design and Use of Control Systems, edited by H.W. Sinaiko, Dover Publications, N.Y. 1961.
15. Multijunction Therapy Identification, by I. Moon, Collected Papers of the Members of the International College of Applied Kinesiology, May 1983.
16. Demonstrated at Meridian Kinesiology Seminar by I. Moon, Oct, 1980
17. TAO-TE-CHING, LAU-TZU, B.C. 5C

VISION ACCCOMMODATION
TO
BI-FOCAL CONTACT USAGE

BY

Emil F. Morlock, D.C.

Abstract: Soft contact lenses and their effect on visual adaptation when using a new method of usage.

In recent years hard, and more recently soft, contact lenses have become a very acceptable choice for vision problem solving without the inconvenient use of glasses, where one accommodation was needed. Now a new adaptation using only one hard or soft contact lens has come on the market, designed to accommodate both long and short vision.

An optometrist with whom I spoke states that approximately 40% of the potential patients can successfully adapt to this type of vision correction. The basic principle involved is that one lens (or eye) accommodates to long vision, while the other lens (or eye) accommodates to short vision. Stated differently, one eye will correct whatever the vision problem may be, and the other eye will require no lens for correction because vision fits within normal range.

The case that I have observed was of the type where one lens was used to adapt for short vision, while no lens was needed for the patient's normally tested long vision. After three separate examinations, one appropriate lens was fitted to the recessive eye, immediately clearing up the close vision problem. At this time, however, the long vision

Page 2 - Morlock - VISICN ACCOMMODATION

was altered, with blurring, visual spotting, and depth perception impaired, causing mild disorientation.

Testing for cranial lesions showed a sphenobasilar flexion fault which, upon correction, eliminated approximately 75% of the visual problems and disorientation. Subsequent removal of the lens did not reverse or change the cranial pattern, but on each reinsertion of the lens the cranial lesion was recreated.

Over a period of 6-8 weeks, as the lens was worn for greater periods of time, the cranial lesion accommodated more readily. If, however, the lens was not worn for a day or two, and regular glasses were used, the cranial lesion reappeared when the contact was reintroduced, creating once again lessened depth perception and disorientation problems. Daily use of the lens was recommended; and after three months, the results seem to be adequate. The patient now experiences only very mild distance blurring and spotting which the patient feels is more acceptable than wearing eyeglasses.

Conclusion: Any lack of success of this method of contact lens usage is, in my opinion, partly attributable to the fact that many patients do not accommodate to the visual disturbances spontaneously because of cranial faults. Therefore, AK procedures to correct any cranial faults can be of great value to assist patients to adapt to this new method of vision correction.

A STUDY IN PLETHYSMOGRAPHY UTILIZING APPLIED KINESIOLOGY
TECHNIQUES FOR THE EVALUATION AND TREATMENT OF
TEMPORAL MANDIBULAR JOINT DYSFUNCTION

Richard A. Mowles, D.C.

INTRODUCTION

Plethysmography has been mentioned in the scientific literature as a diagnostic screening tool for temporal mandibular joint dysfunction (TMJ)¹.

As Applied Kinesiologists, we have established an accepted protocol for the evaluation of the TMJ². This protocol is centered around the established principle of therapy localization (TL) to a joint and then testing a muscle to detect a change in strength through manual muscle testing. The TMJ is put in different positions to evaluate a possible problem as revealed through changes in muscle strength. These findings are correlated with the patient's history, joint noises, pain patterns and deviation of the mandible. The latter can be objectively monitored and studied with the kinesiograph³.

Dental specialists in TMJ problems can utilize more sophisticated objective procedures such as TMJ radiographs, tomograms and arthrograms for the evaluation of this complex joint^{4,5}.

Since we are physicians that treat the "whole" person rather than a "part" of that person, we realize the interplay of many forces on different levels (mental, chemical, structural) to produce an imbalance within the nervous system. Sometimes this interplay is so strong that it involves more than one healing discipline to stabilize a patient's problem. The TMJ is by far no exception in its complexity and influence over the nervous system. The clinical importance of properly evaluating and treating this joint leads to many significant, and resolvable, complex problems.

Duffy⁶ explained the importance and sometimes necessity of a dentist trained in TMJ stabilization techniques. Dental assistance in treating TMJ problems with Applied Kinesiology is sometimes necessary to stabilize or correct a problem. The more objectively that we can evaluate a problem and monitor a problem's response to treatment, the higher chances are for resolution of that problem. This paper will examine the utilization of plethysmography with TMJ problems and the usefulness of this clinical technique in evaluating the response of treatment with Applied Kinesiology techniques. This paper will also examine plethysmography as a diagnostic screening tool for the patient requiring dental consultation.

METHODS

A plethysmograph is an instrument which can measure arterial, venous, and capillary blood flow either in large vessels or the tips of the fingers and toes. The pulse pressure, blood volume, and rhythm can be quantified and recorded. The plethysmograph⁷ used in this clinical study utilizes a light source photocell combined in the same detection unit which can be strapped in place or held in place over the area of study. A pulse recording can be visualized on a CRT oscilloscope and also recorded on standard EKG paper.

In this study, there was one group. This group was comprised of twelve subjects who presented with symptoms of TMJ dysfunction. Some of these symptoms were headaches, clicking noise, neck pain, etc. These subjects were examined with the plethysmograph and also with standard Applied Kinesiology testing

FIGURE 1

procedures utilizing therapy localization. The procedure for incorporating the plethysmograph involved the work of S.D. Smith⁸. Smith's anatomical area of examination was the superficial temporal artery. (Figure 1) The artery is palpated for it's location over the TMJ and a photo electric cell is placed over this designated area. While the photo electric cell is held over the superficial temporal artery, the subjects are instructed to place their mandibles in five positions: a) relaxed, neutral, b) full extension, c) right lateral deviation, d) left lateral deviation, and e) closed in centric occlusion. Five readings were taken and recorded in both the right and left side for a total of ten readings per subject.

The evaluation of the pulse volume recording (PVR) with a normal subject shows rhythmic pulsations which correspond to the action of the heart. (Figure 2) The PVR which is normal shows a sharp upstroke (anacrotic limb) and a slower downstroke (catacrotic limb) interrupted by a notch and a dicrotic wave. (Figure 3) An abnormal PVR will show arrhythmic pulsations which don't correspond to the action of the heart. (Figure 4)

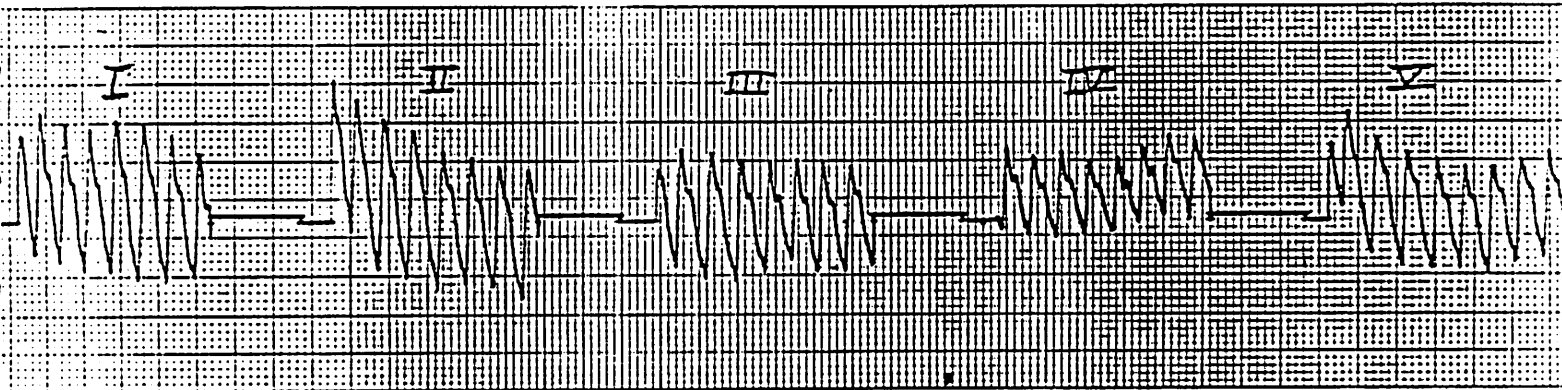


FIGURE 2

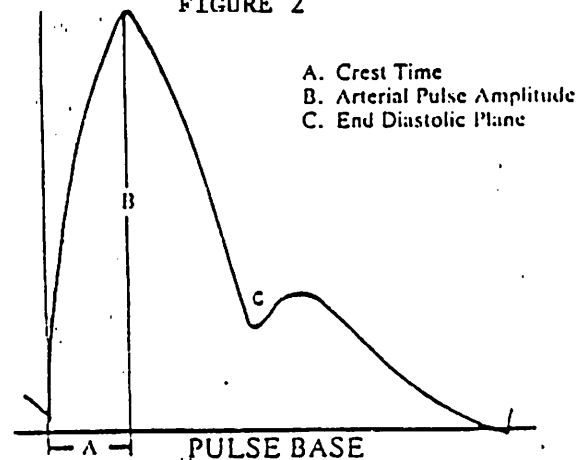
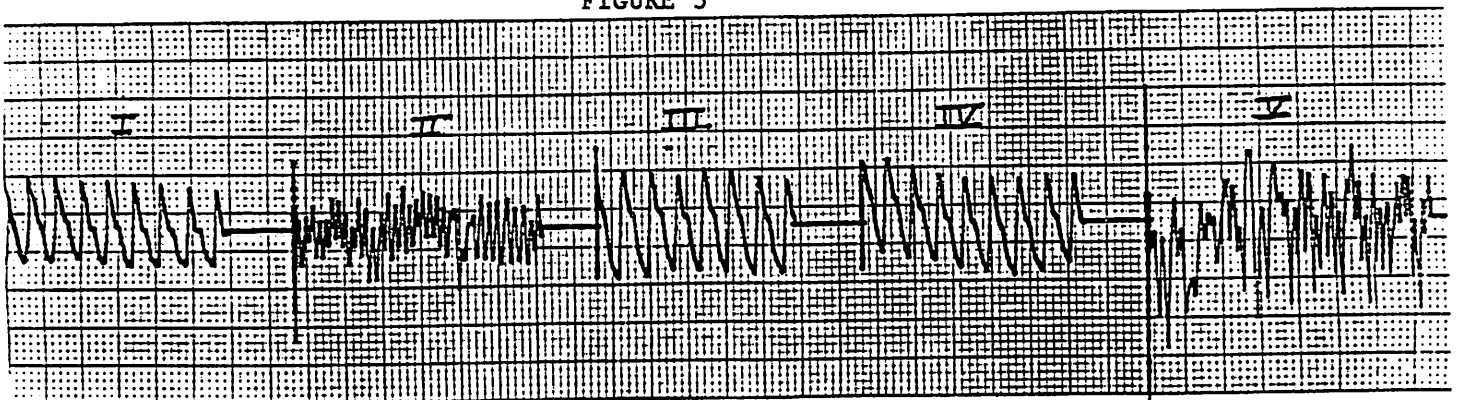


FIGURE 3



It is very important that the placement of the photo electric cell be steady over the superficial temporal artery. Any movement of this cell during the study will influence the recording, giving an erratic pulse wave pattern. This potential problem was eliminated by the use of an elastic strap with velcro fasteners which held the photo electric cell firmly over the superficial temporal artery.

Every subject who exhibited positive indications of TMJ dysfunction were treated with standard Applied Kinesiology treatment techniques. This treatment protocol focused on correcting any cranial faults, sacral faults, pelvic catagories, cervical subluxations, hyoid imbalances, ligament interlink problems, cranial stress receptors, and any muscle imbalances (masticatory). The study tried to confine the treatment procedures within those areas of structural problems. For example, chronic hypoadrenia can be a major factor in stabilizing the TMJ⁹. However, to keep the variables in this study minimal, these subjects were screened to evaluate those with primarily structurally dominant problems. This screening involved a case history, physical and kinesiological examination.

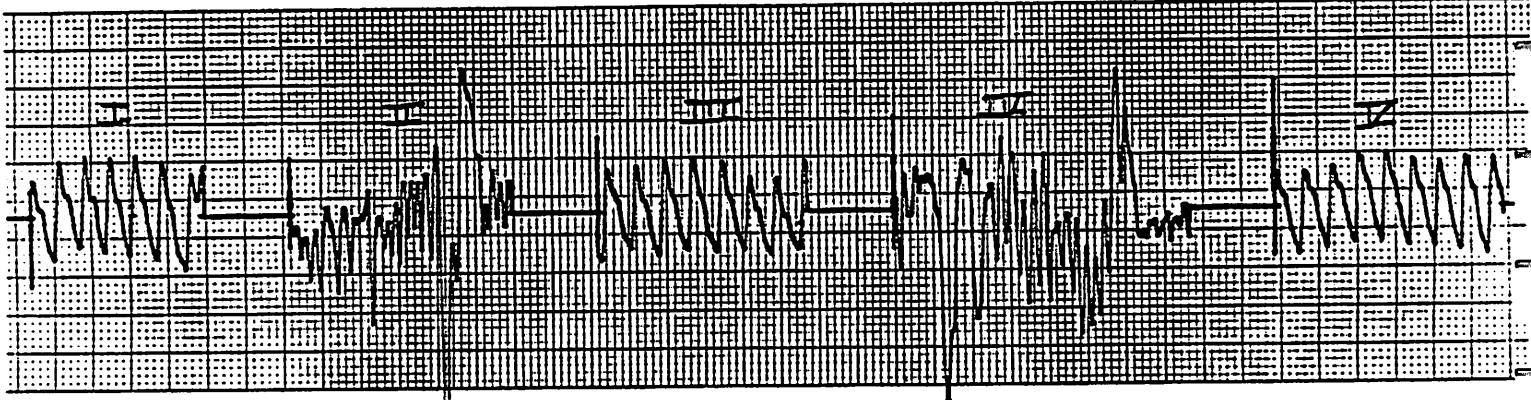
These twelve subjects were seen for five treatments. There was approximately one week between treatments. After the fifth treatment an objective plethysmographic and kinesiological evaluation was performed. Those subjects who continued to show objective and subjective complaints after the fifth treatment were referred to a dentist trained in craniomandibular problems. This specialist, if necessary, could more extensively evaluate the TMJ with tomograms,

spot x-rays, and in certain cases, arthrograms for a more definitive diagnosis of the problem.

RESULTS

The results of this study are shown in Tables I and II respectively. Each subject is listed by numbers. A listing of abnormal PVR tracings are given for each subject and the position of the TMJ that illicited that tracing. The presence or absence of positive therapy localization is noted for each subject. There is also a correlation of major symptoms with each subject studied. Table II gives the same listings with changes noted after a five week treatment period. In this study after a five week treatment period, four of the subjects were referred to a dentist for further evaluation. One of these subjects had an anterior disc displacement while the other three subjects had advanced degenerative joint disease of the TMJ.

Several plethysmographic patterns are noted as reference for study. Figure 4 shows a pattern depicting an abnormal PVR tracing at occlusal positions II and V respectively. These positions represent extension and closing (clenching) of the TMJ. The important diagnostic clue here is the erratic pulse wave pattern. In Figure 5, there is abnormal PVR tracing in extension and left mandibular deviation. Again there is an erratic pulse wave pattern. However, in Figure 6, the same subject is tested as in Figure 5, but after a period of five weeks of being treated once a week with Applied Kinesiology techniques. The pulse waves are regular and rhythmic in their pattern. Here is an objective clinical indication of change in blood volume after utilizing

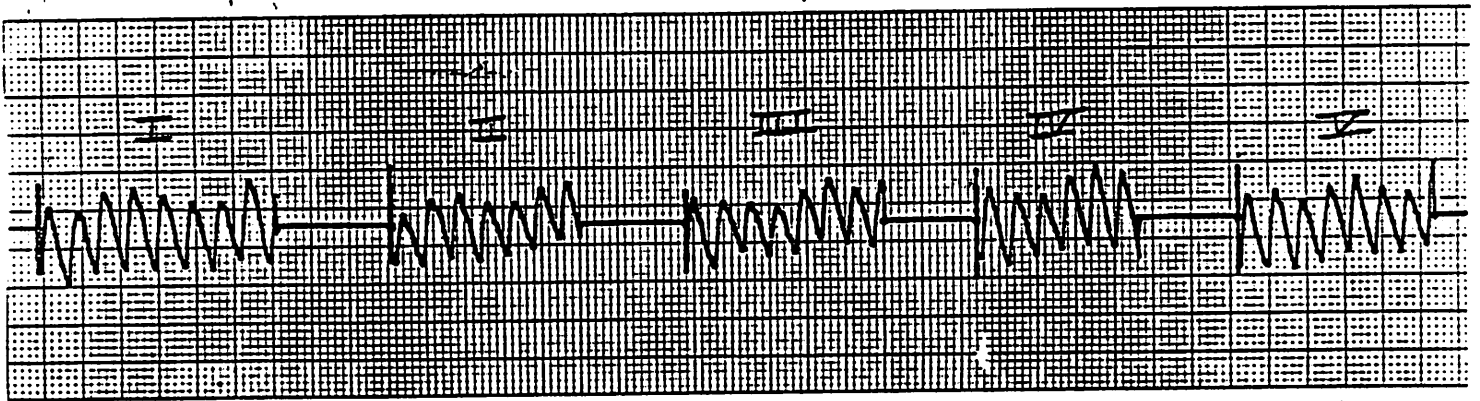


23228

Form No. 26-100

Printed in U.S.A.

FIGURE 5



Printed in U.S.A.

FIGURE 6

EXPERIMENTAL GROUP INITIAL EVALUATION

TABLE 1

SUBJECTS	PVR ABNORMAL OCCLUSAL POSITION	THERAPY LOCALIZATION	SYMPTOMS						
			1	2	3	4	5	6	7
1	I, II	+	+	-	-	+	+	-	-
2	I, III, V	+	+	+	-	+	-	-	-
3	I, III	+	-	+	-	+	+	-	-
4	I, III, IV	+	+	-	+	+	-	-	+
5	I, II, III, IV, V	+	+	+	+	+	+	+	-
6	II, V	+	-	+	-	+	-	-	-
7	II, IV	-	-	+	-	+	+	-	-
8	III, IV	+	+	-	-	-	+	-	-
9	I, II, IV	+	+	+	-	+	+	+	-
10	II, V	+	-	+	-	+	-	-	+
11	I, II, III, IV, V	+	+	-	+	+	+	-	-
12	II, III, IV, V	+	+	-	+	+	-	-	-

KEY

PVR OCCLUSAL POSITIONS

- I = Neutral
- II = Extension
- III = Right lateral deviation
- IV = Left lateral deviation
- V = Closed

THERAPY LOCALIZATION

- = Negative symptoms
- + = Positive symptoms

SYMPTOMS

- 1. Headaches
- 2. Neck pain
- 3. Audible popping
- 4. Clicking (stethoscope)

- 5. TMJ pain on palpation
- 6. TMJ pain
- 7. Vertigo

EXPERIMENTAL GROUP AFTER FIVE TREATMENTS

TABLE 2

SUBJECTS	PVR ABNORMAL OCCLUSAL POSITION	THERAPY LOCALIZATION	SYMPTOMS						
			1	2	3	4	5	6	7
1	II	-	-	-	-	+	-	-	-
* 2	I, II, III	+	+	+	-	-	-	-	-
3	II, III	+	-	-	+	-	-	-	-
4	-	-	-	-	-	-	-	-	-
* 5	I, II, III, IV, V	+	+	+	+	+	+	+	-
6	-	-	-	-	-	-	-	-	-
7	-	-	-	-	-	-	-	-	-
8	-	-	-	-	-	-	-	-	-
9	-	-	-	-	-	-	-	-	-
10	-	-	-	-	-	-	-	-	-
* 11	I, II, III, IV, V	+	+	-	+	-	+	-	-
* 12	II, III, IV, V	+	+	-	-	+	-	-	-

DENTAL REFERRAL *

Applied Kinesiology procedures on the TMJ. Figure 7 shows the PVR pattern noted in subjects five and eleven. This pattern was the same after five weeks of treatment. The erratic PVR tracing was noted in every mandibular position. After being referred to a dentist for further evaluation, these two subjects were diagnosed as having advanced degenerative joint disease of the TMJ. An interesting finding in this study showed that those subjects who revealed abnormal PVR tracings in three or more mandibular positions were found to have more intracapsular problems than extracapsular ones. In other words, the possibility of plethysmography in the differential diagnosis of intra versus extracapsular TMJ problems has important significance. A larger scale study examining this pattern would be excellent in this regard and any findings would be deeply appreciated by this author. This study showed a high correlation (91%) between therapy localization and abnormal plethysmograph readings.

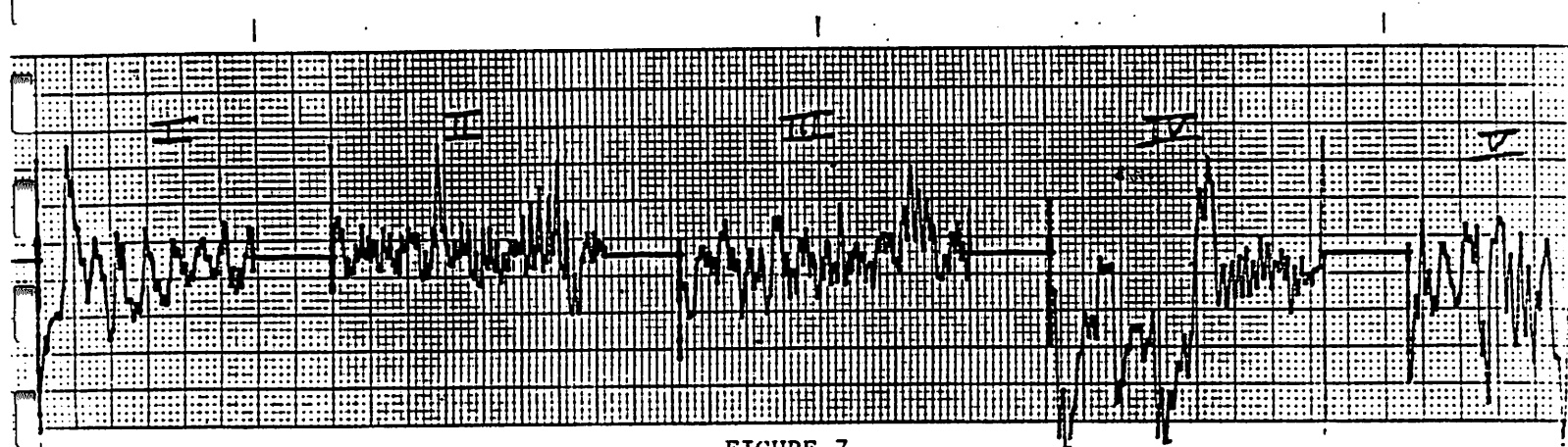


FIGURE 7

DISCUSSION

This study has examined the role that plethysmography plays in the screening of temporal mandibular joint problems. The study also has shown how Applied Kinesiology treatment procedures can be more objectively documented with the use of plethysmography. The physician has to be able to measure and interpret whether treatment is working for that patient. Therapy localization tells you there is a problem but not the nature of that problem. Any clinical tool to collaborate with muscle testing adds to the physician's knowledge of his patient's condition. This paper also added the possibility that plethysmography can be utilized to differentiate internal derangements of the TMJ from other external factors affecting its proper function. This is very important in being able to know whether the assistance of a dentist would be necessary in treating the problem. The exact mechanism in which the TMJ affects the superficial temporal artery is not exactly known. The superficial temporal artery lies on the capsule of the TMJ posterior to the neck of the mandible¹⁰. The anterior auricular and transverse facial arteries arise from the superficial temporal artery in the region of the mandibular condyle. Some considerations may include the ramifications of structural changes in the retrodiscal region of the joint itself or structural changes within the capsule¹¹. It is this author's opinion that increased muscle tonus in the temporalis muscle affects, in some way, the intravascular pressure within the superficial temporal artery. These ideas are speculative without more adequate investigation and research.

BIBLIOGRAPHY

1. Smith, S.D., "Vascular analysis in temporomandibular orthopedics quantifying blood flow related to occlusal dynamics," Osteopathic Medicine, pg. 64-75, August, 1980.
2. Walther, D.S., Applied Kinesiology, The Advanced Approach to Chiropractic
3. Walther, D.S., Applied Kinesiology, Volume II, pg. 319-325.
4. Farrar, W.B. and McCarty, W.L., Jr., Journal of Alabama Dental Association, 63: pg. 20-21, 1979.
5. Murphy, W.A., "Arthrography of the temporomandibular joint," Radiologic Clinics of North America, 19 (2): pg. 365-378, June, 1981.
6. Duffy, D.H., "A Guide for the Chiropractor and Dentist in the Treatment of TMJ problems," ICAK Collected Papers, Winter, 1981, pg. 141-143.
7. Virginia Deignostic Instruments, 14210 Broad Oaks Court, Midlothian, Virginia 23113.
8. Smith, S.D., "Vascular analysis in temporomandibular orthopedics quantifying blood flow related to occlusal dynamics," Osteopathic Medicine, pg. 64-75, August, 1980.
9. Schmitt, W.H., Jr., Common Glandular Dysfunctions in the General Practice, Applied Kinesiology Study Program, 1926 Overland Drive, Chapel Hill, North Carolina, pg. 44, 1981.
10. Montgomery, R.L., Head and Neck Anatomy with Clinical Correlations, New York: McGraw-Hill Book Co., 1981.
11. Bernstein, A.K., Bahr, T.J., Pomeroy, K.L., Birchett, L.N., Ragouin, N., "The Relationship of TMJ Dysfunction to Pulse Volume Rate of the Superficial Temporal Artery," The Journal of Craniomandibular Practice, Vol. 1, No. 2, pg. 60-64, 1983.

