MEDITATION TODAY: SCIENCE AND SHORTCUTS

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ABSTRACT

A daily practice for millions of people around the world, akin to prayer, meditation is now welcome in many professional areas such as psychoneuroimmunology that have proven its efficacy. Medical doctors like D.S. Khalsa, say that meditation produces "optimal cognitive function" and have found that it is positively rejuvenating for the brain and physiologically harmonizing for the body. This article is an outgrowth of presentations to audiences at the U.S. Patent and Trademark Office and the U.S. Psychotronics Association.* It provides an introduction to the practice of meditation for Westerners, with some science and shortcuts.

INTRODUCTION

The subject of meditation applies to the mind. There is a wealth of research and developments that have a direct bearing on the effect of the mind over the body. Dr. Carl Simonton, author of *How to Meditate*



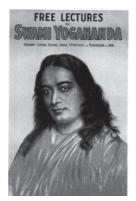
Wheels of Life - A. Judith

and *Getting Well Again*, notes that a breakthrough was made in this area when *Nature* magazine published the finding that white blood cells have "neuroreceptors" on their surfaces. Thus, the physical connection between the mind and the immune system had been finally established. From the simplest example of pain control, which I have experienced, to the most extraordinary superhuman feats, it is concentration, visualization, and a **meditative calm** that

^{*}Videotapes of this lecture to the USPA are available from the USPA.

achieves the results. Recently in the dentist chair, Joyce the dental assistant said to me after a drilling without anesthetic, "I don't know how you do it. I've watched you and you are so calm. Some guys try to be macho and tense up. Do you study something to do that?" I said, "Yes, yoga and meditation practice."

When I was a teenager learning about meditation practices through Indra Devi's book Yoga for Americans (Prentice-Hall), I saw a martial arts expert drill a hole into a solid brick with his finger. I was able to talk with him afterwards and examine the brick as well. This was one of many feats which stuck in my mind as being physically difficult to explain. Years later at the US. Psychotronics Association's "spoonbending" parties with Jack Houck, one of which I hosted as well in my hometown, I witnessed more than one person bending the bowl of a tablespoon with their thumb as they held it in one hand. If I had not supplied the silverware myself in one case, I would have had some doubts. In one case, I sat right next to a young woman as she showed me how she did it (make the suggestion and then wait for the softening effect). It still was amazing to me since I couldn't do it even with two hands and trying to cheat with a flat surface to push against! Everyone has heard of desperate mothers lifting an automobile off of their child in an emergency. I have saved newspaper clippings of such events. All of the above examples show the extraordinary power of the mind over physical circumstances. (An article on this subject by Jack Houck is featured in the forthcoming anthology, Energetic Processes: The Interconnection Between Matter, Energy, and Consciousness by Moscow et al., Xlibris Press.)



1925 poster

HISTORY

In this century, it wasn't until "for the first time in India's history a Swami was officially received by the President" that meditation became popular with Americans. The event was when Swami Yogananda, the founder of Self-Realization Fellowship, met President Calvin Coolidge at the White House, as reviewed on the front page of the Washington Herald (Jan.

25, 1927). That popularity was also evident when Yogananda subsequently filled Carnegie Hall to capacity, as well as many other lecture halls across the nation. Other meditation teachers also came before and after him: Swami Vivekananda, Meher Baba, and of course, Maharishi Mahesh Yogi who gave a new resurgence to meditation with a "transcendental" flair and attracted the Beatles back in the 1960's. Today, Transcendental Meditation (or "TM") is probably the most familiar type of meditation known to Westerners, though Buddhist meditation is also very popular. Without meditation, Zen archers would miss their target. Without meditation, Qigong masters could not perform superhuman feats. Without meditation, Christian mystics would never have become saints. Without years of Transcendental Meditation, best-selling authors, Deepak Chopra, M.D. and John Gray, Ph.D. would never have become famous.