Magnetic Deficiency

Robert Perolman, D.C.

Much information has been compiled regarding the therapeutic application of magnetic energy. In my opinion it is advisable to use a before and after test to determine the proper energy requirement, rather than to treat empirically.

I have found just such a test. It's very simple and accurate. From the test I have made some useful observations.

1. The body seems to become deficient in magnetic energy. This is apparent when a particular part of the body shows the need for both N and S polarities.

2. The body seems to "soak up" the energy until it is satiated. Leaving the magnet on the body for a long period of time will not cause an imbalance of polarity.

3. The proper polarity requirement is often accompanied by a gauss requirement. This means it's necessary to have different gauss magnets available if you are to be accurate in diagnosis and treatment.

4. I have found two ways of misapplication of magnetic energy that can injure the patient.

- a) A very heavy gauss, such as 30,000 G.
- b) Electro-magnetic devices used incorrectly.

Magnetic Deficiency

2

The diagnostic test I use is called the tongue in cheek test. The patient presses the tongue against the inside of the cheek. Simultaneously, an intact muscle is tested while the magnet is placed on the area in question. If you are testing for N polarity deficiency, the tongue is placed against the right cheek and the N pole is placed on the area in question.

The tongue against the left cheek while the magnet's S pole is held against the area of the body is the other polarity test. It is important to conduct the test very quickly once the magnet touches the skin. If too much time is taken, the indicator could be lost.

Treatment consists of using the proper polarity. If the intact muscle goes weak with the tongue against the right cheek, N pole is needed. Retest at intervals of twenty seconds to determine when treatment is sufficient. Sometimes several minutes are required to bring this about.

Detecting Parasites

Robert Perolman, D.C.

It is estimated ninety-three percent of the people experiencing parasites at one time or another. Travelling to foreign countries, especially to Mexico, requires caution and preventative measures.

I have found an excellent test for the presence of parasites. It is a finger tip diagnostic test that is quite accurate, and easy to do in the office. The type of parasite or where it exists in the body is not revealed by the test. It simply indicates parasites are present.

Using an intact muscle, have the patient place the knife edge of both hands together, palms facing skyward. The hands are then closed to an angle of about 45°. If the muscle tests weak, there are parasites present. Place a natural vermifuge under the patient's tongue, wait 30 seconds and perform the test again. If the vermifuge is acceptable, the muscle will test strong.

I use this test on everyone, on every visit, and am surprised how many patients test positive. The test is also good for monitoring the progress of the patient.

A Test For Blood Builder Deficiency

Robert Perolman, D.C.

As you know, bilateral T.F.L. weakness is an excellent test for anemia. There is however, a condition which precedes anemia. I call it blood builder deficiency. Finger tip diagnosis reveals a simple, useful test for picking up this deficiency in the early stages.

Use an intact muscle. The patient places the knife edge of both hands together, palms flat and facing skyward. If the muscle weakens the test is positive. The deficiency exists. Place a blood building material under the patient's tongue, wait 30 seconds, and retest with the hands in the proper position. The muscle will test strong again. I find it takes up to 30 seconds for sublingual absorption to take place. On the other hand, transcutaneous absorption is almost instantaneous.

I conduct this test on everyone on every visit.

ABSTRACT: These concussion techniques demonstrate a specific procedure that can be used as an adjunct to kinesiology methods.

DISCUSSION: These are a review of some of the areas that can be used in emergency situations of the heart, stomach and gall bladder problems.

TO EVOKE: To evoke the reflex named, concussion is to be made on the tip or preferably on both sides of the spinous process of the indicated vertebra. The blows should be rebounding and sudden, and must be punctuated by sufficient pause to allow the influenced viscera time to recoil. An average of 60 strokes per minute seems to produce best results. Concuss for about five seconds, pause and equivalent period of time and repeat. The number of repetitions also is to be determined by the quality of the patients reflexes, but treatment on any given center should not be prolonged beyond two minutes, since over-stimulation produces sedation and finally exhaustion.

HEART: SIXTH AND SEVENTH CERVICAL-----Increases vagal tone, contracts heart, blood-vessels and viscera.

BETWEEN THIRD AND FOURTH

THORACIC-----Diminishes vagal tone, dilates heart and blood-vessels.

STOMACH: THIRD THORACIC-----Dilates cardia, contracts pylorus.

FIFTH THORACIC-----Contracts cardia, dilates pylorus.

GALL BLADDER: FOURTH TO SIXTH THORACIC---Contracts and empties gall bladder and pancreas.

NINTH THORACIC--- Dilates gall-bladder and duct.

- CONCLUSION:**
- 1.) Be certain to use sudden blows at 60 per minute.
 - 2.) Check patient reflex response to varify amount of stimulation. (i.e. if heart area concussed, check pulse change.)
 - 3.) Don't over-stimulate: usually 2 minutes is adequate.
 - 4.) Use care, skill and judgement, remember this is an adjunct to other therapeutic methods.
 - 5.) Refer to Collected papers of 1982, pages 233-235 and Collected papers of 1983, pages 441-443 for complete study of these reflexes.

- TECHNIQUES:**
- 1.) These techniques have been tested and used:
 - a. Rose City Chiropractic Clinic, Portland, Oregon
 - b. Baker City Chiropractic Clinic, Baker, Oregon
 - 2.) Notes compiled from J.T. DuPlessis, N.D. based on findings of Drs. Albert Abrams and George S. White. Seminar, Portland, Ore. Early 1940's.

ENTROPY AND THE TRIAD OF HEALTH

by

Angelica Redleaf, D.C. and Roger S. Redleaf, D.C.

ABSTRACT: Entropy is a concept used in chemistry and physics which can be extrapolated to the biological and clinical sciences. It is defined as "a measure of randomness, chaos or disorder in a statistical or mechanical system; also, a measure of the energy unavailable for use in a thermodynamic system".¹ Entropy simply means that everything in the universe is constantly moving toward a greater state of disorganization. This paper will show how entropy specifically affects the triad of health and how an awareness of entropy enables the applied kinesiologist to practice more effectively.

Entropy tells us that everything in the universe, including our bodies, is constantly moving toward a state of greater disorder. The functional and pathological breakdown of systems and mechanisms in the body demonstrates entropy. As one author put it, "Clocks fall apart, but pieces of metal don't fall together spontaneously to form a clock."²

On the structural side of the triad, we see the effects of entropy daily. Patients have chronic musculoskeletal conditions, which are often a result of a steady accumulation of subluxations. These create a dysponesis in the body, or a kind of "static" in the body's biocomputer.

Biochemically and nutritionally similar entropic forces are at work. When nutritional deficiencies exist and dietary choices are poorly made, the end result is disorder in our biochemical systems. This can be manifested as poor digestion, assimilation, energy transfer and conversion. Of course, structural disorders are often responsible through their neurological relationships for biochemical imbalances, also.

Likewise, in the mental-emotional realm we see how relationships between people often suffer, unless all the parties involved work to communicate clearly and openly. We are all constantly dealing with entropy, some better than others. With sufficient consciousness, motivation, knowledge and self-discipline, we can counteract entropy by creating more order in our bodies and our relationships. "Information and structure are the mortal enemies of entropy because they introduce order."³ When people are unaware of entropy, it tends to have a greater negative effect on them. Concomitantly, when an awareness of entropy is developed, it loses some of its power to create stress in people's lives.

ENTROPY AND THE TRIAD OF HEALTH...Redleaf
PAGE 2

We have all seen that stress affects every patient who walks into our office and how difficult it can be to educate our patients to deal better with stress. We propose a solution: That taking personal responsibility for our lives and our health, and whenever possible helping others to do the same, is a basic strategy in counteracting entropy's effects. In our practice we educate patients to bring more order into their lives, creating "negative entropy". Meditation, proper diet, good eating habits, appropriate exercise, proper lymphatic drainage and elimination are a few of the ways that create more organization, health and harmony in the body. When a patient's position in this large entropic web is appreciated, stress-related syndromes, such as TMJ and functional hypoadrenia, can be seen to be the end result of failing to properly deal with entropy. When our diagnostic considerations include an understanding of whether our patient is successful or unsuccessful in dealing with entropy, our healing abilities will increase.

Rupert Sheldrake's recent "Morphogenic Field Hypothesis", which helps to explain the "Hundredth Monkey Phenomena" ⁴, gives us the theoretical framework for balancing entropy. When a critical mass of "consciousness" is created in a population of living organisms (whether they be potato plants, monkeys or people), more order is created, and entropy is counteracted. Entropy, like gravity, is all around us. When we begin to "recontextualize" our world view to include entropy and begin to see its effects clearly, we create more order in our world, thus optimizing health and personal fulfillment.

Creating good relationships with friends, your spouse or significant other, and your office staff can be hard work. Entropy causes that natural tendency toward communication breakdown: Things go unsaid, when they should be said. When we do not have regular staff meetings at our office, efficiency tends to drop; entropy at work!

REFERENCES

- ¹ Rheinhold, H. and Levine, H., "Talking Tech, A Conversational Guide to Science and Technology", Quill Publishers, New York, 1983, p 128
- ² Rheinhold & Levine, "Talking Tech....", p 130
- ³ Rheinhold & Levine, "Talking Tech....", p 131
- ⁴ Sheldrake, Rupert, "A New Science of Life", J. P. Tarcher, Inc., Los Angeles, 1981
Keyes, Ken, "The Hundredth Monkey", St. Mary's Press, Kentucky, 1982
Goodheart, George, D.C., Address at ICAK Winter Meeting, December, 1983

The Trapezius Reflex

By Marc S. Rosen D.C.

Abstract:

Therapy localization, vertebral challenge and a respiratory adjustment have identified a unique pattern of spinal subluxations. The vertebrae involved are those that are associated with an active trapezius reflex. The characteristics of these reflexes are reviewed for the benefit of those practitioner's who may not be familiar with this particular aspect of sacro occipital technic.

Each trapezius reflex is associated with specific thoracic and a specific lumbar vertebrae. An active reflex is identified, first by palpation, then confirmed by therapy localization.

Once it has been established that a reflex is active, each associated vertebrae is challenged for the presence of a subluxation. The author has observed that the challenge that is most frequently positive is one that applies an inferior and slightly anterior pressure to the spinous process.

This inferior-anterior challenge of the spinous process is usually assisted by inspiration. The inspiration assist suggests the use of a respiratory type adjustment. A respiratory adjustment of all vertebrae associated with the active reflex will abolish both the palpatory finding and the therapy localization of the reflex.

Introduction:

When Goodheart assigned a muscular significance to the palpatory findings U.M.S.,L.L.L., the category system was incorporated

Trapezius Reflexes
Rosen ... page 2

into applied kinesiology.

Sacro occipital technic and applied kinesiology are the only modern chiropractic methods that deal with the cranial sacral respiratory mechanism. Despite a difference in terminology, the S.O.T. designation SB plus, SB minus is actually a sacral respiratory fault, inspiration/expiration assist.

Wieczorek's correlation of bilateral occipital fibers with vertebral fixations has adapted yet another S.O.T. "indicator" to the practice of applied kinesiology.

No attempt has been made to fully explore this theoretical and clinical common ground. That would require a separate paper. These few examples should lend some substance to the statement; there is a practical, clinical parallel between S.O.T. and applied kinesiology.

The discussion that follows is a potential contribution to the continuing evidence that that parallel is applicable to the day to day practice of applied kinesiology.

Discussion:

Part I the trapezius reflex in S.O.T.

In the text The Philosophy, Art and Science of Sacro Occipital Technic, (published by M.B. De Jarnette, Nebraska City, 1967), Dr. De Jarnette states ... (pages 29-31)

"the trapezius reactive areas are always associated with musculo-skeletal problems resulting from an over-stimulated pair of spinal nerves ..."

"any trauma, disease or function which narrows the intervertebral foramina, resulting in cartilage thinning and compression, will

Trapezius Reflexes
Rosen ... page 3

interfere with the spinal nerve root and will in turn through the adaptation of the musculoskeletal system react into a specific area of the trapezius muscle ..."

"the trapezius reactive areas develop when a specific stimulus from one vertebrae sets off a musculoskeletal reaction in one group of muscles or when multiple areas of vertebral stimulus attack multiple areas of musculoskeletal function ..."

"no muscle can contract and endure that contraction past a normal period of time or for a reasonable purpose without exciting some area of the trapezius triangle ..."

A trapezius reflex may be either active or reactive. The vertebral associations are the same. It is the palpatory findings, neurological mechanisms and type of tissue dysfunction that differs.

According to De Jarnette, the trapezius muscle is capable of monitoring dysfunction of either skeletal muscle or bone.

The reflex elements within the intrinsic muscles of the spine, (presumably the golgi tendon organ, intrafusal receptors in the rotatores longus and brevis), are thought to be responsible for the formation of an active trapezius reflex.

The reflexes that are responsible for the formation of a reactive trapezius reflex originate from Ruffini's spray endings. Consequently, it is the pedicle area of the spinal cord segment that relates to the reactive reflex.

Recall that the trapezius muscle is innervated by the spinal accessory nerve. De Jarnette feels that it is this cranial innervation that contributes to the diagnostic design of the trapezius muscle.

To locate the reflexes, imagine that there is a rainbow

Trapezius Reflexes
Rosen ... page 4

beginning at the acromioclavicular articulation and ending at the transverse process of the first dorsal vertebrae.

The patient is usually in a prone position. The doctor should be seated at the head of the table. The reflexes are best palpated with the tips of the thumbs. There are seven reflexes on the right and seven on the left. Begin the palpation at trapezius one, located just medial to the acromioclavicular joint. Palpate from trapezius one to seven, dividing the rainbow into seven equally spaced reflex areas.

De Jarnette recommends that approximately four pounds of pressure be applied to trapezius one. Decrease the degree of pressure by one half pound as you palpate from trapezius one to seven. Trapezius one receives four pounds, two three and a half, three receives three pounds of pressure etc.

The degree of pressure is important as it differentiates an active from a reactive reflex.

An active reflex will palpate as a firm, painful nodule. It will remain firm when the indicated amount of pressure is applied.

A reactive reflex responds to the specified amount of pressure by firming up or forming a "mound", when the pressure is maintained for ten to fifteen seconds.

Referring to the chart, note that each reflex is associated with specific thoracic and a specific lumbar vertebrae.

If the reflex is active, (nodule no mound), then the spinous processes of the indicated vertebrae should be palpated. The palpation should direct a firm pressure to the spinous in an anterior

Trapezius Reflexes
Rosen ... page 5

direction. In S.O.T., a pisiform contact would be made over the most painful spinous process. The vertebrae is thrust to the anterior with a recoil type adjustment.

For reactive reflexes, (those that mound), the notch between the spinous and transverse process is palpated for pain. The most painful segment is then x-rayed. The pedicle is observed for an oblong configuration or for destruction. De Jarnette feels that a radiographic change in the appearance of the pedicle (when associated with a reactive reflex) may indicate malignancy.

In this case, the adjustment is delivered so as to separate the spinous and transverse processes.

This completes the review of the S.O.T. approach. It is recommended that you consult De Jarnette's yearly manuals and/or attend one of his seminars. Contact Dr. M.B. De Jarnette, Box 338 Nebraska City, Nebraska 68410

Part II the trapezius reflex in applied kinesiology

Wieczorek has established that bilateral findings, whether they involve the occipital fibers, T.S. line or trapezius reflexes, are a reflection of a fixation at the associated spinal levels.

This is one possible utilization of the trapezius reflexes in applied kinesiology i.e. as an indicator of fixations.

A second use is as an indicator for a subluxation pattern. Only the active form of the reflex is used in this capacity.

The trapezius reflexes are palpated in the usual fashion.

Trapezius reflexes
Rosen ... page 6

If an active reflex is located, then that reflex should be therapy localized. If the therapy localization is positive, then proceed to challenge each vertebrae that relates to the active reflex. For example, there is a palpable nodule at trapezius six. It is firm and painful and remains unchanged after one and one half pounds of pressure has been applied, and maintained, for fifteen seconds. A strong indicator becomes weak when the nodule is therapy localized.* Referring to the chart, trapezius six relates to T8 and L4. Contact the spinous process of L4 and challenge with an inferior (caudal) and slightly anterior pressure. If the challenge results in weakness of a previously strong indicator, have the patient take a deep breath and hold that breath while you re-challenge the spinous of L4. If the challenge has been abolished by the inspiration, then, adjust L4 with a respiratory adjustment. To make that correction, grasp the spinous process between your thumb and index finger, (your fingers should point in a caudal direction). The contact is firm but not painful. As the patient inhales, slowly move the spinous process inferior and slightly anterior. Repeat during four or five inspirations, the contact is released but not broken while the patient exhales. Re-challenge to confirm that the subluxation has been corrected. Proceed to T8 and repeat the procedure.

In S.O.T. the cervical spinal levels have not been associated with a trapezius reflex. With this particular pattern of subluxations, I have found that the cervical is involved. Trapezius one

* to establish that the reflex is a "priority" i.e. one that should be treated on that office visit, the therapy localization must be abolished by inspiration (as presented to I.C.A.K. by Sheldon Deal)

Trapezius Reflexes
Rosen ... page 7

relates to cervical one, trapezius two relates to cervical two etc. The appropriate cervical will challenge in the same direction as did the thoracic and lumbar. The challenge will be abolished by inspiration. The respiratory adjustment is also the same.

Returning to trapezius six. After L4 and T8 were challenged and adjusted, C6 would be evaluated as described above.

There is a second cervical segment that will require your attention, the lovett of the lumbar. In this case, C2 as it is the lovett of L4.

Following this procedure, there will be a marked softening of the nodule and the reflex will no longer therapy localize.

There is one additional concept that should be mentioned. And that is, Wieczorek's "opening for correction".

Just as there is a lovett relationship between L4 and C2, there is a "reciprocal" relationship between the vertebrae that are common to a trapezius reflex, (T8 and L4 are reciprocals). "Opening for correction" applies to both lovett and reciprocal type relationships.

If the original challenge of L4 was negative, but the trapezius reflex was an active one, you would challenge T8. If that challenge was positive, then, it would be adjusted. Following the adjustment, you would re-challenge L4. This second challenge will most likely be positive. The adjustment of T8 opened L4 for correction.

When a trapezius reflex is active, four spinal levels will require correction of a subluxation. Initially, only one of the four may reveal a positive challenge. After the indicated adjustment, either it's lovett or it's reciprocal will now challenge.

Trapezius Reflexes
Rosen ... page 8

The respiratory adjustment actually moves the spinous process in the direction that it would normally move during inspiration. Based on a rebound mechanism, an inferior challenge would indicate that the spinous was subluxated superior and therefore unable to move inferior upon inspiration.

Perhaps the formation of the reflex is a reflection of stasis of the cerebral spinal fluid. De Jarnette did refer to that concept in his 1967 text.

I have also considered the possibility of an interosseous type subluxation with holographic implications. The spinous process may be subluxated in relation to the vertebral body. If De Jarnettes neural theories are correct, an interosseous subluxation of the spinous process could easily affect the intrinsic muscles of the spine.

Summary:

This particular aspect of S.O.T can be easily incorporated into an applied kinesiology practice. May I suggest that you begin by identifying an active reflex only. Treat the patient as you normally would, then re-evaluate the trapezius. If you choose to deal with the spinal subluxation pattern, be certain that all lovetts and reciprocals are challenged according to the concept of "opening for correction".

Trapezius one - T1,2,10 - 4 lbs. pressure
Trapezius two - T3,11,12 - 3½ lbs. pressure
Trapezius three - T4,5 L1 - 3 lbs. pressure
Trapezius four - T6, L2 - 2½ lbs. pressure
Trapezius five - T7, L3 - 2 lbs. pressure
Trapezius six - T8, L4 - 1½ lbs. pressure
Trapezius seven - T9, L5 - 1 lbs. pressure

REFERENCES

De Jarnette, Major Bertrand, 1967, The Philosophy, Art and Science of Sacro Occipital Technic, Nebraska City, Nebraska

De Jarnette, Major Bertrand, 1978, Sacro Occipital Technic, Nebraska City, Nebraska

Wieczorek, Stanley, 1979-82, Seminar notes, W.I.T. Seminars, Rochester, N.Y.

Postural Evaluation of a Group of Women
Before and After a Weekly "Slimnastics"
exercise class - a preliminary report

By Dr. Marc S. Rosen

Abstract:

A very basic posterior plumb-line exam was performed on thirteen female subjects immediately before and then immediately after a weekly exercise class. The same procedure was repeated one week later.

Introduction:

The subjects were not patients in my office. Therefore, I elected to use a postural analysis as a means of accessing muscle function. A plumb-line exam has the advantage of being simple and non-invasive.

Twenty years ago, it was the visual inspection of the patient that determined which muscles would be subjected to a manual muscle test. It is well established that a functional muscle weakness is oftentimes responsible for a postural imbalance.

Method:

Each subjects posture was evaluated within ten minutes of the onset of the class. They wore the footwear that they intended to wear during the class.

Using a cassette recorder, I recorded each subjects initials and then the results of the exam.

The levels of the iliac crests, shoulders and occiput were recorded.

Posture
Rosen...page 2

Upon completion of the class, each subjects posture was re-evaluated. This was also done within ten minutes of the completion of the class.

The same procedure was repeated with the same group of women, one week later.

Results:

There was a considerable amount of activity surrounding the area where the exams were conducted. I observed that the subjects would turn their heads in a response to the activity. For this reason, I did not feel that I was accurately judging the levels of the occiputs or shoulders.

Therefore, only the levels of the iliac crests were considered.

First week, before exercise seven out of thirteen women had a superior left iliac crest. Five were level, one was superior on the right.

After exercise, out of the seven women who initially exhibited a superior left crest, all but one were found to be level after the class.

The subject who was superior on the right remained so.

For the five who were level initially, three remained level, with two women showing a superior right iliac crest after exercise.

Second week, before exercise, regarding the seven subjects who were initially superior on the left, three returned with a superior right crest. The remaining four out of this group returned with a superior left crest.

Posture
Rosen...page 3

Of the five women who were level the week before, only two returned, and they were found to be level once again.

The subject who was superior on the right returned with that posture.

After exercise, only three women were found to have level iliac crests. Two women with superior right crests initially, switched to a superior left crest. The rest of the group remained in their initial posture.

Discussion:

This study was actually more of a learning experience. In many ways it was a means of "breaking the ice", so to speak. Typically, we usually report on observations made in a day to day practice. I think that we need to measure whatever we can measure using large groups of people who are not our patients.

My goal is to conduct a postural analysis on a thousand subjects, before and after a specific activity.

As far as the significance of the reported results, I can offer no comment at this time.

OBSERVATIONS ON THE DURAL TORQUE PATTERN

By

Mario A. Sabella, D.C.

ABSTRACT: Dural membrane torque was found to be a common occurrence affecting a significant number of patients particularly those with recurring problems. Further research into this phenomenon indicates that torque switching and occular lock may be inter-related. In addition there is a consistent pattern of faults which, when corrected, result in the elimination of the torque and hence the need for implementation of corrective exercises.

The concept of dural membrane torque was first introduced to Applied Kinesiology by Dr. George Goodheart. It is based on the well known concept of the effect of dural tension on cranio-sacral movement and function. The dura mater attaches firmly to intracranial surfaces, the foramen magnum, posterior bodies of the second and third cervical vertebrae, then is virtually free until its final anchoring attachment at the level of the second sacral tubercle. It has however several attachments to the posterior longitudinal ligament by way of fibrous slips. This arrangement allows the transmission of tension along the dural tube between the cranium and sacrum.

Under normal conditions this functional arrangement will allow reciprocation of movements between the occiput and sacrococcygeal complex. Because of continuity in the neuromusculoskeletal system, any crani-sacral dysfunction will be transmitted to and has a profound effect on physiological homeostasis. Under those circumstances, in addition to the effect on the internal milieu there is expected to be external somatic malfunctions

manifesting themselves in postural distortions and gait changes, which, in time, could lead to a more deep seated distorted pattern of activity, resulting in a self-perpetuating cycle of events. This, of course, could result in reoccurring subluxation and fixation patterns not to mention the possibility of varied physiological disturbances. Conversely abnormal function in the musculo-skeletal system particularly in the form of muscle imbalances could exert a profound effect on the delicate movements of the cranio-sacral system. Such imbalance will have a disturbing effect on the cranial structures, the spinal column, sacrum and coccyx. This dysfunction can be the result of trauma, severe illness or even viscerosomatic reflex activity.

It is also postulated that switching and ocular lock may be a form of neuro-musculo-skeletal involvement related to the cranio-sacral mechanism. To verify this concept those were also taken into consideration in this study.

EXPERIMENTAL PROCEDURE

The diagnostic criteria used for determining the existence of a torque pattern and method of correction were those discussed by Dr. George Goodheart.

A group of 54 patients who were diagnosed as having dural torque were corrected and given the exercises as recommended in the original procedure. They were re-examined a month later. Out of the 54 patients, twenty two still had evidence of the torque, which we believe was due to their inconsistency in following the recommended exercises. At this stage all patients were instructed to discontinue the exercises. The remaining thirty two were examined two weeks later. Out of those only three were negative and by the fourth week only two showed no evidence of recurrence of the torque.

Further research showed that patients with a torque pattern had the following faults consistently;

- 1- Switching and ocular lock
- 2- Cranial universal fault
- 3- Cranial temporal torque
- 4- Occipito-atlantal counter torque
- 5- Sacral wobble
- 6- Upper cervical fixation

7- Category I

8- Sternocleidomastoid reactive to the Psoas

9- Subluxation in the mid-thoracic spine, usually involving the 6th vertebra.

Since we theorised that switching was one of the manifestations of, rather than a cause of dural torque, all the above factors were considered for correction except for switching and ocular lock. For the purpose of this exercise we called this set of corrections the de-torquing technique.

A second group of 67 patients who were diagnosed as having a dural torque were de-torqued and not given any exercises. The group was monitored for a period of two months. Of this group eight had a recurrence within three weeks, and two more after a further period of two weeks. At the end of the two month test period 57 patients had no evidence of the torque pattern after their initial correction.

CONCLUSION

It is apparent that the de-torquing technique can be successfully used to correct dural torque and possible switching and ocular lock patterns. One of its main advantages is that it eliminates the need for patient participation which could easily become erratic over an extended period of time.

SUMMARY

Clinical procedures:

1- Diagnostic -

- a) Patient supine - place blocks contralaterally under the femur head and glenoid. One side will cause weakness of the indicator muscle.
- b) Switching and ocular lock positive
- c) When patient walks in their normal gait, weakness occurs in an indicator muscle. In this instance a gait pattern weakness involving acupuncture reflexes should be ruled out.

2- De-torquing technique - involves correcting the following:-

Upper cervical fixation

Category I with concomittent cranial temporal torque

Cranial universal fault

Sacral wobble with concomittent atlanto-occipital counter torque

Mid-thoracic subluxation

Psoas/Anterior neck flexor muscle reactivity.

Recheck patient to verify correction.

It is worthwhile mentioning at this point that a gait pattern involving acupuncture gait reflexes may be present simultaneously but will not influence or be influenced by this technique and will have to be corrected independently.

BIBLIOGRAPHY

Goodheart, George, J. Applied Kinesiology 1983 Research Manual
privately publised, Detroit.

Upledger & Vredevoogd, Craniosacral therapy, published 1983
Eastland Press, Chicago.

Walther, David, S. Applied Kinesiology, volume I, published 1981,
Systems DC, Pueblo, Colorado

Walther, David, S. Applied Kinesiology, volume II, Published 1983
Systems DC, Pueblo, Colorado

Magoun, Harold I., Osteopathy in the Cranial field, published
Sutherland cranial teaching foundation.

Gray's anatomy, 28th edition

T H E P H Y S I C A L T R I A D
L I F E E X T E N S I O N
Julius L. Sanna, M.S., D.C.

Abstract:

Disuse atrophy is not a term to be confined to the muscular system of our body. It should also be recognized for its effects on the circulatory, respiratory systems, bone structures and ranges of motion associated with sedentary life styles than can be reversed at any age thru exercise, as research has conclusively shown. The areas that appear to be most vulnerable to change are the feet and abdomen. A simple program of home exercises has been devised for these areas with concentration on the feet and abdomen.

Method: (performed seated in an arm chair)

- 1.) Use two plastic dumb-bells (weights)
Women 3 lbs - Men 5 lbs
- 2.) Exercise with weights in a seated position while watching TV, listening to music, etc. Each area of exercise to be done until area tires, then take a few minutes break and go on to the next procedure (rest essential).

(Total time about 30 to 45 minutes, three times weekly)

- a.) Roll arches of feet on the handles of dumb-bells
back and forth together (stretch tendons).

REST...

Life Extension
Julius L. Sanna, M.S., D.C.

-2-

- b.) Invert, Dorsi and plantar flex foot, evert, Dorsi flex foot for anterior and posterior tibialis and peroneus longus and brevis muscle.

REST...

- c.) Internally and externally rotate feet clockwise and counter clockwise to affect arch of foot.

REST...

- d.) Put weight between feet and raise with knees straight and bounce up and down for rectus abdominus.

REST...

- e.) Hold weights suspended (hanging) in both hands and rotate arms right and left with elbows straight around body while sitting to affect internal and external obliques.

REST...

- f.) Roll arches of feet on the handles of dumb-bells back and forth together (stretch tendons). (This is a repeated exercise).

REST...

- g.) Place the toes of both feet on handles of dumb-bells and move both legs straight up and down like pistons against slight resistance to affect gastrocnemius.

Life Extension
Julius L. Sanna, M.S., D.C.

-3-

Method (continued) (Performed seated in an arm chair)

h.) Bring soles of feet together into frog like position and push together repeatedly in and out.

REST...

i.) Turn body to sit on one side and raise free leg straight up and down to affect gluteus medius and tensor fascia lata.

REST...

j.) Using your arms, attempt to raise self in chair straight up and down to contract abdominal and pectoral.

REST...

k.) Raise weights laterally overhead up and down. (elbows straight - palms up)

REST...

l.) Place elbows on arms of chair, flex and extend elbows, then keep in flex position and rotate forearms right and left, then move wrists up and down (thumbs up).

REST...

m.) Roll arches of feet on the handles of dumb-bells back and forth together. (this is a repeated exercise)

REST...

n.) Dumb-bells between feet and raise legs, knees straight and bounce. (this is a repeated exercise)

On alternate days the use of the rebounder (10 - 12 minutes), or walking up and down stairs (8 - 10 stairs, 3 to 4 times) will greatly add to the described program.

Life Extension
Julius L. Sanna, M.S.,D.C.

-4-

Conclusion:

Motion is life. (what you don't use you lose)! The effects on the cardio vascular, respiratory system, range of motion, muscle tone, increase bone density and sustained energy levels, thru moderate exercises, not only helps in maintaining and supporting body function, but can also reverse the effects of disuse at any age.

References:

- Herbert deVues, PH.D. University of South CAL.
Walter Bortz, M.D., - Jornal of the AMA 99/10/82)
Journal of Gerontology, - Vol. 38 No. 2, 1083
James White,PH.D., University of CAL.
Archives of General Psychiarty, Jones 1982
Robert Case, M.D., Univ. of Fla.
Exercise and Aging, the Scientific Bais, Enslow Publ 1981
Journal of Applied Physiology, Vol38, 1975
Anthony Albanese, PH.D., Burke Rehab Center, N.Y.
Howard Baron, M.D., Cabrini Medical Ceneter, N.Y.
Marion Diamond, M.D., University of CAL.
Robert Ruhling, PH.D., University of Utah

HYPERENERGY STATES IN APPLIED KINESIOLOGY:
A NOVEL APPROACH FOR ITS DIAGNOSIS

Joseph Shafer, D.C.

ABSTRACT

A DISCUSSION OF PREVIOUS ACUPUNCTURE TESTING METHODS OF APPLIED KINESIOLOGY WITH EMPHASIS ON THE EXCESS ENERGY (HYPER) STATES. THE PAPER DISCUSSES THE VARIOUS THEORIES, DIFFICULTIES AND POSSIBLE MISCONCEPTIONS WITH RESPECT TO THE DETERMINATION OF THE ELUSIVE EXCESS ENERGY MERIDIAN. A NOVEL APPROACH TO THIS DIAGNOSIS IS PRESENTED.

KEY WORDS: WEAK AND STRONG MUSCLE, ASSOCIATED MUSCLE, EXCESS AND DEFICIENT MERIDIAN, KIDNEY 27, THERAPY LOCALIZATION, CHALLENGE.

INTRODUCTION

SINCE ITS INCEPTION, APPLIED KINESIOLOGY (A-K), HAS AVAILED ITSELF TOWARD THE ANALYSIS OF THE 'WEAK' MUSCLE. (FOR REASONS OF CLARITY, IT HAS BEEN DECIDED TO RETAIN THE TERMS 'WEAK' AND 'STRONG' IN RELATION TO PERCEIVED MUSCLE STRENGTH.) THE FUNDAMENTAL BASIS OF A-K DIAGNOSIS IS TO OBSERVE AN APPARANT WEAKENING OR WEAKNESS OF CERTAIN MUSCLES OR MUSCLE GROUPS. VIRTUALLY EVERY TECHNIQUE INVOLVED IN A-K DIAGNOSIS NECESSITATES FINDING A WEAK MUSCLE OR CREATING A WEAKNESS IN A MUSCLE BY SOME SPECIAL MEANS, BUT WHICH SHOULD NOT CREATE A WEAKENING UNDER NORMAL CIRCUMSTANCES. IF ONE OF THESE TWO FACTORS NOT BE PRESENT IN ONE FORM OR ANOTHER UNDER A-K TESTING, THE DIAGNOSIS LESSENS IN VALUE. CERTAINLY, OTHER FORMS OF DIAGNOSIS MAY BE USED BY THE PHYSICIAN IN ORDER TO SUPPLEMENT ANALYSIS, HOWEVER, IT CANNOT EXIST AS AN APPLIED KINESIOLOGICAL MEASUREMENT UNTIL SOME CRITERIA OF PERCEIVED WEAKNESS IS MET.

BASICALLY, THE REASON FOR THIS IS THAT WHILE IT IS POSSIBLE TO FEEL GRADATIONS OF MUSCLE WEAKNESSES AND MEASURE THEM, IT REMAINS RELATIVELY IMPOSSIBLE, BY PRESENT SYSTEMS, TO MEASURE GRADATIONS OF STRENGTH BY MUSCLE TESTING. OF COURSE, DIFFERENCES OF STRENGTH CAN BE FELT, BUT NOT WITH THE SAME PRECISION ALLOWED IN MEASURING WEAKNESSES. THEREFORE, HYPO-STATES AND MUSCLE WEAKENINGS MAY BE DIRECTLY MEASURED OR TESTED BY APPLIED KINESIOLOGY. HYPER-STATES AND GRADATIONS OF MUSCLE STRENGTH MUST BE TESTED BY INDIRECT MEANS. SINCE A WEAKNESS IMPLIES 'TOO LITTLE' NOT 'TOO MUCH', IT WOULD BE DIFFICULT TO ATTEMPT TO MEASURE AN EXCESS BY USING A RULER FOR TOO LITTLE. FOR EXAMPLE, IF ONE TAKES TWO THERMOMETERS, ONE FOR BELOW ZERO AND THE OTHER FOR ABOVE ZERO. IF THE THERMOMETER FOR ABOVE ZERO MEASUREMENTS BECOMES BROKEN, THE USE OF THE BELOW ZERO THERMOMETER WILL ONLY GIVE INDICATIONS OF WHAT IS GOING ON HIGHER UP.

GEORGE GOODHEART, DC, OFTEN QUOTES DD PALMER'S ASCERTION THAT ABNORMAL FUNCTION MAY CONSIST OF 'TOO MUCH ENERGY AS WELL AS NOT ENOUGH'. YET IT IS THE BELIEF OF THE AUTHOR THAT FOR THE MOST PART, A-K AVAILS ITSELF BEST TO THE ANALYSIS OF

THE 'NOT ENOUGH ENERGY REALM'. IT BECOMES A DICHOTOMY OF LOGIC TO BELIEVE THAT ONE INDICATOR (THE WEAK MUSCLE) WILL ADEQUATELY MEASURE BOTH HYPER AND HYPO FUNCTION EQUALLY AS WELL. IT IS BELIEVED THAT AN EXCESS MERIDIAN CREATES A REACTIVE HYPERTONICITY IN THE ASSOCIATED MUSCLE. THIS CAN BE BETTER CONFIRMED BY TEMPERATURE INCREASES IN SPECIFIC AREAS. THE GREATER THE DEGREE OF ENTROPY IN A SYSTEM, THE GREATER IS ITS DEGREE OF ACTIVITY (AS CAN BE SEEN IN THE TEMPERATURE INCREASE). FOLLOWING THE LEAD OF PHYSICS, IT MIGHT BE CONCLUDED THAT WHILE HYPERFUNCTION MAY BE CONSIDERED ABNORMAL, IT DOES NOT NECESSARILY ALLOW IT TO BE REVEALED AS A MUSCLE WEAKNESS.

IT MAY BE ASSUMED AT PRESENT THAT WE ARE MEASURING SOME FORMS FOR OVER-ENERGY STATES WITH PRESENT TECHNIQUES. THERE APPEARS TO BE LITTLE HARD EVIDENCE IN SUPPORT OF THAT FACT. MORE OFTEN, THE AUTHOR BELIEVES THAT HYPER-ENERGY STATES ARE FOUND AS A PROCESS OF ELIMINATION OF ALL OTHER POSSIBILITIES RATHER THAN BY DIRECT MEASUREMENT. ADEQUATE CAPABILITIES FOR THE GAUGING OF OVER-ENERGY STATES WILL REQUIRE TESTING METHODS OF A SPECIALIZED NATURE. ASSUMING THAT HYPER STATES CAUSE HYPER MUSCLE FUNCTION, THE BODY MUST BE MADE TO REACT TO THE ABNORMAL HYPER-FUNCTION BY SOME FORM OF WEAKENING. CONFUSION AND WIDE-SPREAD DIFFERENCES IN BELIEF AS TO HOW THIS MAY BE BROUGHT ABOUT INDICATES A NEED FOR UNIFORMITY IN THIS AREA. CLINICAL EXPERIMENTATION INTO THIS FIELD MUST BE ESTABLISHED IN ORDER TO STOP THE FURTHERING OF MISCONCEPTIONS.

MERIDIAN ANALYSIS IS ONE AREA IN WHICH THIS DIFFICULTY BECOMES PAINFULLY APPARANT. APPLIED KINESIOLOGY METHODS HAVE MADE GREAT STRIDES INTO THE TESTING OF THE DEFICIENT MERIDIAN, YET STILL THERE PERSISTS GREAT CONTROVERSY AND CONFUSION WITHIN THE AREA OF MERIDIAN EXCESS ANALYSIS. LOCATING A DEFICIENT MERIDIAN WITH MUSCLE TESTING HAS BEEN WELL DOCUMENTED AND FOUND CLINICALLY EFFICACIOUS. THE UNDER-ENERGY PRESENTS ITSELF WELL TO THE A-K TEST IN THAT IT WILL ALWAYS BE INDICATED BY SOME WEAKNESS IN ITS ASSOCIATED

MUSCLE. BEYOND THIS IT IS USUALLY EASY TO FIND SOME OTHER REACTION TO CONFIRM THIS AS IN THERAPY LOCALIZATION (TL) TO ONE OR MORE MERIDIAN POINTS OR BY SOME FORM OF MERIDIAN CHALLENGE.

THE SIMPLICITY WITH WHICH A DEFICIENCY IS FOUND IS NOT PRESENT FOR THE EXCESSIVE MERIDIAN. HEREIN LIES THE PROBLEM AREA. THE RELATIVE HYPERTONICITY OF THE ASSOCIATED MUSCLE CAUSES IT TO REACT IN A SPECIAL WAY. IT DOES NOT TEST WEAK NOR DOES IT WEAKEN UPON RUNNING THE MERIDIAN BACKWARDS. THE HYPERTONICITY HAS BEEN ASSUMED MORE THROUGH A PROCESS OF ELIMINATION THAN AN ABILITY TO MEASURE THIS PHENOMENON. IT HAS BEEN POSTULATED THAT SOME PEOPLE HAVE SUCH STABLE ENERGY SYSTEMS THAT IT IS IMPOSSIBLE TO ELICIT THE 'TURN-OFF TEST'. WHILE THIS EXPLANATION MAY BE VERY TRUE, IT STILL REFLECTS THE NEED TO ACCOUNT FOR AN EXCEPTION TO THE RULE RATHER THAN THE ABILITY TO MEASURE IT.

RECOGNIZING THE NEED FOR ADEQUATE, UNIFORM TESTING PROCEDURES FOR THE EXCESSIVE MERIDIAN STATE IS NOT DIFFICULT TO SHOW. PERUSAL OF THE VARIOUS PRINTED TEXTS AND NOTEBOOKS ON THE SUBJECT REVEALS A WIDE VARIATION OF INTERPRETATION. ATTENDING SEMINARS GIVEN BY DIFFERENT DIPLOMATES GIVES THE SAME NEBULOUS RESULTS. THERE REMAINS NO SOLID AGREEMENT AS TO WHEN AND HOW THE OVER-ENERGY MERIDIAN IS BEING MONITORED. FOR THE NEW INITIATE TO A-K MERIDIAN ANALYSIS, CHASING THE PROVERBIAL POT AT THE END OF THE RAINBOW WOULD MOST LIKELY PROVE MORE FRUITFUL THAN ATTEMPTING TO EXTRACT SOME MEANINGFUL RELATIONSHIP ON THIS QUESTION. THOSE DIPLOMATES MOST TRUTHFUL ABOUT MERIDIAN ANALYSIS IN A-K, REPORT THAT NO 'CLEAR-CUT', DIRECT PROCEDURE FOR THE ANALYSIS OF THE EXCESS MERIDIAN EXISTS. CONSISTANCY OF RESULTS HAVE NOT BEEN SHOWN.

IT HAS BEEN COMMONLY ACCEPTED FOR YEARS THAT ALL ABNORMAL MERIDIANS (WHETHER OVER OR UNDER ENERGY) SHOULD TL BY ONE OR ANOTHER MEANS. WE HAVE ASSUMED THAT JUST BECAUSE IT IS ABNORMAL IT SHOULD BE ABLE TO TL JUST AS WELL WITH EITHER STATE. THEREFORE, RESPONSIBILITY FOR DISTINGUISHING BETWEEN

THE TWO STATES RESTS WITH THE TREATING DOCTOR AND THE DOCTOR'S ABILITY TO ELIMINATE EXTRANEIOUS FACTORS. THE MEANS OF ACCOMPLISHING THIS REQUIREMENT ARE VARIED. DAVID WALTHER, DC, IN 1976, PUBLISHED A MANUAL ON APPLIED KINESIOLOGY IN WHICH HE REFERS TO THIS NEED. UNDER THE HEADING PULSE DIAGNOSIS, PAGE 74, HE STATES, "IF THE [INDICATOR] MUSCLE GOES WEAK, THE MERIDIAN INDICATED BY THAT PULSE IS INVOLVED, WITH EITHER TOO MUCH OR NOT ENOUGH ENERGY". SHOULD THE MUSCLES THEN TEST STRONG, HE RECOMMENDS THE USE OF TEMPERATURE IN ORDER TO AID IN THE DIAGNOSIS CONFIRMATION. AN INCREASE IN TEMPERATURE WOULD INDICATE OVER-ENERGY AND A COOLER FEELING, UNDER-ENERGY. THE MOST SIGNIFICANT FEATURE IN HIS STATEMENT IS THAT HE ALLOWS FOR THE POSSIBILITY OF BOTH STATES BEING REVEALED THROUGH THE SAME TESTING PROCEDURE. YET, ON A WHOLE, WALTHER OFFERS NO SOLID INFORMATION ON HOW THE DIVISION BETWEEN THE TWO IS ACCOMPLISHED. THE AMBIGUITY OF HIS WRITINGS ON THIS POINT ARE INTERESTING IN THAT PERHAPS THEY DISCLOSE THE UNDERLYING UNCERTAINTY FOUND AT THE TIME.

DAVID WALTHER CORRECTLY REPORTED THE IDEAS CIRCULATING AMONG A-K PRACTITIONERS AT THE TIME OF PUBLISHING HIS FIRST MANUAL. SHORTLY AFTER HIS PULSE DIAGNOSIS SECTION, HE CONTINUES BY MENTIONING THAT A STRONG INDICATOR MUSCLE WILL GO WEAK UPON TL TO AN ALARM POINT IF THERE IS A 'DISORDER OF THE MERIDIAN'. THUS, HE MAINTAINS THE SAME THEORY THROUGHOUT THE CHAPTER ON MERIDIAN ANALYSIS. AT ABOUT THE SAME TIME, FRED STONER, DC, WROTE A BOOK ON APPLIED KINESIOLOGY ENTITLED, THE ECLECTIC APPROACH TO CHIROPRACTIC. HIS DISCUSSION OF THE MERIDIAN SYSTEM WAS MORE CONSERVATIVE THAN THAT OF DAVID WALTHER. HE PREFERS TO SIGNIFY THAT TL WILL REVEAL ONLY A DEFICIENCY, NOT AN EXCESS STATE. THE INCONSISTANCY FOUND BETWEEN THESE TWO WRITERS HAS NOT DIMINISHED WITH THE YEARS, ON THE CONTRARY, IT HAS BECOME EVEN MORE ENTANGLED.

THE FUNDAMENTAL DICHOTOMY, ALLUDED TO ABOVE, HAS PERMEATED THE THINKING DURING THE PERIOD OF A-K MERIDIAN ANALYSIS DEVELOPMENT. THE RAPID PROGRESS MADE IN OTHER AREAS OF A-K PROCEDURES SEEMS TO HAVE BYPASSED THE OVER/UNDER ENERGY CONTROVERSY LIKE A STUNTED CHILD AMONG CLASSMATES. IN THE

BEGINNING THE INCONGRUENCY GOES RELATIVELY UNNOTICED, BUT AS THE YEARS PROGRESS, THE INEQUALITY BECOMES MORE AND MORE APPARANT. THE LACK OF A COHESIVE, UNIFIED APPROACH WITH RESPECT TO MERIDIAN ANALYSIS HAS LEAD TO AN AWKWARDNESS BETWEEN USERS WHICH BECOMES EVEN MORE DEVELOPED WITH PASSING TIME. THE FRUSTRATION ACCOMPANYING ATTEMPTS TO REALIZE SOME WORKABLE SOLUTION ON THE MERIDIAN QUESTION HAS PROMPTED THIS STUDY.

RESEARCH AND REVIEW

EARLY WORK AND IMPLEMENTATION OF THE MERIDIAN SYSTEM TO A-K WAS ACCOMPLISHED PRIMARILY BY GEORGE GOODHEART. SUPPLEMENTATION AND EXPANSION OF HIS INITIAL FINDINGS HAVE BEEN MADE BY OTHERS AS WELL. IN HIS 1973 RESEARCH SUPPLEMENT, GOODHEART REPORTED ON AN OBSERVATION MADE BY ALAN BEARDALL, DC, AND JACK RAREY, DC (SOME INCLUDE ORVILLE LADD, DC), ON THE MERIDIAN SYSTEM. THEY FOUND THAT SHARPLY STRIKING (CHALLENGING) AN ALARM POINT COULD RESULT IN A POSITIVE REACTION. ON PAGE 72 OF THE 1973 RESEARCH SUPPLEMENT, GOODHEART REPORTS ON THIS FINDING. HE WRITES THAT WHEN THE CHALLENGE WAS POSITIVE IT INDICATED THAT THE 'ORGAN-MUSCLE COMBINATION MERIDIAN WAS IN A DEBIT SITUATION'. GOODHEART PURPOSELY EMPHASIZED THE WORD DEBIT, OSTENSIBLY, SO THAT THERE WOULD BE NO MISTAKING IT FOR AN OVER-ENERGY. SHOULD THERE HAVE BEEN ROOM FOR DOUBT, ONE WOULD NOT THINK HE WOULD HAVE GONE SO FAR AS TO STRESS THE WORD DEBIT.

STONER, IN HIS TEXT, ESSENTIALLY REPORTS THIS ACCURATELY, BUT POINTS OUT ON PAGE 82, 'THERAPY LOCALIZATION TO THE ALARM POINTS IS PREFERRED....' HE ALSO MENTIONS THAT THE ALARM POINT CHALLENGE IS DONE WHILE TESTING AN ASSOCIATED MUSCLE TO THAT MERIDIAN, A POINT IN WHICH GOODHEART REPORTS AS WELL. YET, APPROXIMATELY ONE YEAR LATER, WALTHER MAKES TWO SIGNIFICANT CHANGES TO THE INITIAL INTERPRETATION. ON PAGE 75, HE WRITES, "A CHALLENGE IN THE FORM OF A SHORT THRUST IS DIRECTED TO THE ALARM POINT. IF THERE IS A DISORDER IN THE MERIDIAN ASSOCIATED WITH THE ALARM POINT, A STRONG INDICATOR MUSCLE WILL GO TEMPORARILY WEAK." [AUTHOR'S EMPHASIS]

THESE TWO CHANGES MADE BY WALTHER (INDICATED BY AUTHOR'S EMPHASIS) MAKE THE INSTRUCTIONS TO THE READER LESS EXPLICIT AND MORE GENERALIZED. AS IS EVIDENT THROUGHOUT HIS WRITINGS OF THIS PERIOD, WALTHER PREFERS NOT TO BE DEFINITIVE IN HIS EXPLANATION OF THE FINDINGS. RATHER, HE CHOOSES A MORE DIPLOMATIC APPROACH AND REPORTS ONLY THAT AN ABNORMALITY OF SOME TYPE IS FOUND WITH A POSITIVE REACTION OF THE TEST. THE SECOND DISCREPANCY IS FOUND WITH THE FACT THAT HE ALLOWS FOR THE USE OF ANY STRONG INDICATOR MUSCLE. THIS POSSIBILITY WAS NOT PROVIDED FOR IN GOODHEART'S EXPLANATION.

AS ORIGINALLY DISCUSSED BY GOODHEART, ONE MUST BE TESTING THE MUSCLE RELATED TO THE MERIDIAN IN QUESTION AT THE TIME OF CHALLENGE. A POSITIVE REACTION TO THIS TEST, INDICATED BY A WEAKENING OF THE ASSOCIATED MUSCLE, MEANS THE MERIDIAN IS IN A DEFICIENT STATE. WALTHER'S DEPARTURE FROM THE ORIGINAL FINDING IS INTERESTING IN LIGHT OF HIS WELL-KNOWN ACCURACY OF REPORTING AND ATTENTION TO DETAILS. CAN IT BE ASSUMED THAT PRIOR TO HIS WRITINGS ON THE MERIDIAN SYSTEM, HE MADE A SURVEY OF QUALIFIED A-K PRACTITIONERS WITH RESPECT TO THEIR USE OF THE ACUPUNCTURE SYSTEM? SHOULD HE HAVE FOUND THEN, AS IS FOUND NOW, SUCH A WIDE DISCREPANCY OF INTERPRETATION, ONE MIGHT SUPPOSE THAT HIS WRITINGS REFLECT MORE A COMPROMISE THAN A DIRECT REBUTTAL OF THE ORIGINAL OBSERVATIONS. IN A TELEPHONE CONVERSATION WITH DAVID WALTHER CONCERNING THIS QUESTION, THE AUTHOR'S CONCLUSIONS WERE CONFIRMED. DAVID WALTHER STILL HOLDS WITH THE BELIEF THAT NO REAL ASSUREDNESS IS GUARANTEED WITH A POSITIVE MERIDIAN REACTION TO TL AS TO WHETHER IT IS OVER OR UNDER ENERGY.

AS A FURTHER EXAMPLE OF THE DIVERSITY OF THOUGHT DURING THE EARLY SEVENTIES, ON THIS SUBJECT, THE TOUCH FOR HEALTH MANUAL, BY JOHN THIE, PROVIDES FOR AN EVEN MORE DEFINITIVE DEPARTURE FROM THE REST. ALTHOUGH PRIMARILY WRITTEN FOR THE NON-PROFESSIONAL, TOUCH FOR HEALTH (TFH) TECHNIQUES AND THEORIES ARE READ AND PRACTICED BY PROFESSIONALS AS WELL. ACCORDING TO TFH CONCEPTS, A CHALLENGE TO AN ALARM POINT WHILE TESTING ANY STRONG INDICATOR MUSCLE IS EVIDENCE OF AN EXCESS IN THE MERIDIAN IN QUESTION UPON POSITIVE REACTION.

UNDERSTANDABLY, THIS PROCEDURE STANDS AS A COMPLETE ANTI-THESIS TO THE ORIGINAL REPORT. IS IT NO WONDER THAT MANY APPROACH THE MERIDIAN SYSTEM WITH APPREHENSION? THE SEASONED A-K PRACTITIONER AS WELL AS THE NEOPHYTE, IS REQUIRED TO MAKE A RATHER CONSEQUENTIAL DECISION AS TO WHAT IS BEING TESTED.

YEARS OF CLINICAL USE HAVE NOT REDUCED THE PERPLEXITY OF THE SITUATION. ON THE CONTRARY, EVIDENCE SEEMS TO INDICATE IT BECOMING WORSE. ONE MUST BUT ATTEND SEMINARS GIVEN BY THE VARIOUS A-K INSTRUCTORS IN ORDER TO BECOME AWAILED OF THE SITUATION. WHAT IS BEING TAUGHT IS WHAT THAT PARTICULAR DIPLOMATE ACCEPTS TO BE TRUE. WALTHER CONTINUES TO ADOPT A POSTURE ALLOWING FOR BOTH AVENUES UNTIL DEFINITIVE EVIDENCE CONFIRMS A SPECIFIC ANALYSIS. TOUCH FOR HEALTH CONTINUES TO BE TAUGHT AS IT HAS ALWAYS BEEN TAUGHT AND REMAINS BASICALLY UNCHANGED IN ITS CONCEPTUAL FRAMEWORK.

NOT LONG AGO, AT A SEMINAR GIVEN TO PROFESSIONALS AND NON-PROFESSIONALS ALIKE, SHELDON DEAL, DC, ELUCIDATED ANOTHER METHOD OF ANALYSIS. AS A GENERAL TEST FOR OVER-ENERGY, HE RECOMMENDS THAT THE PATIENT TL TO THE UMBILICUS WITH FIRST ONE HAND, THEN THE OTHER. THE WEAKENING OF A STRONG INDICATOR MUSCLE INDICATES AN OVER ENERGY STATUS SOMEWHERE ON THE SAME SIDE OF THE BODY AS THE THERAPY LOCALIZING HAND. FURTHER, HE EXPLICITLY DISTINGUISHES BETWEEN TL BY THE DOCTOR AND THE PATIENT. WHEN THE PATIENT THERAPY LOCALIZES TO A PULSE POINT AND A STRONG INDICATOR MUSCLE WEAKENS, IT INDICATES OVER-ENERGY. SHOULD THE DOCTOR TL AND A STRONG INDICATOR MUSCLE WEAKEN, IT INDICATES A DEFICIENCY. THE FINAL DIFFERENTIATION COMES BY THE PATIENT THERAPY LOCALIZING TO AN ALARM POINT WHILE THE DOCTOR TESTS AN ASSOCIATED MUSCLE TO THAT ALARM POINT. AGAIN, A WEAKENING MEANS THAT THE MERIDIAN TESTED IS IN A STATE OF OVER-ENERGY.

THE APPROACH PRESENTED BY DEAL IS AN EVEN GREATER DIGRESSION FROM PREVIOUS CONCEPTS. WHILE CLINGING TO THE IDEA THAT EXCESS ENERGY MERIDIANS MAY TL IN ONE WAY OR ANOTHER, HE SEEMS TO HAVE TAKEN OFF ON A TANGENT EVEN MORE RADICAL THAN THE OTHERS. THAT WHICH CAUSES THE MOST CONSTERNATION IN HIS

THEORY IS THE FACT THAT HE CHOOSES TO DIFFERENTIATE BETWEEN THE PATIENT AND TESTOR TL MODES. IT HAS BEEN UNDERSTOOD IN THE PAST THAT THE TESTOR COULD, IN NECESSARY SITUATIONS, TL WITH THE SAME RESULTS AS COULD BE HAD IN PATIENT THERAPY LOCALIZATION. THE ONLY DRAWBACK TO THE TL BY THE TESTOR WAS THAT IT SOMETIMES WAS NOT AS ACCURATE. THE MORE EXPLICIT DEMARCATION BY SHELDON DEAL, ALTHOUGH NOT NECESSARILY INCORRECT, ONLY ADDS MORE HEAT TO AN ALREADY BOILING POT.

THE AUTHOR'S OWN EXPERIENCE SEEMS TO INDICATE THAT THE DEFICIENT MERIDIAN IS LOCATED EASILY, AND QUITE OFTEN. IT IS FELT THAT THE GREATER OF GOODHEART'S OBSERVATIONS AND REPORTINGS REMAIN TRUE TODAY. THE HYPOTHESES OF THE PROCEDURES MENTIONED ABOVE, NOTWITHSTANDING, IT APPEARS AS IF EXCESSIVE STATES ARE FOUND ON A HAPHAZARD BASIS, IF AT ALL. MANY OF THE PROPOSED METHODS HAVE BEEN CLINICALLY TRIED AND FOUND TO BE WANTING. THE ONLY CONSISTANCY AMONG THE METHODS WAS IN THE APPARANT RANDOMNESS OF RESULTS ACHIEVED. IT IS THIS LACK WHICH PROMPTED EXPERIMENTATION INTO THE OVER-ENERGY QUESTION.

ANALYSIS METHOD

TWO METHODS OF ANALYSIS WERE EMPLOYED IN THE EXAMINATION PROCESS OF THE EXCESS MERIDIAN.. ONE WAS THE USE OF A SYSTEM DESCRIBED BY GOODHEART IN WHICH THE EXCESS MERIDIAN COULD BE LOCATED BY INDIRECT MEANS. THE OTHER WAS THE ARTIFICIALLY INDUCED EXCESS OR DEFICIENCY STATE.

THE 24-HOUR CIRCULATION OF ENERGY FAULT WAS USED AS THE INDIRECT MEANS OF FINDING AN EXCESSIVE STATE WITHOUT COMPROMISING ANY OF THE EXPERIMENTS PARAMETERS. THE 5-ELEMENT FAULT REQUIRES THAT THE EXCESS MERIDIAN BE INITIALLY THERAPY LOCALIZED AT A PULSE POINT. THIS CRITERIA ELIMINATES THE POSSIBILITY OF USING IT AS A TESTING METHOD FOR THE EXPERIMENT.. WITH ITS USE IT IS PRECONCEIVED THAT TL TO A MERIDIAN POINT MAY SHOW AN EXCESS STATE. SINCE THIS WILL BE ONE OF THE FACTORS TESTED UNDER THIS EXPERIMENTATION PROCESS, ITS USE WAS PRECLUDED FROM THE STUDY. THEREFORE, EVEN THOUGH THE 24-HOUR FAULT IS NOT RECOGNIZED AS LOCATING AN EXCESS

MERIDIAN DIRECTLY, THE OVER-ENERGY IS FOUND BY LITERALLY 'BACKING INTO IT'.

AS A FURTHER CONFIRMATION THAT THE MERIDIAN FOUND TO BE AT FAULT IN THE 24-HOUR METHOD IS IN EXCESS, IS THAT IT CANNOT BE FOUND AS A WEAKENED ASSOCIATED MUSCLE. THE MUSCLE CANNOT BE WEAKENED BY BACKWARDS RUNNING OF THE MERIDIAN EVEN IF DONE REPETATIVELY. ONCE LOCATED, THIS MERIDIAN CAN THEN BE TESTED AGAINST ALL SYSTEMS OF ANALYSIS WHICH HAVE BEEN DISCUSSED ABOVE.

THE SECOND PLAN WAS TO ARTIFICIALLY STIMULATE THE FIRST TONIFICATION POINT FOR A SET PERIOD OF TIME IN ORDER TO PUT THE MERIDIAN INTO AN EXCESS. A CONDITON SUCH AS THE ONE DESCRIBED ABOVE WOULD BE TRULY ABNORMAL SINCE IT WOULD BE INDUCED MANUALLY RATHER THAN DUE TO A REACTION OF THE BODY TO SOME INTERNAL OR EXTERNAL STIMULUS. A MYO-MATIC INSTRUMENT DESIGNED BY THOMAS WING, WAS USED IN THE EXPERIMENT. ACCORDING TO THE EXPERIMENTS BY WING AND OTHERS, A TONIFICATION MAY BE SUCCESSFULLY APPLIED TO A MERIDIAN BY A STIMULATING IMPULSE OF 80 HZ. FOR 6 SEC. AT A CURRENT LEVEL TOLERABLE TO THE PATIENT. THE SAME PROCEDURE IS USED TO SEDATE A MERIDIAN WHEN USING THE SEDATION POINT INSTEAD.

A STRONG ASSOCIATED MUSCLE WAS FOUND WHICH WOULD NOT WEAKEN TO ANY OF THE ABOVE RELATED TECHNIQUES. FURTHER, THE MUSCLE MUST BE FOUND TO WEAKEN TO BACKWARDS RUNNING OF THE MERIDIAN. AFTER ESTABLISHING THESE CRITERIA, THE MERIDIAN MUSCLE COMBINATION WAS ASSUMED TO BE NORMAL. PROGRESSIVELY GREATER STIMULATION TIMES WERE USED ON THE TONIFICATION POINT IN INCREMENTS OF 2 SECONDS EACH. THE TOP LEVEL OF STIMULATION DURATION GIVEN WAS THAT OF 20 SECONDS. THE REASON FOR THIS WAS IN ORDER TO ENSURE THAT THE MERIDIAN WOULD BE SUFFICIENTLY TONIFIED TO CREATE THE OVER-ABUNDANT STATE. ALL TONIFICATION BEGAN AT THE LOWEST DURATION TIME OF 2 SECONDS. IF THE TESTING REVEALED NO RESPONSE, AN INCREASE OF STIMULATION TIME WOULD BE MADE UNTIL AN APPROPRIATE POSITIVE RESPONSE WAS FOUND OR THE 20 SECOND TIME-LIMIT WAS REACHED. A CATALOGUE OF THE SUM OF STIMULATION TIME WAS

KEPT SO THAT THE ARTIFICIALLY OVER-STIMULATED MERIDIAN COULD BE AGAIN BROUGHT TO A NORMAL STATUS AT THE CONCLUSION OF THE TEST BY STIMULATION OF THE SEDATION POINT FOR A SPECIFIED AMOUNT OF TIME. THE PATIENT/SUBJECT WAS RELEASED WHEN THE MUSCLE/MERIDIAN COMPLEX REACTED AS IT HAD PRIOR TO THE BEGINNING OF TESTING.

RESULTS OF THE TRIAL

ALREADY WITHIN THE FIRST FEW CONTROL SUBJECTS IT BECAME APPARANT THAT THE ABOVE RELATED METHODS WERE NOT REACTING TO EITHER THE 24-HOUR EXCESS MERIDIAN OR THE ARTIFICIALLY INDUCED EXCESS MERIDIAN. IN EACH INDUCED EXCESS IT BECAME NECESSARY TO STIMULATE THE TONIFICATION POINT FOR 20 SECONDS, THUSLY REACHING THE TIME LIMIT SET BY THE STUDY. EVEN AT THE HIGHEST STIMULATION POINT NONE OF THE SYSTEMS WOULD REACT POSITIVELY WITH A MUSCLE WEAKNESS. NEITHER THE PULSE POINT NOR THE ALARM POINTS WOULD TL IN THE CLEAR, NOR WOULD THEY CHALLENGE. TESTING THE ALARM POINT BY TL OR CHALLENGE AGAINST ITS STRONG ASSOCIATED MUSCLE ALSO GAVE NEGATIVE RESULTS. THERAPY LOCALIZATION BY THE DOCTOR AND/OR PATIENT MADE NO DIFFERENCE--BOTH WERE NEGATIVE.

SHELDON DEAL DOES MAKE AN EXCEPTION TO THE RULE OF LOCATING THE EXCESS MERIDIAN IN THAT HE RQUIRES THAT CENTERING REFLEXES, IONIZATION AND GV 20 BE CLEARED PRIOR TO TESTING OR ELSE THE FINDINGS WILL BE IN ERROR. AN ATTEMPT WAS MADE TO TEST UTILIZING HIS THEORIES BOTH BEFORE AND AFTER THESE THREE NECESSITIES WERE CHECKED. IT SEEMED TO MAKE NO DIFFERENCE TO THE FINAL OUTCOME WHETHER THE RULES WERE FOLLOWED OR NOT. IN BOTH INSTANCES, THE RESULTS WERE NEGATIVE.

THE EXCESS FOUND BY THE 24-HOUR METHOD HAD THE SAME ZERO RESPONSE FACTOR. THE TOTAL NEGATIVITY OF RESULTS WAS AT FIRST QUITE BAFFELING. AT THE BEGINNING OF THESE FINDINGS, IT WAS HEAVILY SPECULATED AS TO WHETHER THE INITIAL ASSUMPTIONS WERE CORRECT. IT COULD BE POSSIBLE THAT THE MERIDIAN FOUND IN THE 24-HOUR CLOCK METHOD WAS NOT IN EXCESS. ALSO, IT COULD BE THAT STIMULATION OF THE TONIFICATION POINT WAS NOT SUFFICIENT TO BRING ABOUT THE OVER-ENERGY STATE.

IT WAS DECIDED NOT TO DISCARD THE INITIAL ASSUMPTION ON THE BASIS OF THE PRELIMINARY RESULTS ALONE. TOO MANY OTHER INDICATORS SEEMED TO POINT TO THE FACT THAT THE CHOSEN MERIDIANS WERE INDEED IN EXCESS. NO AMOUNT OF BACKWARDS MERIDIAN RUNNING WOULD SHUT THEM OFF AND NONE OF THE TECHNIQUES WOULD BRING ABOUT A WEAKENING REACTION. THIS CAN ONLY POINT TO TWO POSSIBILITIES; EITHER THE MERIDIANS WERE NORMAL OR OVER-ABUNDANT. THEY WERE DEFINATELY NOT DEFICIENT AS NOTHING WOULD WEAKEN THEM.

AN IDEA OCCURRED IN WHICH IT WAS THOUGHT THAT PERHAPS BY WORKING IN THE OTHER DIRECTION THE OTHER PRECEDURES MIGHT BE FOUND TO REACT. AGAIN, SEDATION OF A MERIDIAN WAS ACCOMPLISHED BY STIMULATING THE APPROPRIATE POINT FOR SIX OR MORE SECONDS. WHEN THE ASSOCIATED MUSCLE TESTED WEAK, TESTING BEGAN. ALL METHODS WHEREBY A STRONG INDICATOR MUSCLE WAS USED WERE TESTED AGAINST THE WEAKEN MERIDIAN. THERAPY LOCALIZATION AND CHALLENGE OF THE ALARM POINT PROVED TO CONSISTANTLY REACT POSITIVE. USUALLY, THE PULSE POINTS WOULD ALSO TL, BUT ON A LESS CONSISTANT BASIS. DOCTOR TL TO THE VARIOUS POINTS BROUGHT THE SAME RESULTS, BUT IT IS FELT THAT PATIENT TL IS BETTER. THERE IS NO QUESTION IN THE AUTHOR'S MIND THAT IN DEFINITE DEFICIENCY STATES, TL, CHALLENGE AND PULSE POINT TL ARE EFFECTIVE MONITORS.

HOWEVER, THIS DOES NOT ANSWER THE QUESTION WHEN A STRONG ASSOCIATED MUSCLE IS LOCATED, THEN TESTED AGAINST ITS OWN ALARM POINT. IT WAS FOUND THAT THE MYO-MATIC WOULD CAUSE THE WEAKENING OF A NORMAL MUSCLE/MERIDIAN COMBINATION IF A STIMULUS OF SIX OR MORE SECONDS WAS GIVEN TO THE SEDATION POINT. BUT A STIMULUS OF 2-4 SECONDS OFTEN WOULD NOT WEAKEN THE ASSOCIATED MUSCLE. IN THESE INSTANCES, THE STRONG, YET PARTIALLY SEDATED MUSCLE/MERIDIAN COMPLEX WAS ANALYZED BY THE REMAINING METHODS OF ANALYSIS. BY TESTING THE STRONG APPEARING MUSCLE AGAINST ITS ALARM POINT IN THE FORM OF A CHALLENGE OR THERAPY LOCALIZATION, A CONSISTANT REACTION CAN BE ELICITED. MUSCLES WEAKENING UNDER THIS COMBINATION TEST ARE ALSO EASILY WEAKENED BY BACKWARDS RUNNING OF THEIR RELATED MERIDIAN, A FINDING WHICH IS INCONSISTANT WITH EXCESS ENERGY MERIDIANS.

CLINICALLY FOUND REACTIONS UNDER THESE TECHNIQUES ALSO PROVED INTERESTING. WHEN A STRONG ASSOCIATED MUSCLE WAS FOUND TO REACT TO TL OR CHALLENGE (USUALLY IF ONE REACTED THE OTHER ONE WOULD AS WELL) AND IT HAD NOT BEEN ARTIFICIALLY CREATED BY THE AUTHOR, IT, TOO, COULD BE MADE TO WEAKEN BY BACKWARDS RUNNING OF THE MERIDIAN. PERSISTANCE IN TRYING TO FIND THE CAUSE FOR THE SPECIAL RELATIONSHIP REVEALED THAT IN ALMOST ALL CASES THE INITIALLY STRONG MUSCLE COULD BE MADE TO WEAKEN BY USING THE BREATHE HOLDING TECHNIQUE AS DESCRIBED BY GOODHEART FOR UNCOVERING HIDDEN MERIDIAN PROBLEMS. RICHARD MELDENER, DC, SPOKE OF A FACTOR HE CALLS DIAPHRAMATIC ISOMETRIC RECRUITMENT IN THE SUMMER, 1983 COLLECTED PAPERS OF THE MEMBERS OF ICAK. HE BELIEVES THAT THE PATIENT WILL ATTEMPT TO GAIN EXTRA ENERGY FOR MUSCLE TESTING PURPOSES BY ISOMETRICALLY CONTRACTING THE DIAPHRAGMIC MUSCULATURE. IT APPEARS TO BE A SIGNIFICANT FACTOR IN THE EVALUATION FOR MERIDIANS IN A SLIGHTLY WEAKENED STATE. THE DIAPHRAGM LOCKING IN THESE CASES WHERE THE MERIDIAN IS NOT IN A MAJOR DEFICIENCY SEEMS TO BE IMPORTANT TO THE ULTIMATE CORRECT DIAGNOSIS.

THE POSITIVE REACTION TO TESTING A STRONG ASSOCIATED MUSCLE AGAINST ITS ALARM POINT IS REMENISCENT OF TESTING A MUSCLE AGAINST ANY ONE OF ITS OTHER CIRCUITS. IT IS WELL ACCEPTED THAT AFTER COMPLETION OF NEUROLYMPHATIC STIMULATION, ONE MAY CHECK TO SEE IF SUFFICIENT ACTIVITY WAS DONE BY TESTING THE NOW STRONGER MUSCLE AGAINST TL TO THE SAME CIRCUIT. A WEAKENING OF THE MUSCLE INDICATES A FURTHER NEED FOR STIMULATION. IN LIGHT OF THIS AND THE OTHER EVIDENCE, THE ALARM POINT-ASSOCIATED MUSCLE TEST EVALUATES A SPECIAL DEFICIENCY STATE RATHER THAN AN EXCESSIVE ONE.

ALTHOUGH EVIDENCE SUGGESTS STRONGLY THAT ALL THE TESTED PROCEDURES ARE ONLY RELIABLE FOR LOCATING THE DEFICIENT MERIDIAN, THE RESULTS ARE NOT ALL EXCLUSIVE. MOST REGULARLY WOULD THEY REACT TO SOME OR ALL OF THE DEFICIENCY STATES FOUND IN THE STUDY. NONE OF THEM REACTED TO THE OVER-ENERGY STATES. IT WAS FELT THAT A FUTHER EVALUATION OF THE EXCESS CONSTANTS WAS NEEDED.

A NOVEL APPROACH

THE NEGATIVE RESULT TO THE SURVEY OF PRESENT TECHNIQUES AS TO THEIR ABILITY TO MEASURE EXCESS ENERGY IN THE MERIDIAN SYSTEM HAS DONE LITTLE TO PROVIDE AN ANSWER TO THE OVER-ENERGY QUESTION. WHILE IT HAS APPEARED TO CLEAR UP SOME OF THE CONFUSION, NO REALISTIC GAINS WILL HAVE BEEN MADE UNTIL A PROCESS OF MEASUREMENT FOR OVER-ENERGY IS FOUND.

IT WAS REASONED THAT THE ONLY WAY IN WHICH TO FIND THE OVER-ENERGY STATE VIA THE WEAK MUSCLE WAS TO CAUSE THE BODY TO 'TRIP A FUSE', SO TO SPEAK. IF WE SUPPOSE THAT THE ELECTROMAGNETIC EFFECT OF THE EXCESS MERIDIAN COULD BE REROUTED SO THAT IT CAUSED A SURGE OF POWER ENOUGH TO ACTIVATE A SWITCHING MECHANISM IN THE BODY, PERHAPS THE BODY WOULD REACT BY SOME SORT OF WEAKNESS. IT IS THEORIZED THAT THIS IS THE REASON FOR THE FAILURE OF THE PREVIOUSLY TESTED METHODS. THEY WERE NOT MAKING THE BODY BLOW A FUSE. BECAUSE OF THE HIDDEN QUALITY OF THE PROCEDURES WHERE THE ASSOCIATED MUSCLE WAS NOT FOUND WEAK IN THE CLEAR, A DECEPTION OF SORTS HAS PREDISPOSED AN INCORRECT CONCLUSION TO THE POSITIVE FINDING.

A FUSE WILL SIT AT A CRITICAL PLACE IN A CIRCUIT IN ORDER TO PROTECT THE SYSTEM FROM GREAT DAMAGE. IF WE ASSUME THAT THE BODY HAS SOME SORT OF OVER-RIDE CIRCUIT FOR THE MERIDIAN SYSTEM, WE MIGHT FIND IT IN AN AREA THAT HAS SOME MONITORING FUNCTION OVER ALL OTHER SUB-CIRCUITS. TWO POINTS MEETING THIS CRITERIA ARE THE GREAT LUO POINT AT SP. 21 AND THE HOME OF ALL ASSOCIATED POINTS AT K-27. THEY ARE WELL KNOWN FOR THEIR UBIQUITOUS QUALITY IN THAT THEY MAY BE USED WHEN ANY OF THE OTHER MERIDIANS ARE REACTIVE. IT WAS THOUGHT THAT ONE OF THEM MIGHT SERVE AS A LIKELY TRIPPING MECHANISM FOR THE SHORTING OF THE EXCESS MERIDIAN.

THE SAME PROCEDURE AS WAS USED BEFORE WAS INCORPORATED IN THIS SEARCH. IF A PATIENT DID NOT REVEAL A 24-HOUR FAULT, AN ARTIFICIALLY INDUCED EXCESS WAS ATTEMPTED. AGAIN, THE LOWEST STIMULATION TIMES WERE TRIED FIRST. SPLEEN 21 WAS THE FIRST CHOICE AS K-27 WAS THOUGHT TO HAVE BEEN THOROUGHLY EXPLORED UNDER ITS SWITCHING ACTIVITY.

SPLEEN 21 QUICKLY PRODUCED NO RESULTS AS TO REACTING TO ANY OF THE SUPPOSED EXCESS STATES. THE MUSCLES ASSOCIATED TO THE MERIDIANS IN EXCESS WERE TESTED AGAINST SP-21 UNDER TL, CHALLENGE, BREATHE HOLDING AND EID MODES TO NO AVAIL. DOUBLE TL OF THE SP-21 AND THE VARIOUS ALARM POINTS WAS EQUALLY NEGATIVE.

RELUCTANTLY, K-27 WAS PUT THROUGH THE SAME TESTING PROCEDURE. FIRST, K-27 WAS THERAPY LOCALIZED WHILE THE ASSOCIATED MUSCLE WAS TESTED FOR STRENGTH. AN AMAZING WEAKNESS OCCURRED IN THE MUSCLE WHICH HAD NOT BEEN PRESENT IMMEDIATELY BEFORE. AFTER RECOVERING FROM THE SURPRIZE, THE MUSCLE WAS TESTED AGAIN AND IT REMAINED WEAK. FOR SECURITY MEASURES THE PATIENT WAS RE-TESTED FOR THE SWITCHING REACTION USING A DIFFERENT MUSCLE. NO WEAKNESS OCCURRED. CONTINUED EXPERIMENTATION WITH THIS PROCEDURE REVEALED THAT IT MIGHT INDEED BE THE WANTED FUSE MECHANISM. A STIMULATION OF THE TONIFICATION POINT OF BETWEEN 4-6 SECONDS IS OFTEN ENOUGH TO CAUSE THE K-27/ ASSOCIATED MUSCLE TEST REACTION TO OCCUR. BY STIMULATING THE POINT EVEN LONGER, A MORE DEFINITE WEAKENING OF THE ASSOCIATED MUSCLE IS BROUGHT ABOUT. FURTHER, THE MERIDIAN FOUND TO BE BLOCKED BY THE 24-HOUR METHOD ALSO REACTED POSITIVELY UNDER THESE TESTING CONDITIONS.

TWO PROVISIONS WERE FOUND TO CLEARLY DIFFERENTIATE THIS FINDING FROM THAT OF THE NORMAL SWITCHING REACTION. FIRST, ANY MUSCLE TESTED WHILE THERAPY LOCALIZING TO K-27 WHICH DOES NOT HAVE A RELATED EXCESS MERIDIAN, SHOULD NOT WEAKEN. IF IT DOES WEAKEN, THEN OVER-ENERGY IS NOT THE FINDING AND SWITCHING IS. THUS, ONLY THE MUSCLE(S) RELATED TO THE OVER-ENERGY MERIDIAN SHOULD BE FOUND TO WEAKEN UNDER THIS TL PROCEDURE. SECOND, THE K-27 POINT MUST BE THERAPY LOCALIZED ON THE SAME SIDE (IPSILATERALLY) AS THE MUSCLE TESTED. CONTRALATERAL TL AND MUSCLE TEST SHOULD NOT CAUSE THE MUSCLE TO WEAKEN UNLESS SWITCHING IS AGAIN THE CAUSE. THEREFORE, IN ORDER TO ELIMINATE ANY SWITCHING REACTION POSSIBILITIES, ONE MUST JUST TEST THE SAME MUSCLE ON THE OTHER SIDE, SWITCH K-27 POINTS AND/OR USE ANY OTHER STRONG INDICATOR MUSCLE NOT ASSOCIATED WITH THE SAME MERIDIAN.

A NATURAL PROGRESSION TO THE FIRST FINDING WOULD BE TO SEE IF THERAPY LOCALIZATION TO K-27 AND THE SUSPECTED ALARM POINT WOULD BRING ABOUT THE SAME RESULTS. BY TESTING A STRONG INDICATOR MUSCLE WHILE DOUBLE THERAPY LOCALIZING BOTH K-27 AND AN ALARM POINT SEEMS TO WORK EQUALLY AS WELL. IN FINDING THE OVER-ENERGY STATE. AGAIN, THE K-27/ALARM POINT REACTION WILL ONLY OCCUR ON THAT SIDE OF THE BODY EXHIBITING THE EXCESS ENERGY. IF BOTH SIDES ARE INVOLVED, THEN, OF COURSE, BOTH DOUBLE TL PROCEDURES WILL PRODUCE POSITIVE FINDINGS.

THE ONLY PROBLEM WITH THE DOUBLE TL SYSTEM IS THAT IT TENDS TO TIE UP BOTH HANDS AND NOT ALLOW FOR THE POSSIBILITY OF SEARCHING FOR ANOTHER TL POINT WHICH WILL NEGATE THE RESPONSE. IN THIS INSTANCE, THE K-27/ASSOCIATED MUSCLE TEST IS BETTER SUITED TO LOCATING THE CAUSE OF THE HYPER-ENERGY STATE. BY ENABLING THE PATIENT TO USE THE FREE HAND IN A SEARCH MODE. OF COURSE, AS WITH OTHER MERIDIAN TESTS, THE DOCTOR MAY SUBSTITUTE HIS/HER OWN HAND IN NECESSARY SITUATIONS, BUT IT IS RECOMMENDED THAT FOR INCREASED ACCURACY OF TESTING, ONLY THE PATIENT'S HANDS BE USED WHEREVER POSSIBLE.

PATIENT MANAGEMENT WHILE INCORPORATING THE TECHNIQUE INTO DAILY CLINICAL USE HAS BEEN REWARDING. IN DIFFICULT PAIN SITUATIONS IT HAS PROVEN ESPECIALLY USEFUL. SHOULD THE MUSCULATURE SURROUNDING THE PAIN AREA HAVE BEEN TESTED AND TREATED, YET THERE REMAINS SOME RESIDUAL TENSION AND PAIN ON PALPATION, OFTEN, THE MERIDIAN RELATED TO THE MUSCULATURE IS FOUND TO REACT POSITIVE UNDER THIS EXAMINATION. USING THE FREE HAND TO LOCATE THE CAUSE OF THIS REACTION. OFTEN REVEALS SOME MISSED MECHANICAL FAULT IN THE LOCAL OR REMOTE AREA TO THE PAIN. IN LOW-BACK CASES A RESIDUAL, PALPITORY PAIN CAN BE ELICITED OVER THE ERECTOR SPINAE MUSCULATURE ON A REGULAR BASIS. BY TESTING THE ERECTOR SPINAE OR BY TESTING SOME OF THE MUSCLES OF THE FOOT RELATED TO THE BLADDER MERIDIAN, WHILE HOLDING A TL TO K-27, A POSITIVE REACTION IN THE FORM OF A WEAKENING CAN BE BROUGHT ABOUT. AGAIN, BY USING THE PATIENT'S FREE HAND, THE NEGATOR OF THE RESPONSE CAN BE FOUND AND TREATED. PALPATORY PAIN TO THE MUSCULATURE IS NORMALLY REDUCED SIGNIFICANTLY, OR CAN BE TAKEN COMPLETELY AWAY.

ONE LAST QUESTION REMAINED TO BE RESOLVED. IF THIS STUDY SHOWS CORRECT AND EXCESS MERIDIANS DO NOT THERAPY LOCALIZE, CHALLENGE, OR TEST UNDER ANY OF THE PREVIOUSLY USED METHODS, WHY IS IT THAT THE EXCESS MERIDIAN DOES TL WHEN IN THE 5-ELEMENT FAULT? EXAMINING THIS PHENOMENON PROVED VERY FRUITFUL. THE SAME MERIDIAN FOUND TO BE THE CAUSE OF THE BLOCK BY THE 5-ELEMENT ANALYSIS WAS FOUND TO REACT POSITIVELY TO THE K-27/ASSOCIATED MUSCLE TEST. THIS EXCEPTION TO THE RULE PERTURBED THE WRITER IMMENSELY UNTIL HE BEGAN EXAMINING THE COUPLED MERIDIAN IN GREATER DEPTH. THE ASSOCIATED MUSCLE OF THE COUPLED MERIDIAN, AS A RULE, DOES NOT TEST WEAK IN THE CLEAR. BUT IT WILL SUCCESSFULLY WEAKEN WHEN PUT UNDER SOME OTHER, MORE ACCURATE TEST PROCEDURE. SOMETIMES THE COUPLED MERIDIAN WILL WEAKEN UNDER ONE OF THE TESTING METHODS DISCUSSED ABOVE. AT OTHER TIMES THE PURPOSEFUL RELAXATION OF THE LOCKED DIAPHRAGM WILL ELUCIDATE THE WEAKENING. IN EVERY CASE EXAMINED, THE COUPLED MERIDIAN COULD BE FOUND TO BE DEFICIENT NOT IN THE CLEAR.

APPARANTLY, THE PULSE POINT TL WORKS MUCH LIKE THE TS LINE. OFTEN THE TS LINE HAS REVEALED MUSCLE WEAKNESSES WHERE NO MUSCLE WEAKNESS COULD BE FOUND. AS EXPERTISE IN A-K DEVELOPED WITH THE YEARS, THE WEAKNESSES COULD BE BROUGHT ABOUT WITH MORE PRECISION. IT IS THE BELIEF OF THE AUTHOR, BASED UPON THE RESULTS OF THIS STUDY, THAT THE PULSE POINT DIAGNOSIS HAS ALWAYS BEEN REVEALING THE DEFICIENCY, NOT THE EXCESS. IT HAS ONLY BEEN THE INABILITY TO PRECISELY DEFINE THE DEFICIENCY WHICH HAS CAUSED THE PROBLEM.

CONCLUSION

THE CULMINATION OF THIS SEARCH HAS AIDED THE AUTHOR TO UNDERSTAND THAT A SINGLE, CRITICAL ERROR OF INTERPRETATION HAS POSSIBLY GIVEN BIRTH TO THE INITIAL MISCONCEPTION THAT MERIDIAN OVER-ENERGIES COULD BE THERAPY LOCALIZED. THE EARLY FINDINGS BY GOODHEART ON THE 24-HOUR AND 5-ELEMENT FAULTS WERE ESSENTIALLY CORRECT AND THE TREATMENT REGIMEN WORKED TOO WELL. AT THE TIME, THE FACT THAT NO PRECISION TECHNIQUES HAD BEEN DEVELOPED FOR LOCATING LATENT PROBLEMS

WAS OF LITTLE CONSEQUENCE TO THE FINAL OUTCOME OF THE TREATMENT. THE ERROR SEEMS TO HAVE ARISEN FROM THE FACT THAT THE FIRST WEAK MERIDIAN AFTER THE BLOCK OR ASSOCIATED WITH THE BLOCK HAPPENS TO BE THE COUPLED MERIDIAN. SINCE THEY BOTH SHARE THE SAME PULSE POINT, IT STANDS TO REASON THAT AN ERROR OF THIS SORT COULD COME ABOUT. IN SUPPORT OF THIS THEORY, ONE MAY ASK AS TO WHY THE EXCESS WILL TL AT THE PULSE POINT BUT NOT AT THE EXCESS ALARM POINT. A DISCREPANCY SUCH AS THIS SHOULD NOT EXIST. THE ALARM POINT SHOULD CONFIRM WHAT HAS BEEN LOCATED AT THE PULSE POINT. IF THE PULSE POINT WILL TL, SO SHOULD THE ALARM POINT. THE COUPLED MERIDIAN SATISFIES THIS CRITERIA BETTER THAN THE EXCESS MERIDIAN. THE ALARM POINT OF THE COUPLED MERIDIAN WILL TL TO ITSELF WHILE TESTING THE STRONG ASSOCIATED MUSCLE, OR BY EID, OR SOME OTHER TECHNIQUE. THE INITIAL INFERENCE TO THE EXCESS MERIDIAN IN THE 5-ELEMENT FAULT, ALTHOUGH CORRECT, COMBINED WITH THE INABILITY TO FIND THE LATENT DEFICIENCY, WAS THE INADVERTANT BEGETTING OF A MISCONCEPTION. THE AUTHOR BELIEVES THAT THIS ERROR AT A CRITICAL POINT IN DEVELOPMENT OF THE MERIDIAN ANALYSIS, HAS PERPETUATED A BELIEF WHOSE RESULT IS SEEN AS THE CONFUSION PRESENT IN THAT SYSTEM TODAY.

THE PURPOSE OF THIS PAPER HAS BEEN TWO-FOLD: ON THE ONE HAND, IT IS THE INTENT OF THE WRITER TO SHOW THE THOUGHT PROCESSES LEADING TO AND CONCLUDING THE STUDY. A BACKGROUND DISCUSSION OF EXISTING TECHNIQUES WAS THOUGHT NECESSARY FOR THE CLARITY OF UNDERSTANDING. SECOND, THERE IS A DEFINITE NEED FOR UNIFYING SOME OF THE THEORIES BEHIND THE VARIOUS TECHNIQUES TAUGHT. NOT THAT EVERYONE MUST BE ONE IN MIND, ONLY THAT VAST DICHOTOMIES OF THOUGHT ON ONE POINT ARE GOOD EVIDENCE OF AREAS WHICH LACK UNDERSTANDING. THE END RESULT OF THIS STUDY IS THE REFUTATION OF EXISTING THINKING AND AN ATTEMPT AT CRITICAL REFORMATION. ICONOCLASTIC PURPOSES FOR THIS PAPER HAVE NOT NOW, NOR HAVE THEY EVER BEEN A MOTIVE.

THE AUTHOR PRESENTS THIS PAPER TO THE MEMBERS OF ICAK FOR CRITICAL APPRAISAL AND EVALUATION. IT IS HOPED THAT SHOULD THE PROCEDURE PROVE ACCEPTABLE, NEW AREAS OF DISCOVERY, HITHERTO UNDEVELOPED, WILL OPEN UP IN THE FUTURE.

JOSEPH SHAFER, DC
DENMARK

REFERENCES

- ¹ SHELDON DEAL, LECTURE NOTES, 1983.
- ² GEORGE GOODHEART, JR., APPLIED KINESIOLOGY 9TH ED. (DETROIT, MI: PRIVATELY PUBLISHED 1973).
- ³ GEORGE GOODHEART, JR., APPLIED KINESIOLOGY 13TH ED. (DETROIT, MI: PRIVATELY PUBLISHED 1977).
- ⁴ FELIX MANN, ACUPUNCTURE: THE ANCIENT CHINESE ART OF HEALING AND HOW IT WORKS SCIENTIFICALLY (NEW YORK, NY: VINTAGE BOOKS 1973).
- ⁵ RICHARD MELDENER, "DIAPHRAGM ISOMETRIC RECRUITMENT", COLLECTED PAPERS OF THE MEMBERS OF THE INTERNATIONAL COLLEGE OF APPLIED KINESIOLOGY, SUMMER 1983.
- ⁶ D.D. PALMER, THE SCIENCE, ART, AND PHILOSOPHY OF CHIROPRACTIC (PORTLAND, OR: PORTLAND OREGON PRINTING CO., 1910, PALMER COLLEGE OF CHIROPRACTIC REPRINT).
- ⁷ ROLLA J. PENNELL AND GORDON D. HEUSER, THE "HOW TO" SEMINAR OF ACUPUNCTURE FOR PHYSICIANS (INDEPENDENCE, MO: IPCI INC., 1973).
- ⁸ FRED STONER, THE ECLECTIC APPROACH TO CHIROPRACTIC (LAS VEGAS, NEVADA: FLS PUBLISHING CO., 1975).
- ⁹ JOHN F. THIE WITH MARY MARKS, TOUCH FOR HEALTH (MARIAN DEL REY, CA: DE VORSS & CO., 1973).
- ¹⁰ DAVID WALTHER, APPLIED KINESIOLOGY: THE ADVANCED APPROACH IN CHIROPRACTIC (PUEBLO, CO: SYSTEMS DC, 1976).
- ¹¹ DAVID WALTHER, PRIVATE TELEPHONE CONVERSATION, FEB., 25, 1984.
- ¹² THOMAS WING, APPLIED ELECTRO-ACUPOINT THERAPY WORKSHOP MANUAL (LOWER LAKE, CA: SEE-DO PRESS, 1982).

CHRONIC FIXATION PATTERN CORRECTED BY MANDIBULAR
AND SPHENOIDAL TECHNIQUE
Sheldon Sinett, F.C.

Abstract: Chronically recurring fixation of Vertebral Segments corrected by Cranial Manipulation of the Sphenoid and Mandible. This technique has been found to result in long lasting stabilization of this condition.

Our last paper on this subject involved the use of light to reduce fixation. Dr. Sheldon Deal explained his diagnosis via lights and dark rooms or black paper resulting in weakness to indicator muscles as positive for fixation. As reported, we found the technique of shining a light over the Glabella to reduce fixation as well as increase flexibility. However, the condition did recur in a relatively short time.

At present we have found a technique to decrease the recurrence of Spinal Fixation, and the lack of Spinal Flexibility. The use of light as the diagnosis indicates an involvement of the Pineal Gland. As written in Neurological Texts the exact function of the Pineal Gland is not completely understood. Dr. Murray L. Barr writes of the Gonadotropic affect as a primary function. It is explained that the Gland has its affect through the Pituitary and the Growth Hormones. It is further explained that light will decrease the Gonadal affect and darkness will increase its affect. These studies have been completed on lower vertebrates only.

The diagnosis for Fixation has been Bilateral Muscle Weakness, Kinetic Therapy Localization, Motion Palpation and now the use of light and dark. The assumption was that if light and dark will indicate fixation then the Pineal Gland must be directly involved with fixation.

After study of this pattern we feel that the primary source of recurring fixation is the Dural Torque resulting from the compression of the Sphenoid and Mandible. This Cranial involvement will then lend itself to the onset of

Pineal Dysfunction which is picked up as the initial diagnosis but is not the primary cause.

Simply stated it is the Dural Torque created by Mandibular and Sphenoidal involvement that perpetuates a fixation condition. In addition this same Dural Torque will compromise Pineal Function.

At present we have only found compression of these bones to be involved, other patterns may exist. After correction, testing for fixation is negated, flexibility increased. The initial problem of frequent recurrence of the condition has been alleviated.

BIBLIOGRAPHY

1. Dr. Murray L. Barr THE HUMAN NERVOUS SYSTEM
1979 Harper and Row Pages 154-155
2. Dr. Sheldon Deal New York Seminar 1982
3. Dr. George Goodheart APPLIED KINESIOLOGY
RESEARCH MANUAL 1970 - 1971
4. Dr. Sinett/Dr. Askinasi THE USE OF LIGHT TO
INCREASE SPINAL FLEXIBILITY 1983 ICAK Col-
lected Papers Summer Edition

HYDROCHLORIC DEFICIENCY, ATLAS SUBLUXATION: RELATED CONDITIONS

John O. Stoutenburg, D.C.

ABSTRACT: An important aspect of many chronic health problems is a hydrochloric acid deficiency. This condition may cause, or be caused by an anteriorly subluxated atlas.

The Applied Kinesiologist always searches for the primary causes of health problems. One factor that should always be assessed is the patient's hydrochloric acid status. Clinical indicators are bilateral pectoralis major clavicular weakness (tested simultaneously), bloating and gas after eating, poor absorption, chronic sinusitis, positive heidelberg capsule test.

The bloated gassy feeling after eating is due to bacterial degradation of poorly digested and malabsorbed food. The gastric peptidases function best in the normal pH1 medium. Acid chyme is the stimulus for the release of pancreatic bicarbonate, lipidases, peptidases, and other exocrine products. In the hypochlorhydric patient, none of these enzymes function optimally. The intestinal flora derive the benefit of the food, at the patient's expense.

As a further insult to the patient's health, this bacterial degradation will expose the patient's intestines to peroxidized and rancidified lipids (which are carcinogenic) and short-chain polypeptides (which are allergenic). These noxious chemicals will strain the body's detoxification systems and will cause subluxations due to viscerosomatic reflexes.

This debilitating series of events can be circumvented by attending to a hydrochloric acid insufficiency.

The major spinal condition related to a hydrochloric acid deficiency is the anteriorly subluxated atlas. This subluxation is present in many patients and can cause a variety of clinical pictures seemingly unrelated to

-2-

the gastro-intestinal disturbance.

One common situation is extremity parasthesia. The usual diagnostic workup includes assessment for nerve root impingement at C5-T1 for the upper, L4-S4 for the lower extremities, using appropriate orthopedic, neurological and radiological procedures. Vascular insufficiency must be ruled out.

The patient should also be checked for atlas anteriority. An explanation of the association of the anterior atlas and extremity parasthesia is the close proximity of the fasciculi gracilis and cuneatus to the posterior arch of the atlas. These tracts carry sensory information from the joints, tendons, muscle, hair follicles, and skin of the entire body, excepting the face. Anterior subluxation of the atlas could cause embarrassment of the posterior cord, interpreted by the cortex as numbing, tingling, burning, etc.

Atlas anteriorly has been found more frequently in cases of bilateral rather than unilateral extremity parasthesia. Other patients who have benefited from atlas correction have been diagnosed as having carpal tunnel syndrome, cervical disc protrusion and writers cramp.

Often a hydrochloric deficiency will be found with the anterior atlas. Supplementation with betaine hydrochloride may be necessary to hold the correction of the atlas.

T12-L1 FIXATION: A MASKING PHENOMENON

John O. Stoutenburg, D.C.

Previous research by Dr. Walter Schmidt has shown that an uncorrected fixation at T12-L1 will mask the presence of a hydrochloric acid deficiency.

This masking phenomenon also applies to subluxation patterns, such as category 1 or 2 pelvis, spinal subluxations, or TMJ lesions. The patient may have any or all of these problems, yet they will be negative to challenge or therapy localization until the T12-L1 fixation is broken. Common sense, therefore, dictates that the physician should check for the presence of T12-L1 fixation, in order to avoid false negatives during the regular exam.

Fixation at this level can be motion palpated in the sitting position, with fingers on the adjacent spinouses. Joint play should be felt in rotation, flexion-extension and lateral flexion. Challenge, using an intact indicator muscle can be performed in the sitting or prone position. The lower and or middle trapezius, when tested bilaterally in the prone position will frequently be weak.

A symptomatic patient who responds negatively to challenge can be a frustrating experience. Unlocking a T12-L1 fixation can unmask the patient's true picture.

SEVEN BLOCKS OF ENERGY

Mark Terry, D.C.

Abstract: A discussion explaining one difference between infectious disease and chronic degenerative disease using seven blocks to describe the mechanism of contracting a chronic, degenerative disease or condition.

What follows is an explanation to laymen concerning our efforts to help with their health problems. It is a program I have given several times and is fun to do. Some of the ideas came from Dr. Cheraskin's research and also from my own observations of people.

In infectious illness one comes in contact with the bacteria or infective agent. This is the first stage which is called the infectious stage. The second stage is when the micro-organism is building up virulence. We know today that its not so much that the micro-organism is building up virulence but that there is a war going on between the immune system of the body and this agent. When the immune system of the body is losing then the second stage of disease is present, which we call incubation. The third stage, such as in measles, is when a macular rash or Koplik's spots appear. This is the lesion stage. In almost every instance the fourth stage, crisis, appears - the fever breaks and the person gets well. There is a four stage process in infectious disease.

For the most part, people don't die from infectious disease as in the past. In large measure this can be attributed to immunizations, various medications, and improvement in hygiene and sanitation. What people are suffering needlessly from and dying from today is called degenerative or constitutional disease.

Lets list some: asthma, emphysema, chronic bronchitis, colitis, diverticulitis, diverticulosis, diabetes, cardiovascular disease in the form of arteriosclerosis, atherosclerosis, pre-ventricular contractions, congestive heart failure, arthritis, ulcers, bursitis, nephritis, coronary artery disease, hyperthyroidism, hypothyroidism.

How do people develop degenerative conditions? These conditions do develop and in stages also. At one time or another we have heard of an individual with a normal EKG and a few days later he/she has succumbed to a heart attack. The reasons for this are numerous - one might be that an EKG may not be predictive of heart function but a detector of past dysfunction. Another example is the patient who reaches up with his arm and has sudden sharp pain in the shoulder and immediately has bursitis. It is not because he sat under the fan last night. Usually these situations do not begin on the day that the pain and suffering is first noticed.

Stage one in the development of constitutional or degenerative diseases is a block in the energy flow of the body. The energy flow of the body is initiated, controlled and distributed throughout the body by the brain, cranial nerves,

spinal nerves, autonomic nerves, and something we call acupuncture meridians. Any disruptions from any cause will produce aberrant information to be sent over these so-called "channels of energy". The way your body accomplishes movement, thinking, digestive, or respiratory functions is for an impulse to be transmitted through any or all of these channels. There is an electrical flow that moves through the body and a disruption of this energy flow over the nervous system is an integral part of the dysfunction of the body. That is the first stage of the development of degenerative conditions. The condition is like seeing a forest fire on television - it did not start as a raging fire but from a spark. A nerve carries two things; one is energy to produce action and the other is direction that makes the action intelligent. Subluxations in the neck or back, nutritional deficiencies, either readily apparent or sub-clinical, energy levels lower than optimum all create obstructions in the energy flow in the body.

Stage two is the body's inability to produce enzymes. There are many different types of enzymes. For purposes of clarification we'll discuss digestive enzymes. When the level of enzymes are insufficient some symptoms may be; bloating, belching, gas, possibly heartburn. The common way of handling this is to use antacids. This does not correct the enzyme problem but bleeds away the effects which leaves intact impending future breakdown.

Stage three or the next level of disease is in the hormone system. There are thyroid hormones, insulin from the pancreas, sex hormones such as estrogen, and pituitary gland hormones. Now our disease is beginning to expand and our fire is spreading. It is at this level that one begins to realize that he/she does not feel well. Something is not right but you have the answer as to why. The shoulder hurts but that is due to the tennis you played the other day. Your feet hurt but you think that is due to the new shoes. You have a headache but it is due to something at work or something that has been eaten in the last 24 hours. Your legs cramp but that is due to being on your feet. It is at this point that an appointment is made for you with your family doctor. Nothing is found wrong with you and you start to worry about your mental stability. As a patient you don't want to believe it but you don't know what else to believe.

The next block or stage is called toxins. Endogenous toxins are those that the body produces from normal physiology. Because of the previous lack of energy in the previous three stages the body cannot rid itself of these toxins as efficiently as it should. We might say at this point that what your body might be able to use but now cannot presently use is toxic. This is the stage where all the medical work-up is performed such as blood studies, EKG, pap smears, chest x-rays, upper & lower GI, and CT scan. They turn out negative because at this stage the disease is functional in nature. The tests that have been performed do not operate at this level. These tests do not discover disease at this level because they are not designed to discover disease at this level. You, the patient, feel terrible and the doctor says everything is normal because all the tests are negative.

Stage five is organizable symptoms. At this point the vague symptoms are put together to get a diagnosis. Here is how that works. The patient gives all his complaints in English. The doctor recites in Latin what the patient said in English. Now the patient has a name for his list of symptoms, pays his money, and goes away delighted. Why? Because everybody is into names. When your shoulder hurts you want to know whether it is bursitis, arthritis or tendonitis! You're not interested in how it developed. You, the patient, want the name!

Stage six is tissue pathology. At this stage one does not have gas, bloating, or indigestion, it is a real live ulcer. It is here that all the tests are positive and your doctor knows that they are positive and he also knows that his patient is sick! Finally there is someone who is on the side of the patient. The patient is sick enough for all the tests to show up positive on ordinary medical tests.

Stage seven is death of the tissue. For our purposes we will not discuss this stage.

Lets go over some case histories. Ankles are swelling and patient is taking Lasix which may help but it does not address the previous stages. A patient has Prednisone for his emphysema and it helps but does not address the previous stages. A patient has headaches and is taking Fiorinal. It may help but does not address the previous stages. While our patient is on this medication someone better be doing something about the infrastructure upon which the disease process is built.

Trying to control stage six is like having blinders on so you don't have to watch your belongings burn. In comparing the infectious stages versus the degenerative stages one cannot start at stage six to tear down the disease process. It has to start at the beginning which is a block in the energy flow of the body. Society has demanded a remedy for infectious disease and for all practical purposes it has received that remedy. Thus far, society has not demanded a remedy for degenerative disease, probably because society does not understand how degenerative disease develops. Society is using the process of treating infectious disease and trying to to apply it to degenerative disease. It just simply will not work. This is the difference between relieving symptoms and starting to demolish the process on which disease is built.

The foregoing is a discussion that I have given to many different groups explaining what we, as D.C.s, do to help patients. It does not get involved with a certain technique although applied kinesiology is used to demonstrate the different points that can be involved. The response has been very good as each individual can see which stage they may be in concerning their own health. The seven blocks and an outline of the stages are all that is needed to present this program.

POSITIVE AND NEGATIVE POLARITY

Mark Terry, D.C.

Abstract: The use of north pole magnet and south pole magnet in diagnosing subluxation and level of correction is discussed.

From a clinical standpoint the use of north and south pole of a magnet has proved quite useful. One area I have found useful is to apply the south pole at each level of the spine first on one side and then the other to find a positive muscle test. This is meant as a previously strong muscle testing weak. When a certain level tests weak with south pole this indicates a congested, inflamed, or over-active area of nerve function. An adjustment at this level will worsen the symptoms and make the patient worse. From the level of south pole TL, switch the magnet to north pole and proceed above or lateral. There will be a positive TL from north pole above the level of south pole TL or lateral to it. The north pole TL is an area of decreased circulation and function. It is at this point that the adjustment is given in whatever direction vertebral challenging indicates.

This has been an effective and accurate way to diagnose nerve irritation and also where to adjust the segment involved. It can also be used for extremity adjusting. All that is needed is to find a positive north pole TL and adjust accordingly. If a positive south pole TL is found on an extremity, trace the nerve backwards until a positive north pole TL is found and that is the level to adjust.

I pass this information on to the members of ICAK for their use and benefit. Any comments will be appreciated.

SENSORY IMPAIRMENT RATING

Mark Terry, D. C.

Abstract: This subject concerns the loss of function due to sensory deficit, pain, or discomfort.

In determining a rating for pain and/or paresthesia there exists a good amount of ambiguity and subjectivity. As a result pain is classified into four categories and assigned a number.

MILD (0-25%) is pain that annoys but is forgotten during activity.

MODERATE (26-50%) is pain that interferes with activity.

SEVERE (51-75%) is pain that prevents activity.

VERY SEVERE (76-100%) is pain that causes outcries as well as prevents activity.

A rating is not given until MMI has been reached. This in itself is somewhat subjective but has been described as having exhausted all means of conservative and surgical care and a reasonable amount of time has elapsed to permit optimal regeneration and other physiological adjustments to occur.

The origin of the pain must now be ascertained. The categories to use are:

1. Spinal nerve plexuses
2. Spinal nerve roots
3. Named spinal nerves

If a condition arises spinally (IVF), the nerve root values should be used. If the condition arises outside of the spine the named nerve values should be used. Caution must be used for the plexuses because this encompasses functions such as respiration, bowel and bladder function, etc.

Nerve root values are used when dealing with pain or paresthesia in specific dermatomes affecting the neck and back.

Named nerves are used more frequently when pain or paresthesia affects a specific area or dermatome of an extremity.

Where several nerve roots are involved the named nerve is usually used since the nerve roots make up the named nerves. In using multiple nerve roots one may arrive at a rating which is unrealistically high. Whenever in doubt use the named nerve.

To determine the rating the degree of pain and neurological innervation are needed. The formula for SIR:

1. Identify area of involvement.
2. Identify nerve root or nerves which innervate the area.
3. Determine value of nerve in "Guides" for loss of function due to sensory deficit.
4. Evaluate degree of pain or loss of sensation deficit or deficiency.
5. $\#3 \times \#4 = \text{SIR}$ (Value of nerve \times degree of sensory

SIR example:

- Patient has severe pain over posterior thigh.
1. Posterior thigh.
 2. Posterior femoral cutaneous nerve
 3. 5% (from table 9)
 4. Severe pain = 75%
 5. $75\% \text{ of } 5\% = 3.75\% = 4\% \text{ SIR Lower Extremity}$

Tables 1,2,3,7,8 have not been included but are readily available in the AMA "Guides". It is most practical to use the named nerve in calculating SIR. Tables 3 and 8 have named nerves relating to certain areas of the body.

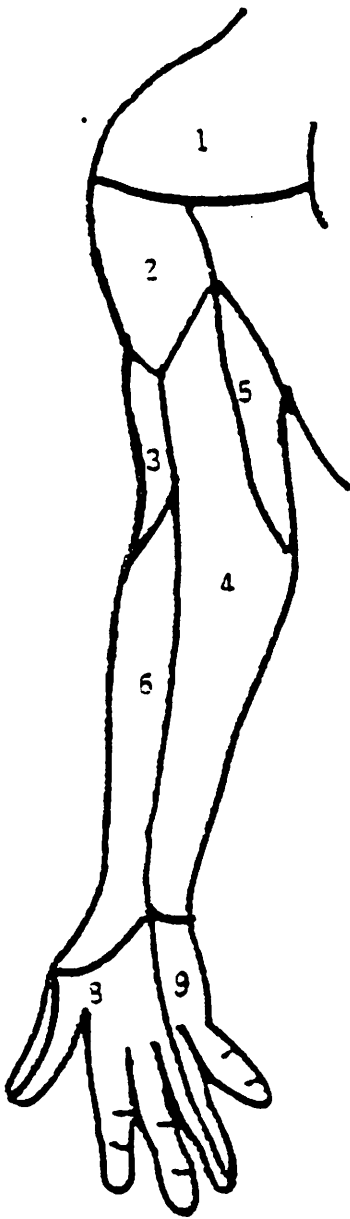
In an AK practice it is most useful to utilize the knowledge available to us as this many times will reduce an already existing SIR or improve the patient enough that a SIR will not be as high.

References

1. IMPAIRMENT RATING FOR DISABILITY EVALUATION, Stanley Kaplan, D.C., 1982.
2. GUIDES to the EVALUATION of PERMANENT IMPAIRMENT, American Medical Association, 1977.
3. CHIROPRACTIC ORTHOPEDICS, Logan College, Disability Impairment Rating notes, Warren Jahn, D.C., 1983.

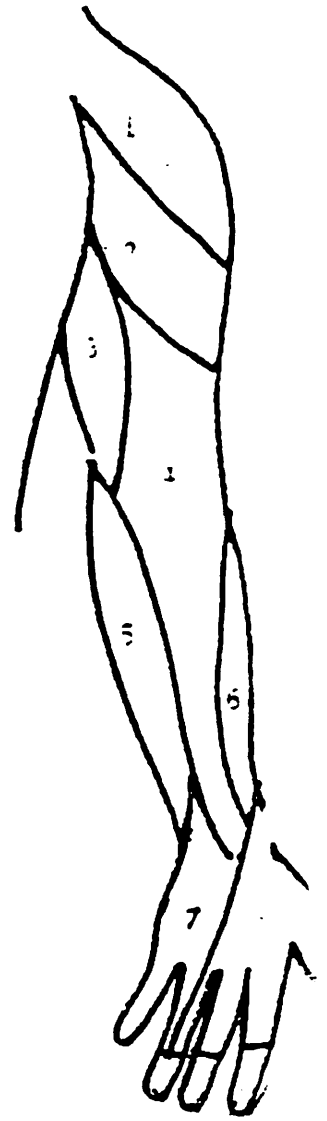
SENSORY IMPAIRMENT RATING (SIR)

Diagram of segmental distribution of the cutaneous nerves of the right upper extremity.



Anterior View

1. Supraclavicular - C3,4
2. Upper lateral brachial cutaneous (Axillary) C5,6
3. Posterior Brachial Cutaneous (Radial) & Lower Lateral Brachial Cutaneous C5,6
4. Medial Antebrachial cutaneous C8,T1
5. Medial Brachial Cutaneous and Intercostobrachial T1,2
6. Lateral Antebrachial Cutaneous (Musculocutaneous) C5,6
7. Superficial Branch of Radial C6,7,8
8. Median C6,7,8
9. Ulnar C8,T1

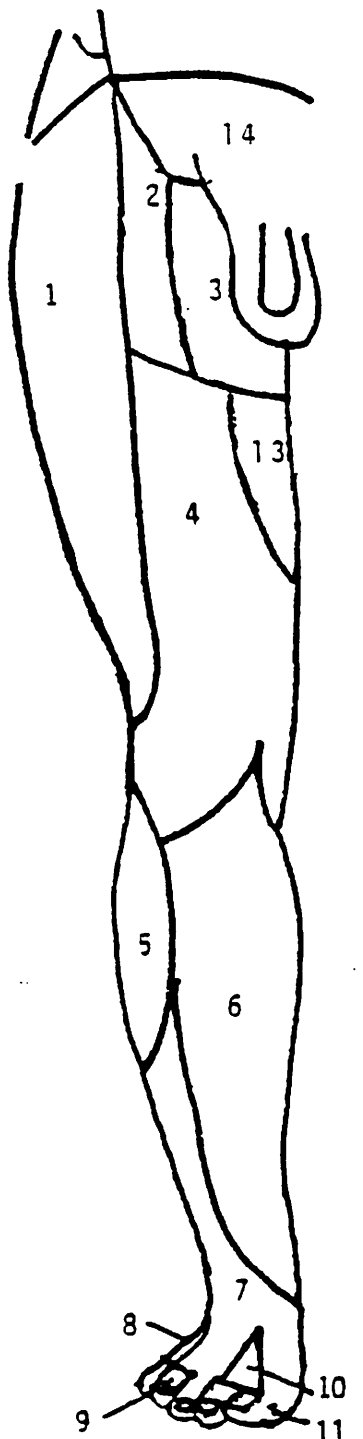


Posterior View

1. Supraclavicular C3,4
2. Upper Lateral Brachial Cutaneous (Axillary) C5,6
3. Medial Brachial Cutaneous and Intercostobrachial T1,2
4. Posterior Antebrachial Cutaneous (Radial) C5,6,7,8
5. Medial Antebrachial Cutaneous
6. Lateral Antebrachial Cutaneous (Musculocutaneous)
7. Ulnar C8,T1
8. Radial C6,7,8
9. Median C5,6,7,8

SENSORY IMPAIRMENT RATING (SIR)

Diagram of segmental distribution of the cutaneous nerves of the right lower extremity.

Anterior View

1. Lateral Femoral Cutaneous L2,3
2. Genitofemoral
3. Ilio-inguinal
4. Femoral N. Ant. Cutaneous Branches L2,3
5. Lateral Sural Cutaneous S1,2
6. Saphenous nerve L3,4
7. Superficial Peroneal nerve L4,5, S1
8. Sural S1,2
9. Lateral Plantar S1,2
10. Deep peroneal L4,5
11. Medial plantar L4,5
12. Tibial S1,2
13. Obturator
14. Iliohypogastric L1

Posterior View

1. Iliohypogastric
2. Dorsal & ventral Rami, Spinal nerves
3. Obturator
4. Posterior femoral cutaneous S1,2,3
5. Femoral N. Ant. cutaneous branches
6. Lateral Femoral Cutaneous L2,3
7. Saphenous L3,4
8. Medial Sural Cutaneous and Sural S1
9. Lateral Sural Cutaneous
10. Superficial Peroneal L5,S1
11. Tibial S1,2

TABLE 4.-SPECIFIC UNILATERAL SPINAL NERVE IMPAIRMENT AFFECTING THE UPPER EXTREMITY

337

Impairment of the Digit

Loss of Function Due to Sensory Defect, Pain or Discomfort

Nerve

Impairment of the Digit	Loss of Function Due to Sensory Defect, Pain or Discomfort	Nerve
0%	0%	Anterior thoracic (pectoral)
0%	0%	Axillary (circumflex)
0%	0%	Dorsal scapular
0%	0%	Long thoracic (posterior thoracic n., external respiratory n. of Bell, n. to serratus anterior)
0%	0%	Medial and brachial cutaneous
0%	0%	Medial brachial cutaneous
0%	0%	Median (above midforearm)
0%	0%	Median (below midforearm)
0%	0%	Branch to radial side of thumb
0%	0%	Branch to ulnar side of thumb
0%	0%	Branch to radial side of index finger
0%	0%	Branch to ulnar side of index finger
0%	0%	Branch to radial side of middle finger
0%	0%	Branch to ulnar side of middle finger
0%	0%	Branch to radial side of ring finger
0%	0%	Branch to ulnar side of ring finger
0%	0%	Musculocutaneous
0%	0%	Radial (musculospiral) upper arm with loss of (iceps) wrist placed in position of function
0%	0%	Radial (musculospiral)(with sparing of (iceps) wrist placed in position of function
0%	0%	Subscapular (upper and lower)
0%	0%	Subscapular
0%	0%	Thoracodorsal (long subscapular; nerve to latissimus dorsi)
0%	0%	Ulnar (above midforearm)
0%	0%	Ulnar (below midforearm)
0%	0%	Branch to ulnar side of ring finger
0%	0%	Branch to radial side of little finger

See Table 6 for converting impairment of upper extremity to impairment of whole man. NOTE: Conversion to whole-man impairment should be made ONLY when all impairments involving the one upper extremity have been combined.

See paragraph in the introduction concerning causality.

**TABLE 9.—SPECIFIC UNILATERAL SPINAL NERVE
IMPAIRMENT AFFECTING THE LOWER EXTREMITY**

Nerve	Loss of Function Due to Sensory Deficit, Pain, or Disorder of Foot
Femoral (anterior crural) ...	0%- 5%
Femoral (anterior crural) (below iliacus nerve)	0%- 5%
Geniofemoral (genito crural) ..	0%
Inferior gluteal	0%
Lateral femoral cutaneous ..	0%-10%
N. to obturator internus muscle	
N. to perforans muscle	0%
N. to quadratus femoris muscle	
N. to superior gemelli muscle	
Obturator	0%
Posterior cutaneous of thigh	0%- 5%
Superior gluteal	0%
Sciatic (above hamstring innervation)	0%-25%
Common peroneal (lateral, or external popliteal) ...	0%- 5%
Deep (above midcalf) ..	0%
Deep (below midcalf) anterior tibial	0%
Superficial	0%- 5%
Tibial nerve (medial, or internal popliteal)	
Above knee	0%-15%
Posterior tibial (midcalf and knee)	0%-15%
Below midcalf	0%-15%
Lateral plantar branch ..	0%- 5%
Medial plantar branch ..	0%- 5%
Sural (external sphenous)	0%- 5%

MOTOR IMPAIRMENT RATING
Mark Terry, D.C.

Abstract: A review of information concerning motor impairment rating and how it is calculated is presented.

During the course of treating and examining patients the occasion sometimes arises to perform a rating evaluating motor function and assigning a value for its impairment. In an applied kinesiology practice sometimes this may prove to be difficult because maximum medical improvement may not have been reached due to the patient not having received applied kinesiology forms of treatment. In my experience patients have asked for a rating after having been referred by another doctor or attorney and we are able to correct a large percentage of their problems. In still other cases patients have been given a rating by an orthoped and through our treatment we again can diminish that rating number. In other instances there does remain permanency and who better is qualified to perform this function than an applied kinesiologist? Our background of muscles, their function and nerve supply serve to be a perfect situation for us. Motor impairment rating is quite simple to do. Caution has to be applied to make sure all forms of care have been used and a reasonable amount of time has elapsed to effect as much improvement as possible.

A muscle grading chart is needed as found on page 17 of Dr. Warren Jahn's notes on Disability Impairment Rating.

The formula for evaluating the motor impairment is as follows:

1. Identify the motion involved
2. Identify the muscle involved
3. Determine the nerve involved with the muscle
4. Determine loss of function value
(from table 4 or table 9) from AMA "Guides"
5. Determine muscle grade
6. Multiply no.4 x no.5 to get M.I.R.

To illustrate lets use this example:

Patient is right-handed and right elbow flexion is determined to be weak with a description of complete range of motion (ROM) without gravity. Our muscle grading chart relates that this is poor or grade 2. The AMA guides gives us a percentage of that grade which is 55-75% impairment. To give the patient the most latitude we use the highest number which is 75%.

To use our formula:

1. R elbow flexion
2. Biceps (from upper extremity chart)
3. Musculocutaneous (nerve from U.E. chart)

4. 25% (from table 4 is loss of function due to loss of strength this is impairment upper extremity value.)

5. 75% (from muscle grading chart)

6. 25% IUE x 75% of muscle grade. This represents % of whole value of nerve (25%) x % of muscle impairment (grade) 75% of loss of function (25) = 18.75% = 19% MIR

When calculating MIR be sure to use the formula of six steps and the appropriate tables. This evaluation is only done after MMI has been reached, as any other impairment rating is done. Not all aspects of MIR have been presented here. Many combinations of motions can be used and thus the figures are combined to arrive at a final number. Also tables 1,2,3,7,8 are used to also determine MIR.

References:

Chiropractic Orthopedics, Logan College, Disability Impairment Rating notes, Dr. Warren Jahn.

Guides to evaluation of Permanent Impairment, American Medical Association, 1977.

Impairment Rating for Disability Evaluation, Stanley Kaplan, D.C., 1982.

Muscle Strength:

In orthopedics the usual procedure for muscle examination is by muscle group and not individual muscles unless clinically warranted. Each group should be examined and given a muscle grade according to Kendall, Kendall and Wadsworth 10.

MUSCLE GRADING CHART

MUSCLE GRADATIONS	DESCRIPTION	GUIDES
5 - Normal - N	Complete ROM against gravity with full resistance.	0%
4 - Good - G	Complete ROM against gravity with some resistance.	5-25%
3 - Fair - F	Complete ROM against gravity.	30-50%
2 - Poor - P	Complete ROM with gravity eliminated.	55-75%
1 - Trace - T	Evidence of slight contractility. No joint motion.	80-90%
0 - Zero - Z	No evidence of contractility	100%

MOTOR IMPAIRMENT RATING (MIR)

Muscle Innervation of the Upper Extremities

Note - For most practical purposes the primary muscle should be used.

Order of Arrangement: Muscle actions; Muscles with spinal cord segments (C=cervical, T=thoracic, L=lumbar, S=sacral). Asterisks (*) indicate muscle(s) chiefly responsible for the movement in question.

<u>SHOULDER</u>	<u>MUSCLE</u>	<u>NERVE</u>	<u>SEGMENTS</u>
Abduction	* Deltoid	Axillary	C5, 6
	* Supraspinatus	Suprascapular	C5, 6
	Infraspinatus	Suprascapular	C5, 6
	Trapezius	X1	C2, 3, 4
Adduction:	* Pectoralis Major	Anterior Thoracic	C5 to T1
	* Latissimus Dorsi	Thoracodorsal	C6, 7, 8
	Teres Major	Subscapularis	C5, 6
Ext. Rotation:	* Supraspinatus	Suprascapular	C5, 6
	* Infraspinatus	Suprascapular	C5, 6
	Teres Minor	Axillary	C5, 6
	Deltoid	Axillary	C5, 6
Int. Rotation:	* Pectoralis Major	Anterior Thoracic	C5 to T1
	Teres Major	Subscapularis	C5, 6
	Latissimus Dorsi	Thoracodorsal	C6, 7, 8
	Subscapularis	Subscapularis	C5, 6
Forward Flex:	* Pectoralis Major	Anterior thoracic	C5 to T1
	* Pectoralis Minor	Anterior thoracic	C5 to T1
	Deltoid	Axillary	C5, 6
	Subscapularis	Subscapularis	C5, 6
	Coracobrachialis	Musculocutaneous	C5, 6
Backward Ext.:	* Latissimus Dorsi	Thoracodorsal	C6, 7, 8
	Teres Major	Subscapularis	C5, 6
	Triceps (long head)	Radial	C6, 7, 8
Elevators:	* Trapezius	X1	C2, 3, 4
	Levator Scapulae	Dorsal Scapular	C3, 4, 5
<u>ELBOW</u>			
Flexion:	* Biceps	Musculocutaneous	C5, 6
	Brachialis	Musculocutaneous	C5, 6
	Coracobrachialis	Musculocutaneous	C5, 6
Extension:	* Triceps	Radial	C6, 7, 8
	Anconsis	Radial	C6, 7, 8

Muscle Innervation (continued)

<u>ELBOW</u>	<u>MUSCLE</u>	<u>NERVE</u>	<u>SEGMENTS</u>
Pronation:	* Pronator Teres	Median	C6
	Pronator Quadratus	Median	C7, 8
	Flexor carpi radialis	Median	C6
Supinators:	* Supinator	Radial	C5, 6
	Biceps	Musculocutaneous	C5, 6
<u>WRIST</u>			
Palmer Flexion	* Flexor Carpi Radialis	Median	C6
	Palmaris Longus	Median	C6
	Flexor Digitorum Sublimis	Median	C6
Extension	* Ext. Carpi Radialis Longus	Radial	C6, 7, 8
Dorsi-flexion	Ext. Carpi Radialis Brevis	Radial	C6, 7, 8
Adduction:	(Ulnar deviation)		
	* Flexor Carpi Ulnaris	Ulnar	C7, T1
	Extensor Carpi Ulnaris	Radial	C6, 7, 8
Abduction:	(Radial deviation)		
	* Flexor Carpi Radialis	Median	C6
	Ext. Carpi Radialis Longus & Brevis	Radial	C6, 7, 8
	Ext. Pollicis Longus & Brevis	Radial	C6, 7, 8
	Abductor Pollicis Longus	Radial	C6, 7, 8

MUSCLE INNERVATION OF LOWER EXTREMITIES

The ten summary movements noted above will be seen to follow a natural progression of movement. This will be made more clear if one performs these movements for himself in the order in which they are written. Furthermore this will aid greatly in fixing the above pattern and make memorization less arduous.

It should be noted that No. 10 is a set of movements that include the whole brachial plexus and hence are always involved to a greater or lesser extent with any lesion of the brachial plexus, or cord segments from C5 to T1.

<u>HIP JOINT</u>	<u>MUSCLE</u>	<u>NERVE</u>	<u>SEGMENTS</u>	
Flexion:	Iliopsoas	Femoral	L2, 3, 4	
	Rectus Femorus	Femoral	L2, 3, 4	
	Pectineus	Femoral	L2, 3, 4	
	Sartorius	Femoral	L2, 3, 4	
	Adductor Longus	Obturator	L3, 4	
	Adductor Brevis	Obturator	L3, 4	
	Abductor Magnus	Obturator	L3, 4	
	Obturator Externus	Obturator	L3, 4	
	Extension:	* Gluteus Maximum	Inferior Gluteal	L5, S1, 2
		Biceps Femoris	Sciatic	L5, S1, 2
Semitendinosus		Sciatic	L5, S1, 2	
Semimembranosus		Sciatic	L5, S1, 2	
Abduction:	* Gluteus Medius	Superior Gluteal	L4, 5, S1	
	Gluteus Minimus	Superior Gluteal	L4, 5, S1	
	Tensor Fas, Lata	Superior Gluteal	L4, 5, S1	
Adductors:	* Adductor Magnus	Obturator	L2, 3, 4	
	Adductor Longus	Obturator	L2, 3, 4	
	Adductor Brevis	Obturator	L2, 3, 4	
	Gracilis	Obturator	L2, 3, 4	
	Obturator Externus	Obturator	L2, 3, 4	
	Sartorius	Femoral	L2, 3	
	Pectineus	Femoral	L2, 3	
Ext. Rotation:	* Sartorius	Femoral	L2, 3	
	Adductores, Mag. Longus & Brevis	Obturator	L2, 3, 4	
	Obturator Externus	Obturator	L2, 3, 4	
	Sup. & Inf. Gemelli	Anterior Rami	S1, 2	
	Piriformis	Anterior Rami	S1, 2	
	Obturator Internus	Anterior Rami	S1, 2	
	Int. Rotation:	* Tensor Fas. Lata	Superior Gluteal	L4, 5, S1
Glut. Med. & Min.		Superior Gluteal	L4, 5, S1	

<u>KNEE</u>	<u>MUSCLE</u>	<u>NERVE</u>	<u>SEGMENTS</u>
Flexion	* Biceps Femoris	Sciatic	L5, S1, 2
	Semimembranosus	Sciatic	L5, S1, 2
	Semitendinosus	Sciatic	L5, S1, 2
	Sartorius	Femoral	L2, 3
	Gracilis	Obturator	L2, 3, 4
	Gastrocnemius	Tibial	S1, 2
Extension :	* Quadriceps Femoris	Femoral	L2, 3, 4
<u>FOOT</u>			
Dorsiflexion :	* Tibialis Anterior	Deep Peroneal	L4, 5, S1
	Ext. Digitorum Longus	Deep Peroneal	L4, 5, S1
	Peroneus Tertius	Deep Peroneal	L4, 5, S1
	Ext. Hallucis Longus	Deep Peroneal	L4, 5, S1
Plantarflexion :	* Gastrocnemius	Tibial	L5, S1, 2
	Soleus	Tibial	L5, S1, 2
	Flexor Digit, Longus	Tibial	L5, S1, 2
	Flexor Hallucis Longus	Tibial	L5, S1, 2
	Tibialis Posterior	Tibial	L5, S1, 2
	Peroneus Longus	Superior Peroneal	L4, 5, S1
Peroneus Brevis	Superior Peroneal	L4, 5, S1	
Inversion :	* Tibialis Anterior	Deep Peroneal	L4, 5, S1
	Tibialis Posterior	Tibial	L5, S1
Eversion :	Peroneus Tertius	Deep Peroneal	L4, 5, S1
	Peroneus Longus & Brevis	Superficial Peroneal	L4, 5, S1

TABLE 4.—SPECIFIC UNILATERAL SPINAL NERVE IMPAIRMENT AFFECTING THE UPPER EXTREMITY

Nerve	Loss of Function Due to Loss of Strength	Impairment of the Digit
Anterior (thoracic (pectoral))	0% - 5%	
Axillary (circumflex)	0% - 35%	
Dorsal scapular	0% - 5%	
Long thoracic (posterior thoracic n., external respiratory n. of Bell. n. to serratus anterior)	0% - 15%	
Medial antibrachial cutaneous	0%	
Medial brachial cutaneous	0% - 35%	
Median (above midforearm)	0% - 35%	
Median (below midforearm)	0%	- 0% - 11%
Branch to radial side of thumb	0%	- 0% - 23%
Branch to ulnar side of thumb	0%	- 0% - 37%
Branch to radial side of index finger	0%	- 0% - 13%
Branch to ulnar side of index finger	0%	- 0% - 42%
Branch to radial side of middle finger	0%	- 0% - 12%
Branch to ulnar side of middle finger	0%	- 0% - 34%
Branch to radial side of ring finger	0%	
Musculocutaneous	0% - 25%	
Radial (musculospiral) (upper arm with loss of triceps) wrist placed in position of function	0% - 35%	
Radial (musculospiral) (with sparing of triceps) wrist placed in position of function	0% - 40%	
Subscapular (upper and lower)	0% - 5%	
Suprascapular	0% - 15%	
Thoracodorsal (long subscapular; nerve to latissimus dorsi)	0% - 10%	
Ulnar (above midforearm)	0% - 35%	
Ulnar (below midforearm)	0% - 25%	
Branch to ulnar side of ring finger	0%	- 0% - 24%
Branch to radial side of little finger	0%	- 0% - 49%
Branch to ulnar side of little finger	0%	- 0% - 49%

*See Table 6 for converting impairment of upper extremity to impairment of whole man. NOTE: Conversion to whole-man impairment should be made ONLY when all impairments involving the one upper extremity have been combined.

†See paragraph in the introduction concerning causalgia.

**TABLE 9.—SPECIFIC UNILATERAL SPINAL NERVE
IMPAIRMENT AFFECTING THE LOWER EXTREMITY**

Nerve	Less of Function Due to Loss of Strength
Femoral (anterior crural) ...	0%-25%
Femoral (anterior crural) (below iliacus nerve)	0%-30%
Genitofemoral (genito crural)	0%
Inferior gluteal	0%-25%
Lateral femoral cutaneous ..	0%
N. to obturator internus muscle	
N. to piriformis muscle	0%-10%
N. to quadratus femoris muscle	
N. to superior gemelli muscle	
Obturator	0%-10%
Posterior cutaneous of thigh	0%
Superior gluteal	0%-20%
Sciatic (above hamstring insertion)	0%-75%
Common peroneal (lateral, or external posterior) ...	0%-25%
Deep (above midline) ..	0%-25%
Deep (below midline)	
anterior tibial)	0%- 5%
superficial	0%-10%
Tibial nerve (medial, or internal posterior)	0%-25%
Above knee	
Posterior tibial (medial and knee)	0%-25%
below medial)	0%-15%
Lateral plantar branch ..	0%- 5%
Medial plantar branch ..	0%- 5%
Sural (external saphenous)	0%

Statistics on the practice of Applied Kinesiology by
members of the International College of Applied Kinesiology.

by

John F. Thie, D.C.

Abstract:

A compilation of practices by members of the International College of Applied Kinesiology, dealing with new patients seen by members of the organization during June and July, 1983. Two hundred and sixty-four different patients charges for initial visits, x-rays taken, use of TS line diagnosis and number of muscles tested on the initial visit.

This paper relates to the practice of Applied Kinesiology by members of the College in 1983. On the form requesting information, the names were optional as was their category or membership. Even though the category was optional, 78 (or 59%) listed themselves as members, 27 (or 20%) listed themselves as board qualified and 23 (or 17%) listed themselves as charter diplomates. Only four forms did not list their status in the organization. The questions were formulated to determine how some of the questions that I had about my practice would be answered by other members. I was interested in the practice procedures rather than the results that were obtained.

The questionnaire is included as Exhibit A. This questionnaire was sent to all members twice. The first letter was sent out to two hundred and fifty-three members with a return of 67. Three weeks later the second letter was sent and 65 more responses were obtained. An additional 5 responses were received after the statistics were compiled and these five were not included. The total response, if it is assumed that each member responded only one time, was 52.4%. A total of 264 separate patients were examined by the members. The two letters are included as Exhibits B and C.

Question One and Two need to be taken together to determine the office procedure of the doctors answer as it relates to the time taken for diagnosis. One hundred and sixty-three (163) out of 264 patients were treated on the same day as their first visit to the member. Seventeen (17) had not yet been treated at the time of the filling out of the questionnaire. The remainder were treated as follows: second day 26, third day 18, fourth day 11, fifth day 7, sixth day 8, seventh day 6, eighth day 4, tenth day 1, twelfth day 2, fourteenth day 2 and 31 days later 2. In other words 96% of the patients that were accepted for treatment were treated for the first time within one week of the initial visit, 66% were treated on the first visit and 88% were treated within four day of their initial visit to the applied kinesiologist. Seventeen cases (or 7%) were not treated for some reason which was not asked about on the questionnaire.

This seems to me to reflect the nature of the practice of Applied Kinesiology. That is, that the diagnosis and treatment are combined in the majority of cases (66%).

This particular part of the survey bears additional investigation. It can mean many things, the most important to me is that it indicates that most patients are seen by the applied kinesiologist as someone that they can help and that the amount of time necessary between the initial visit and start of treatment is very short.

Question 3 related to x-rays being necessary for the AK practitioner. There were a total of 61% of the practitioners who took x-rays of the patients in their own offices. 8% had x-rays from a different source. There were 31% of the cases that did not have any x-rays taken of the patient. These statistics revealed that four patients were under the care of dentists based on the views taken being panorex. There were 5 cases related to the extremities - two hands and three knees. The remaining views related to the spine. The most frequent view was a lateral lumbar view with 85 separate cases having that view. The next was an AP lumbar with 76, then Lateral cervical with 69, AP cervical with 51, AP full spine with 51 and Lateral full spine with 47. The remaining views of the spine were small in comparison with the above. These statistics indicate to me that some of our members are not following standard x-ray procedures of having a minimum of two views at right angles. Multiple views of the same patient gives the number greater than 264 different x-rays.

Question 4 related to the use of the Temporal-Sphenoidal line as part of the diagnostic work-up of the patient. Ninety-one (or 34%) utilized this AK tool and 173 cases (or 66%) did not. Comparing this to the x-rays, the order is almost reversed. 69% utilized x-rays in their diagnosis and 31% did not require them. This would indicate to me that more time should be spent in the updating procedures of our college to share why and how x-rays are utilized in AK practices. Are there special techniques in x-ray diagnosis that particularly apply to AK?

Question 5, the number of muscles tested gave some interesting results. In thirteen cases "all" muscles were tested. This response indicated to me that my question was not as clear as it could have been. I am sure that the doctors treating these patients are aware that no tests are available for many of the muscles of the body, so I am assuming that they meant all the muscles listed on a particular form, of which they expected me to know the number of muscles on that form. Possibly the response form was filled out by an assistant and not double checked by the doctor. The number of muscles tested ranged from 1, in one instance, to 100 in 6 instances. There were also two cases in which no muscles were tested. The average number of muscles tested was 22.3. The number most frequently tested were 10 in 17 cases, 15 in 16 cases, 20 in 14 cases, 6 in 12 cases, 18 in 11 cases, 12,16,24 in 10 cases each.

This indicates to me that we have a great discrepancy in our methodology and we have reason to question the type of procedures that will be done by our members in the standard first visit.

Questions 6,7 and 8 related to the patients previous care for the same condition. It is frequently stated by doctors practicing AK that they see patients after others have not been successful. This statement appears to be true as self-reported on this questionnaire, which indicates that only 71 (or 26%) of the 264 cases reported had not seen a previous doctor for the same condition. One hundred and ninety-three (or 76%) had seen at least one other practitioner for the same complaints. The number ranges from 1 to 11. Also nine patients had seen "many" or "several" doctors for their present condition. This is in my opinion not an uncommon finding in my experience as patients are frequently hesitant to name doctors and if the complaint is chronic may not even recall the names of all the doctors they have seen for their spinal complaints. The numbers are as follows - 66 patients had seen 1 previously, 62 had seen 2, 26 patients had seen 3, 14 had seen 4, 9 had seen 5, 4 had seen 6, and 1 had seen each of 7, 8, 10 and 11 previous doctors.

The most frequent degrees held by the previous doctor was that of General Practitioner or family doctor M.D. with 162 patients having seen at least one of this category prior to coming to the Applied Kinesiologist. The doctor next in frequency was D.C. or chiropractor in which there

were 77 instances. Then came 57 orthopedists and 35 neurologists. There were no other types of doctors listed. These statistics indicate that Applied Kinesiologists seem to be sought out after patients have had previous unsuccessful experiences with practitioners of both the medical and chiropractic profession as well as medical specialists. This also indicates that the type of patient problems seen by applied kinesiologists seem to be primarily the musculo-skeletal category. This also would be of interest for further investigation.

Question 9, related to the doctors feeling as to whether the patient needed further care or examination, which was indicated by the need for a future appointment with the practitioner of Applied Kinesiology. Two hundred and sixty out of two hundred and sixty-four cases made another appointment (or 99%). Less than one percent (1%) of the cases either were completely relieved on the first visit or were not accepted for further care or diagnostic procedures. Seventeen (or 2%) of the cases were not treated, yet treated at the time the doctor filled out the forms. All but four of these had an appointment made for future care.

Question 10, related to the charges for the first visit to an AK practitioner. This being an international questionnaire, the membership and I did not ask which country the respondents were from. I am assuming that the amounts were given in US dollar equivalents. The range was from a low of \$18 to a high of \$484, which included a series of

multiple x-ray views and examinations. The average for a new patients first visit under AK was \$102.75.

I was gratified by the response of the members to the questionnaire and I feel that this type of research on the practices of AK can be valuable to each of us individually and also to our committees in relationship to how we would like to give education. The Certified Teachers of Applied Kinesiology are just beginning to assume the responsibility of the education of practitioners and what will be considered official Applied Kinesiology Technique. I hope that we will have additional surveys of our membership on other aspects of our practices.

I have drawn no conclusions from the total group of statistics, I leave that to our membership.

Please fill in each box. Use an N/A if not applicable
 If you would like to make comments relating to the questions,
 please do so on the back of the form. You need not put your
 name on the form unless you wish to do so.

Thank you. This form must be received by September 1, 1983.

1. Date patient first seen
2. Date first treatment rendered
 (if any)
3. Were x-rays taken ?
 If Yes what views?
4. Was a TS line evaluation performed?
5. How many muscles were tested for
 evaluation during initial visit
 if you recorded them?
6. Had this patient been to any
 other doctor prior to coming
 to you for this condition?
7. What number of previous doctors,
 for this group of symptoms, had
 they seen prior to coming to you?
8. What degrees or specialties did
 they or the one represent?
9. Did you make an appointment
 for the patient to return for
 further care?
10. What were the total fees for the
 services rendered to the patient
 on the first visit?

Patient 1	Patient 2

NAME: _____
 Optional

- Charter Diplomate
- Board Certified
- Member

THIE *Chiropractic Corporation*1192 NORTH LAKE AVENUE • PASADENA, CALIFORNIA 91104-3795
AREA CODE 213 • TELEPHONE 798-7805

Dear Doctor,

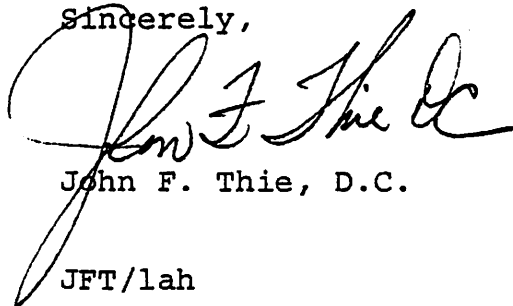
Will you help me with my 1984 research for the ICAK collected papers? I am interested in knowing what the members of the organization are actually doing in their own private practices. I hope that you will assist me by filling out the enclosed questionnaire and returning it in the self addressed envelope, as soon as possible. It will not be included in the statistics if I do not receive it by September 1, 1983.

Please take the last two patients that you had visit you for care and answer the questions on them. If all of you answer the questions, we will have a good set of statistics which will, I believe, enable us to know how we compare to each other.

In addition, we will know more about the practice of Applied Kinesiology.

Thanks in advance for your cooperation.

Sincerely,



John F. Thie, D.C.

JFT/lah

THIE *Chiropractic Corporation*

1192 NORTH LAKE AVENUE • PASADENA, CALIFORNIA 91104-3795
AREA CODE 213 • TELEPHONE 798-7805

August 3, 1983

Dear Doctor:

2 weeks ago I asked for your help in filling out a form. I have received 67 replies out of 253 letters that I sent.

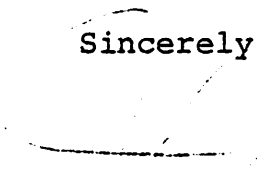
If you were one of the 67, please accept my thanks for your prompt reply.

If you are willing to help me, I have enclosed a second form for your convenience. Just take the last two new patients that you treated and fill out the questionnaire, it should take you less than 15 minutes.

I think that you will find that the statistics we gather interesting and valuable to you.

I must have this information by the 1st September if I am to include it in my paper.

Sincerely,


John F. Thie, D.C.

JFT/lah

PATIENT MANAGEMENT

by

Dr. C. Lance West, D.C., D.I.C.A.K.

In considering the Triad of Health in Applied Kinesiology, the third part "The Psychological" side of the triangle is as important as the other two.

All of us have seen D.C.'s who are excellent at manipulation and the structural aspect of Chiropractic, but who are not nearly as good at the chemical or psychological part. Still there are others who are great at nutrition and the chemical side, but who do not achieve a good balance in the structural or psychological management of their patients.

The psychological aspect of the treatment is often not appealing to very "scientifically" oriented practitioners. I have seen many different young D.C.'s with varying capabilities in all the three aspects of the Triad of Health, and I feel one of the areas where many feel the least confident is in the psychological side, partially because they have not been taught this in college and have seldom been required to answer questions in relationship to the philosophy of Chiropractic as it relates to the mental or psychological part of treating patients, other than a psychiatric approach.

In my 35 years of practice, I have endeavored to constantly improve my ability to render service to my patients by studying numerous things, such as S.O.T., Gibbons, Nimmo, etc. Always endeavoring to offer the best service I knew for whatever problem was presented by the patients.

The one factor that I discovered long ago, was that the better the patient understood what I was attempting to achieve for them, the better was their cooperation and ultimately their results.

All of us have achieved excellent results by using whatever we knew and believed would work. Some adjust only one vertebrae, others use various technics and all seem to work.

What most impressed me thirteen years ago, when I first saw Applied Kinesiology practiced was the ability of the doctor to demonstrate in a provable manner to the patient, that he could "turn a muscle on or turn it off" and that it worked everytime, all the time. After I saw this, I began searching for classes in Applied Kinesiology, and have been learning, practicing and ultimately teaching this marvelous method of Chiropractic practice ever since.

Whenever I learn something new, I am as thrilled about it as my patients, and the patients are very aware of their doctors' attitude. I have heard Dr. Goodheart say many times that a patient's right brain is in tune with the Doctor's right brain, and patients know when their doctors are really turned on.

This brings me to the point I really want to make. Always be very good at what you do for the patient, and when you do a test and check for a muscle weakening or strengthening, say to the patient "Can you feel that weakness?" and be sure the patient wholeheartedly responds with a "Yes". If the patient isn't sure, or the response is questionable, repeat the test and again get that definite "yes" response to your question. In doing this, you are actively involving your patient in part of the psychological aspect of their healing. I cannot over-emphasize how important that is, because as

the patient's attention is focused where you want it, so are their thoughts and energies automatically focused. That's why I always wait until I hear a positive, definite "yes" response to whatever I'm checking on the patients.

In my experience, I have seen much better, faster responses and felt the enthusiasm from the patient, when test after test I keep getting a positive response. This not only helps the patient's improvement, but they are soon so full of enthusiasm, they can't wait to be bringing in others in their family or among their friends. So, if you take the extra few seconds to require the positive response and go no further until you get it, you will find the improved results, the increase in the patient's confidence in you and see your practice growing.

As you get this positive response from your patients, you will soon be noticing changes taking place in your feelings and attitude, which means added energy and enthusiasm all day long in your practice.

Always remember that what you say to your patient is as important as what you do to them. Treat each one as a dear friend, love and appreciate them at their level, and always remember that without them, you wouldn't be where you are. Take time to be aware of your own growth, your understanding and your opportunity to be practicing what you love most, Chiropractic, and specifically Applied Kinesiology.

Expand your capabilities and conscious awareness so that many times daily you inwardly take a moment to be thankful for your opportunities, your life, your practice, your friends and most of all your patients, and as you do this, you will discover the universe is so full of love and goodness that all of your dreams are possible.

The responsibility is yours to respond with affirmative thoughts, words, and deeds and to reap the rewards of them, just as it is your patient's responsibility to respond to your tests with a definite "yes" and thus assume their part in their return to health.

Always remember, health comes from within the patient, you are an instrument to help them achieve their highest capabilities.

As they accept their responsibilities, you help them more, and in turn receive a great satisfaction from a job really well done.

BACK TO BASICS

BY

Dr. C. Lance West, D.C., D.I.C.A.K.

Since I'm fortunate enough to go to many different parts of the country to attend Applied Kinesiology seminars, to video tape others, and to teach or assist those who are teaching, I have had the opportunity to personally treat many D.C.'s.

What always amazes me, is that although many have been treated regularly, but still have numerous things which do not seem to be improving. When I question these doctors, I am treating, most have been receiving the latest Applied Kinesiology treatment whether it's "the walking gait" which involves stress receptors, or it might be "strain, counter strain" technic, etc. But as I check them, I find so many are switched, have fixations or cloacals or gait problems, and when I question them, they say, no one has checked or fixed these "basic" areas before.

Applied Kinesiology has evolved to the high place it is today because of the fundamental discoveries of Dr. George Goodheart, who first worked with origin and insertion of muscles. Then gradually added Lymphatics, Neurovasculars, Accupuncture, Meredian Connectors, Nutrition and the relationship of specific muscles to organs.

The purpose of this paper, is to remind those who might forget or assume that all the basics have been done, to stop assuming and to check these basics, then once these basics have been cleared, other additional technics can be added, all of which will promote a solid foundation for

health and aid in the prevention of problems, and when the doctor you treat feels the great effect on himself, his enthusiasm and interest will be even greater.

I have seen enthusiasm generated in treatment sessions, and this creates a ripple effect, which is felt in many areas of the country.

So, in summary, start by checking and fixing the basics as taught in Applied Kinesiology, then proceed with more advanced technics after the basics, and observe the excellent response you get. Your own enthusiasm will be stimulated also, because success is contagious.

CHLOROPHYLL, THE NATURAL MIRCLE

BY

DR. PAUL A. WHITE

Abstract:

Chlorophyll, is a naturally occurring substance, that because of its nutritional content, has a multitude of uses. It has an benfical effect on the digestive system, endocrine system, circulatory system and an effect in lowering blood pressure. Because of these favorable factors, plus many more, it is necessary for the holistic practitioner to become knowledgeable with regard to its use.

Clinical Considerations

Prominent Clinical Signs and Symptoms:

1. Vascular Changes (Telangiectasia, purpura petechiae, etc.), A possible etiological background involves capillary integrity, associated with prothrombin factor (vitamin K).
2. Hypertension-possible toxemia and/or kidney involvement
3. Acne (Associated with mense)-a possible etiological background is deficiency of hormone precursors.
4. Healing (Ulcers, skin conditions, gastritis, etc.)-healing action of chlorophyll.
5. Kidney Dysfunction (Also bladder irritation)-protein metabolism, prothrombin factor (vitamine K).
6. Toxemia (Associated with arthritis, arteriosclerosis, coronary sclerosis, etc.)-probably due to a guanidine neutralizing effect, its presence being a suspected factor in these diseases.
7. Hemorrhage (Excessive mense, nosebleed)-caused by lack of prothrombin factor (Vitamin K).
8. Colitis (Gastritis, stomach ulcers)-healing action of chlorophyll.
9. Ileocecal valve syndrome-healing action of chlorophyll.

Laboratory Tests:

1. Vascular Changes, Hemorrhage - Prothrombin time
2. Hypertension - Kidney profile, cholesterol, triglycedides
3. Kidney dysfunction, bladder irritation - urinalysis, Total protein, Albumin, A/G ratio

Symptom Characteristics:

Symptom characteristics that are usually associated with use of this product are blood clotting, vascular changes, gastrointestinal problems or toxemia.

Clinical Test:

Prolongation of the blood clotting time beyond the usual 6 to 8 minute period is indicative of need.

Administration:

Dosage:

1 to 6 per day or as directed. Bile Salts may be necessary to promote absorption of fat-soluble factors.

Effect:

Blood clotting time may be changed in a few hours. The tonic effect and other noticeable changes may require several weeks.

Side-Effects:

Recommended Dietary Allowances of vitamin A, as established by the National Research Council, are 1,500 International Units (IU) for infants, 3,000 IU for adults. The amounts increase during disease, trauma, pregnancy, and lactation. Requirements vary for people who smoke, those who live in highly polluted areas, people who easily absorb vitamin A, and those who have had their stored supply of vitamin A depleted by pneumonia or nephritis. Increased intake of vitamins C and E will help prevent excessive oxidation of stored vitamin A.

Research indicates that no more than 50,000 IU per day can be utilized by the body except in therapeutic cases, where up to 100,000 IU is recommended. Toxicity symptoms include headache, nausea, vomiting, diarrhea, dry skin, hair loss, appetite loss, sore lips, and flaky, itchy skin. Bone fragility, thickening of long bones, deep bone pain, enlargement of the liver and spleen, blurred vision, and skin rashes are symptoms of prolonged excessive intake. Excessive daily use of massive dosages of vitamin A also may lead to reduced thyroid activity and abnormalities in the skin, eyes, and mucous membranes. If toxicity is detected, the symptoms will disappear in a few days if the vitamin is withdrawn. Vitamin C can help prevent the harmful effects of vitamin A toxicity.

* It is suggested that in cases where prolonged therapeutic higher dosages of vitamin A are necessary, that an emulsified form of vitamin A be utilized. For further information in regard to emulsified A, refer to article "Emulsified A", by this author.

Synergists:

1. Brewers Yeast as a cell-proliferating influence
2. A & E Emulsion for epithelial and connective tissue integrity
3. Hemotinic-for complimentary blood factors
4. Comfrey Pepsin in the case of G.I. problems (Ileocecal valve syndrome etc.) will help to eliminate mucous from the G.I. tract thus allowing chlorophyll to directly contact the inflammation.

General Considerations:

In the use of chlorophyll both local and systemic effects must be considered.

1. The local effect of chlorophyll on the intestinal mucosa is to combat inflammation and promote healing, as would be indicated by a wide range of gastrointestinal disorders from diarrhea to stomach ulcers, colitis, gastritis, ileocecal valve syndrome etc.
2. Systemically, chlorophyll acts as a detoxifying factor with a tonic effect, useful in most debilitated states associated with chronic disease.
3. Chlorophyll is an antagonist of guanidine.

Clinical Application is based on the following:

1. Effect upon the endocrine system as sex hormone precursors
2. Effect as a prothrombin factor (vitamin K), important in cardiovascular and circulatory problems
3. Effect in lowering blood pressure
4. Effect in hemoglobin formation
5. Favorable effect in hypercholesterolemia
6. Favorable effect in arteriosclerosis
7. Source of fat-soluble vitamins (A,E,F and K)

CLINICALLY ASSOCIATED CONDITIONS

GASTROINTESTINAL-URINARY

Stomach and Intestine

Colitis

Kidney and Bladder

Albuminuria

Kidney Stones

Nephritis

NERVOUS AND PSYCHOGENIC

Functional

Colitis, Ulcerative

Ulcer, Gastric

Vasomotor

Blood Pressure Changes

METABOLIC DISORDERS

Growth and Repair

Aging Processes

Healing, Promotion of

Mouth-Tongue Disorders

Teething

Intermediate Processes

Hypercholesterolemia

Collagen Diseases

Arthritis, Rheumatoid

Duypuytren's Contracture

Peyronie's Disease

Blood

Anemia, Pernicious

Epistaxis

EXOGENIC DISORDERS

Infections

Vincent's Infection

Toxic

Burns, Systemic

Inflammation

Mastitis

Diarrhea

Gingivitis

VASCULAR DISORDERS

Circulatory

Bed Sores

Leg Ulcers

Tinnitus Aurium (when blood supply is a possible contributory factor)

SKIN CONDITIONS

Acne
 Prupura
 Telangiectasia

GENETIC DISORDERS

Female

Abortion
 Amenorrhea
 Endocervicitis
 Leucorrhea
 Pregnancy Schedule
 Vaginitis

REFERENCES

The Herb Book by John B. Lust, N.D., D.B.M.; Bantam Books
 The Rodale Vitamin Book by William H. Hylton; Rodale Press
 The Way of Herbs by Michael Tierra, N.D., C.A.; Washington square press
 Back to Eden by Jethro Kloss; Lancer Books
 Today's Herbal Health by Louise Tenney; Hawthorne Books
 A Modern Herbal by Mrs. C.F. Grieve, F.R.H.S.; Dover Publications, Inc.
 School of Natural Healing by Dr. John R. Christopher; Biworld Publishers
 Childhood Diseases by Dr. John R. Christopher; Christopher Publications
 Comprehensive Answers to Nutrition by Wm. R. Borrmann, N.D., D.C.; Ne
 Horizons Publishing Corporation
 Nutrition Against Disease by Roger J. Williams; Pitman Publishing Corp.
 Nutrition Almanac by John D. Kirschmann; McGraw-Hill
 Life Extension by Durk Pearson and Sandy Shaw; Warner Books
 Applied Kinesiology-An Advanced Approach to Chiropractic by David
 Walther, D.C.; Systems DC
 Applied Trophology by Royal Lee, D.D.S.; Standard Process Laboratories
 Modern Nutrition in Health and Disease, 6th Edition by Robert S. Goodhart
 Maurice E. Shils; Lea & Febiger

B-COMPLEX
BY
DR. PAUL A. WHITE

Abstract:

B-complex is responsible for nerve integrity, cell energy reactions, and oxidation mechanisms accomplished enzymatically. It is also involved with carbohydrate metabolism, particularly with oxidation of lactic acid and other intermediate processes.

Clinical Considerations

Prominent Clinical Signs and Symptoms:

1. Poor Muscular Tonicity (Lack of appetite, weakness of legs, muscular weakness, lack of stamina)
2. Lactic Acid Excess (Drowsiness after eating due to inability to oxidize products of fermentation)
3. Heart Symptoms (Enlargement, tachycardia, fibrillations)
4. Edema ("Water-logged" tissues, diminished urination)
5. Neurological Symptoms (Feeling of band around head, tenderness of calf muscles, hyperirritability, melancholia, etc.)

Possible Etiological Background of Symptoms:

1. Inability to metabolize lactic acid accumulated during exercise
2. Lactic acid excess due to unfavorable intestinal environment
3. Faulty motor nerve conductivity
4. Vasodilation effect produced in lactic acid excess

Symptom Characteristics:

These follow the muscular and nervous patterns, weakness, drowsiness, and mental aberrations of vague or indistinct outline being a common complaint. Ingestion of high carbohydrate foods is often the most significant finding.

Laboratory Test:

Unfortunately, a satisfactory laboratory method of determining lactic acid levels has not yet been devised.

Clinical Test:

Endocardiograph:

Need shown by split sounds, fibrillation and other deviations which are usually corrected within a few minutes after administration of B complex.

Administration:

Dosage:

1 to 4 per day is the usual dosage. In beri-beri syndrome (tachycardia, edema) amounts may be much higher and should be governed by the diuretic effect produced in these cases, kept at an increased level as long as diuresis is produced.

Effect:

Ordinarily results on adequate dosage are very rapid, symptomatically being evident within a few days, or within a few minutes where the Endocardiograph is being used to measure its effects.

Side-Effects:

These are very rare however, if brewers yeast is contained in the B-complex product, a niacin flush may occur in a sensitive patient. This is combated by taking these products with a cold liquid preferably milk and/or a banana, plus cautioning the patient not to take these products with hot or spicy food or drink.

Synergists:

- a. Multiple Trace Mineral - To provide a source of potassium and other trace minerals necessary in many synaptic and enzymatic reactions to which B-Complex contribute.
- b. Calactate - Acts to combat acidosis, a condition frequently found in combination with B Complex deficiency states.
- c. Brewers Yeast - Source of enzyme precursors which act complimentary with those supplied by B-Complex.

General Considerations:

The energy that a cell needs to maintain itself and perform its various functions is supplied by oxidation of food within the cell. In this respect, B-Complex performs an important role by providing cofactors which catalyze the various chain reactions. This, to a very large extent, is related to carbohydrate metabolism, and as such, we must consider not only the amount of Vitamin B complex, which is provided by the diet, but, also, the requirement for those vitamins which may be created by ingestion of excess amounts of high carbohydrate foods, particularly sugars. Thus, requirements for B-Complex vary according to the amount of carbohydrates ingested. By this reason it may prove futile to administer B-Complex without correspondingly reducing the over-alimentation causing the initial problem. However, when B-Complex is given and carbohydrate intake is brought into range, results are usually satisfactory.

The nutritional effects of B-Complex may be listed as follows:

- a. Lactic acid metabolizing factor (oxidation of lactic and pyruvic acids).
- b. Promotes motor nerve conductivity.
- c. Essential in coenzyme systems (e.g. acetylcholine reaction).
- d. Opposes vasodilation due to lack of arteriole-capillary tone.

In the clinical application of B-Complex the following information is useful:

1. B-Complex has an effect of restoring function to localized areas in myoneural disorders.
2. In heart failure the urinary output may be low due to inability of the heart to pump blood in sufficient pressure to the kidneys. In these cases, B Complex by increasing the work capacity of the heart, may raise blood pressure sufficiently to produce physiological diuresis.

CLINICALLY ASSOCIATED CONDITIONS

The following list shows a few of the many possible clinically associated conditions in which Vitamin B complex might contribute important biochemical factors. Vitamin B complex should be considered an important adjunct in most, if not all, degenerative and debilitating diseases, and as such used in a much wider range of clinical situations than will be outlined.

NERVOUS AND PSYCHOGENIC:

Functional:

Asthenia
Nervous Strain

Metabolic :

Alcoholism
Legs, Weakness of
Neuromuscular Disorders

Mentality:

Brain, Dysfunction of

METABOLIC DISORDERS:

Growth and Repair:

Progressive hearing loss

Intermediate Processes:

Diabetes Mellitus

Collagen Diseases:

Rheumatoid Arthritis

Acid-Base Balance:

Acidosis

Water Balance:

Ascites
Dropsy
Edema
Body Weight
Appetite Decreased

INFLAMMATION:

Gingivitis
Sciatica

VASCULAR DISORDERS:

Circulatory Diseases:

Tinnitus Aurium (When blood supply is a possible contributory factor)

GENETIC:

Female Disorders:

Amenorrhea

SPECIFIC DEFICIENCY DISEASE:

Pellagra

REFERENCES

The Herb Book by John B. Lust, N.D., D.B.M.; Bantam Books
The Rodale Vitamin Book by William H. Hylton; Rodale Press
The Way of Herbs by Michael Tierra, N.D., C.A.; Washington square press
Back to Eden by Jethro Kloss; Lancer Books
Today's Herbal Health by Louise Tenney; Hawthorne Books
A Modern Herbal by Mrs. C.F. Grieve, F.R.H.S.; Dover Publications, Inc.
School of Natural Healing by Dr. John R. Christopher; Biworld Publishers
Childhood Diseases by Dr. John R. Christopher; Christopher Publications
Comprehensive Answers to Nutrition by Wm. R. Borrmann, N.D., D.C.; N.
Horizons Publishing Corporation
Nutrition Against Disease by Roger J. Williams; Pitman Publishing Corp.
Nutrition Almanac by John D. Kirschmann; McGraw-Hill
Life Extension by Durk Pearson and Sandy Shaw; Warner Books
Applied Kinesiology-An Advanced Approach to Chiropractic by David
Walther, D.C.; Systems DC
Applied Trophology by Royal Lee, D.D.S.; Standard Process Laboratories
Modern Nutrition in Health and Disease, 6th Edition by Robert S. Goodhart
Maurice E. Shils; Lea & Febiger

ILIACUS, CATEGORY I

Stanley Wieczorek, D.C.*

Abstract

The presence of iliacus weakness being responsible for a Category I pelvic disturbance is a totally new concept with regard to those factors necessary for Category I correction.

Category I pelvic lesions are well known in Applied Kinesiology and Sacro-Occipital Technique. The Category I has been divided into two divisions: 1) the crest sign (DeJarnette) or sacro-spinalis Category I, in which sacro-spinalis is weak on one side and the five factors associated with sacro-spinalis including bladder meridian are treated, and 2) the dollar sign (DeJarnette) which is a weakness of the gluteus or piriformis in which the five factors of the IVF including CX meridian are treated for correction. In our office, many times a patient would therapy localize as a Category I dollar sign type but no piriformis, gluteus or adductor weakness could be elicited. It was found that an iliacus weakness was present which opened an entire new avenue of approach to the correction of Category I. The neuro-lymphatic, neuro-vascular, and neurological and acupuncture point locations as well as the nutrition are totally different from the previously mentioned definitions of Category I. It has been this author's experience that the majority of Applied Kinesiologists patients therapy localize for Category I and do not determine which muscle of the dollar sign group is at fault creating the Category.

Since the discovery of the iliacus as a major factor in creating a Category I, we have had a more favorable response in the patient. Many Category I patients have a dysfunction of the ileocecal valve which is associated with kidney meridian as is iliacus and psoas and it is well known that the iliacus and psoas are often responsible for severe low back problems. It has been pointed out by various authors and lecturers that a disc problem cannot be relieved in the presence of psoas imbalance. Because of the fact that the psoas arises from the entire lumbar spine as well as the lumbar discs. The discovery of Category I iliacus may be of monumental importance in Applied Kinesiology as well as Sacro-Occipital technique in that it provides a new light on these resistant disc cases and chronic ileocecal valve problems.

Summary

Iliacus weakness is responsible for a Category I (collar sign-buttock sign). The normal adjustment of the pelvis on the non-lesion side is as it always has been. The respiratory assist is as it has been. All other factors are changed including neuro-lymphatic, neuro-vascular, vertebral level, kidney is the acupuncture meridian. It is the author's opinion that because of this discovery it benefits all Applied Kinesiologists to determine which muscle is responsible for the presence of a Category I.

Stanley A. Wieczorek, D.C.

A SIMPLIFIED NEW METHOD OF ESTABLISHING THE THREE DIMENSIONS OF A
PHYSIOLOGICALLY COMPATIBLE OCCLUSAL POSITION

Emil Zmenak, D.C.*

ABSTRACT: Since the mandible moves in three planes, all three parameters, i.e. vertical, lateral and antero-posterior plane, must be functionally and neurologically determined.

There is an enormous amount of interest and growing awareness of the impact of TMJ dysfunction on postural and systemic health.⁽¹⁾ The dental profession has by and large limited its therapeutic approach to the oral cavity with the use of occlusal splints, orthodontic appliances, surgery and occlusal equilibration. While these approaches have produced positive results in many cases, they have produced iatrogenic problems in a significant number of patients leading to a number of successful law suits against dentists who have initiated irreversible orthodontic procedures, occlusal equilibration and surgical procedures. As a consequence, there is a growing awareness within the dental profession for the need of a conservative and effective method of treating temporomandibular joint dysfunction. Applied Kinesiology used on an interdisciplinary basis offers a very high level of therapeutic success with a high degree of patient safety.

It has been the author's experience that if proper preparatory work is done, including nutrition, structural correction and relaxation techniques for the occlusal musculature including neurolymphatic and neurovascular trigger point stretch and spray techniques, that in a significant percentage of patients, no further therapy is necessary. In those patients with persistent clicking jaw problems, malocclusion and deep overbites, the next logical step is the use of the occlusal splint to re-establish a more optimal occlusal position. These

people are the edentulous patients or those who have poor molar support due to extractions without replacement with partials or patients with orthodontic problems, such as prematurities and cross arch interferences or genetic malocclusion.

Many of these patients will respond well to splint therapy, providing the proper occlusal position is established for splint therapy. Until very recently the dentists had built their splints to direct the jaw into a centric relationship i.e. the splint was designed to move the mandible to its rearmost, uppermost midline position. The rationale for this was that building the mandible to centric was the most reproducible position, it was considered its physiological norm.

This concept however was subsequently challenged by Dr. Barney Jenkison, D.D.S., who developed an instrument called a myomonitor that used prolonged galvanic stimulation over a period of 1-2 hours to bring about relaxation of the muscles of mastication and produced what he called myocentric occlusion, that is the position assumed by the mandible when the occlusal muscles were completely relaxed. He then proceeded to treat to this position.

Dr. Harold Gelb, D.D.S. challenged this concept and took the position that since the articulating disc was anterior to the condyle that the mandible was designed to function in an anterior inferior position, a position opposite to centric, and he further stated that not only was the AP plane significant but that since the jaw functions in three planes that it was essential to establish the vertical height and correct alignment of the central incisors.⁽²⁾ To achieve this position Gelb used a combination of mounted models, and kinesiological testing using an extended arm Deltoid test. It is the author's impression, having observed Dr. Gelb lecture, that his procedure involves a significant psychic component in his muscle testing and therefore would be difficult to teach to other students on a consistent basis.

Dr. George Eversaul, PhD. emphasized the establishment of the physiological vertical height by the use of extensive muscle testing. He prescribed a battery of 14 pairs of muscles to be tested prior to establishing the vertical. He uses an instrument called the Vertoc that utilizes metal plates on a magnetic plate attached to the 2nd bicuspid

to gradually increase the vertical height between the mandible and the maxilla. The weak muscles are retested and the vertical height that produces the greatest degree of muscle strengthening is considered the optimal vertical.⁽³⁾ A Sear Pivotal splint is then built to the appropriate height. As the name implies, the splint acts as a fulcrum and the greater the height, the more the tendency to guide the mandible forward. Although this system is unquestionably accurate and reproducible, it has two drawbacks:

- 1) learning 14 different muscle tests accurate is a significant challenge for the average dentist and
- 2) performing these muscle tests is very difficult in a dental chair and sometimes leads to patient resistance because of awkward positions involved.

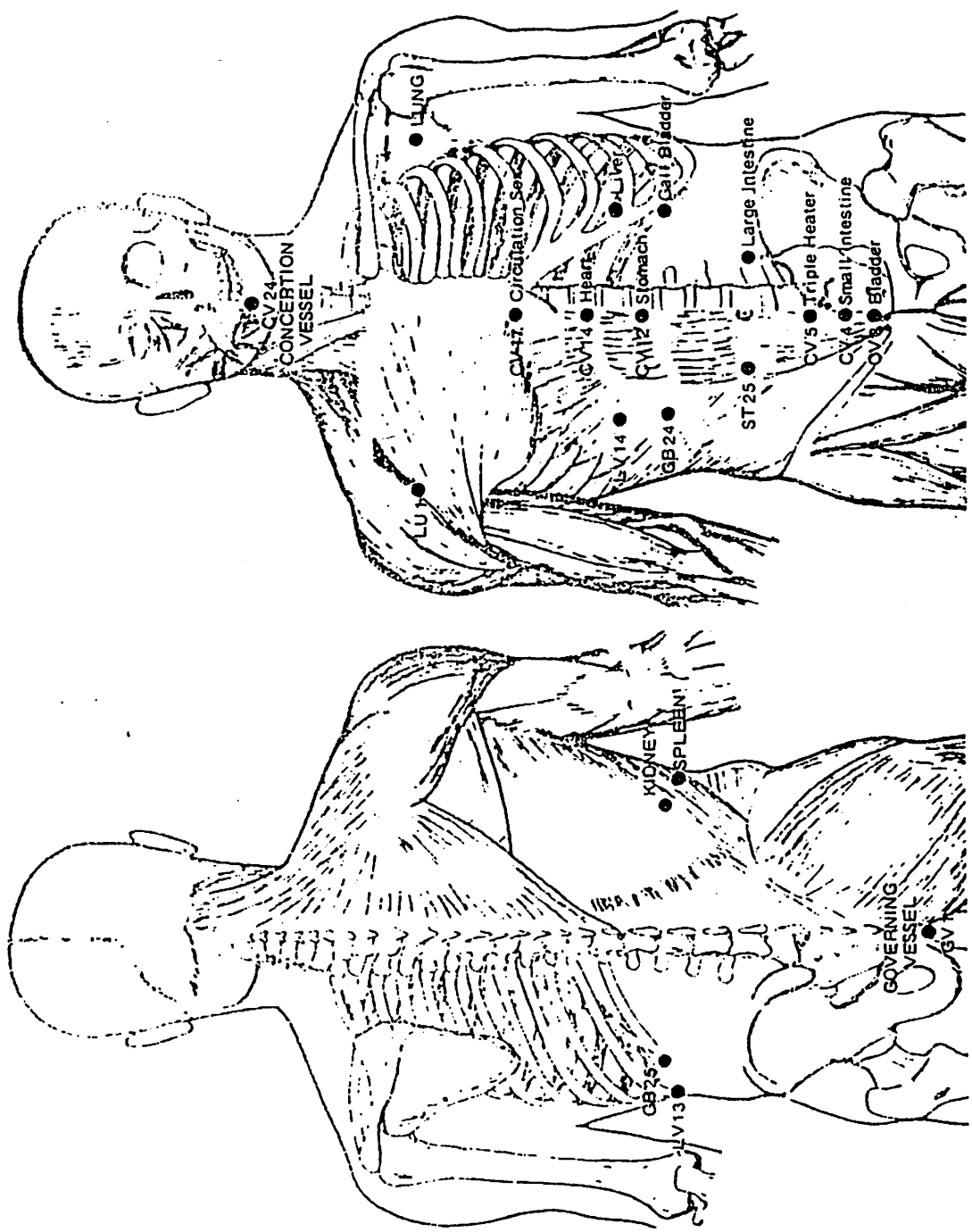
In working with the dentists both during lectures and in their offices, it became necessary to address these concerns. It was reasoned that since occlusal dysfunction had such diverse systemic effects that not only might the organ systems be involved but the acupuncture meridians and therefore the alarm point associated with these organs also might be affected by changes in occlusion. This lead to a new simplified system of determining occlusal position - The Zmenak Procedure for Determining Optimal Occlusal Position

Step 1. Check the alarm points for tenderness

2. Open the vertical using Vertoc or tongue blade and recheck the alarm points. The point of optimal vertical height will be the point at which the alarm points exhibit the least tenderness. The author's experience indicates that the lung, liver, CX alarm and heart points seem to be most directly affected by changes in vertical height.
3. Have patient slide the mandible in antero-posterior plane and recheck the alarm points for the least tenderness
4. Experience has shown that when these 2 planes are achieved and as muscle relaxation occurs, the teeth will frequently line up in the mid incissor line - if they do not line up within a few weeks of splint therapy, the same technique can be utilized to line up the incissor line.
5. If one or more of the alarm points in fact gets more tender when other points have diminished in tenderness, experience has shown us that these patients have cranial faults that need

further attention and should not be fitted with a splint until these are corrected, since they are likely to develop all types of peculiar symptomatology.

The impression is made at the position that elicits the least tenderness in the alarm points. We have check this approach out against the use of the battery of muscle tests and find that the optimal occlusal positions correlate. As the splint brings about relaxation of the orafascial musculature, there are changes to the alarm points and they again become tender until the appropriate adjustments to the splint and the orafascial musculature have been made to adapt to this new occlusal position. Using this technique it is possible to continually monitor the appropriateness of the splint position.



PROCEDURE FOR ESTABLISHING PHYSIOLOGICAL VERTICAL

1. Check acupuncture alarm points for tenderness, particularly Lung, Circulation Sex, Kidney and Liver. Open the vertical at 1/2 mm intervals over the first bicuspid's using a Vortoc
2. Recheck tenderness on alarm points - keep opening vertical to the point of least tenderness
3. If the tenderness starts to increase again, the vertical has been opened too high

- Diagram courtesy Dr. David Walther -

****INDEX****

- Accelerator, 163
 Acupuncture, 47
 Allergy Response, 19
 Ancillary Examination, 191
 Anova, 67
 Anterior Lumbar, 115
 Amalgam, 217
 Applied Kinesiology, 135, 251, 299, 439
 Atlas Subluxation, 323
- Back to Basics, 363
 B-Complex, 369
 Bennett's, 151
 Bi-Focal Contact, 249
 Blood Builder, 269
 Body Energies, 37
 Body Torque, 25
- Candida Albicans, 77
 Category I, 373
 Challenge, 25
 Chlorophyll, 365
 Concussion Techniques, 271
 Counter Torque, 1
- Defender Concept, 163
 Deficiency, 269
 Dural Torque, 65
 Dural Torque Pattern, 291
 Dyslexia, 105
- Electron Poising, 61
 Emergency Response, 131
 Energy, 327
 Entropy, 273
 Exercise, 159, 185
 Extremity Bone Test, 35
- First Rib Head, 63
 Fitness, 185
 Fixations, 3, 319
 Formula Number 6147, 61
- Gait Allergy Testing, 101
 General Adaptive Syndrome, 173
 Gluteus Maximus, 59
- Health, 185
 Human Factor, 235
 Hydrochloric Deficiency, 323
 Hyperenergy States, 299
- Iatrogenic, 207
 Iliacus, 373
 Into Lesion, 123
- Jing (Well) Point, 229
- Learning Disabilities, 105
 Life Extension, 295
 Light Force Adjusting, 123
 Liver Meridian, 229
 Lovette Vertebral Torque, 1
- Magnetic Deficiency, 265
 Malocclusion, 207
 Mandibular, 319
 Mandibular Respiratory Assist, 181
 Masking, 325
 Mercury Poisoning, 217
 Motor Impairment, 339
 Multi Positional, 119
 Muscular Differentiation, 33
 Muscle Testing, 119, 235
 Myofacial Adhesion, 155
- Neurovascular Dynamics, 151
- Palpatory Pain, 63
 Parasites, 267
 Patient Management, 359
 Pelvic Categories, 173
 Phototrophic Effect, 47
 Physical Traid, 295
 Plethysmography, 251
 Polarity, 331
 Postural Evaluation, 287
 Proprioceptive Neuromuscular, 159
- Occlusal Position, 375
- Relativity Principle, 235
 Relaxing Response, 131
- Sacroiliac, 59
 Sciatica, 223
 Selye's, 173
 Sensory Impairment, 331
 Seven Blocks, 327
 Shaft, 35
 Slimnastics, 287
 Smoking, 17
 Sphenoidal Technique, 319
 Spindle Cell, 203
 Spinal Therapeutics, 271
 Stretched Isometrically Resisted Position, 155
 Stretching, 159

****INDEX CONTINUED****

Subluxations, 19
Support Personnel, 191
Suture, 223
Statistics, 439
Swallow Challenge, 29

T-12-L-1 Fixation, 325
Temporal Mandibular Joint, 251
The Body Knows, 7
Three Dimensions, 375
Therapy Localization, 59
Thoracic Fixations, 33
Toxicity, 217
Trauma of Health, 273
Trapezius Reflex, 277
Trotter Treadmill, 177

Uni Vector, 119
Upper Cervical Fixation, 127
Urinalysis, 139

Vision Accommodation, 245

Walking Disc, 103
White Light, 47
Women, 287