Eastern philosophy and yoga, offer a viewpoint that the mind is more fundamental than matter. Demonstrating the power of meditation in consciously accomplishing such abilities has been shown by the Menninger Foundation. Studies of Tibetan monks increasing their body temperature through the practice of "Tumo" or the Indian Journal of Medical Research articles (V. 49, 1, Jan. 1961, p.82) of yogis buried underground for extended periods of time are good examples. The article about the underground burial shows the electrocardiogram (EKG) records as the yogi's heart voluntarily stops and then, 30 days later, starts up an hour before the crypt is opened. They are fascinating accounts, very convincing and motivating to me. More recently, a modern yogi, Sri Chinmoy, has also amazed many researchers. Many people know of his music and involvement with sports figures. Sri Chinmoy also leads peace **meditations** at the United Nations, U.S. Congress, and at the British Parliment on a regular basis. However, not many may know of his extraordinary accomplishments in weight lifting. In two separate witnessed and photographed events, with specially prepared equipment, Sri Chinmoy has lifted 2000 pounds and 7000 pounds dead weight respectively. He is not a muscle-bound person either. So how did he do it? Through meditation, one can convince the brain, or more scientifically, program our "biocomputer" to believe something is possible, with practice. The motivational speaker Anthony Robbins, author of *Unlimited*

Power, tells us that it's only our beliefs that are holding us back and changing them is a technique that can be learned. Robbins is known for curing addictions in one session and training sharpshooters for the military, both by changing their belief systems.

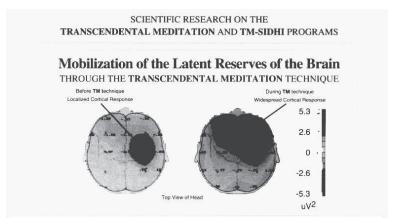
QIGONG

Today, more and more Eastern techniques are emerging which have an ancient history to them such as "Qigong" (chi-gong). It is related to the more well-known practice of Tai Chi and teaches one how to move the life energy "chi" or "prana" through the body. Recently, a medical doctor from mainland China named Dr. Yan Xin has trained and healed thousands of people throughout the world with qigong methods ("The Secrets and Benefits of Qigong" audiotape from Amber Leaf Press). In 1991, when President Bush Sr. met Dr. Yan Xin, he called him "a contemporary sage". Very important is the "relaxed and quiescent" state to the practice that Dr. Xin speaks of. A nervous or restless mind is not compatible with qigong. This is also true of "pranayama" (movement of prana) which we will try later on.

WHAT CAN WE EXPECT FROM MEDITATION?

Research psychologist, Dr. Lawrence LeShan, who I met years ago, says in his book, *How to Meditate* (Bantam Books):

"Central to the response to meditation is the lowered rate of metabolism, the lowered rate of using oxygen and producing carbon dioxide. That these decreases are due to a lowered metabolic rate rather than to a slower or shallower breathing is shown by the fact that both decrease equally and the ratio between them remains the same. This would not be true if it were due to alterations in respiration. There is also typically, in meditation, a slowing of the heartbeat...The lactate concentration of the blood decreases sharply during mediation, nearly four times as fast as it does in people resting quietly...the skin's electrical resistance increases sometimes as much as four hundred percent."



An increase in cortical response measured after TM practice

Thus, meditators show a profound lack of tension and anxiety, accompanied by an increase of slow alpha waves of the brain. Meditation can be scientifically described as a means for the brain to electrically **resonate**. As proven by EEG recordings, the practice bathes the brain in the harmonic frequencies most conducive to homeostasis (alpha and theta), that becomes pleasurable the longer you meditate. Compared to the usual "electrically noisy" waking state of the brain, meditation increases the "signal-to-noise" ratio as well. One study that I reviewed, performed by scientists from Maharishi International University, showed the strong alpha and theta waves of the brain dominating the neuronal EEG patterns in a "waterfall" frequency plot over time. This study of the resonant modes of the brain drew the analogy of a laser cavity tuned to one major frequency. As one stills the random, restless thoughts, meditation convinces the practitioner that he/she can be fully conscious and even blissful, without thinking thoughts. We then start to learn the profound truth taught by yogis that "we are not the mind".

Meditation increases the awareness of the self that is apart from the ego. Sometimes referred to as "self-actualization," self-realization has also been taught by many great philosophers like Hegel, Bradley, and Green as the "realization of the true self." It's a gradual process of connectedness that makes one feel more centered and a necessary part of the universe.

Meditation tends to remarkably "expand consciousness" which can be accelerated with visualization exercises. The expansion of consciousness is difficult to describe in Western terms but the experience is breathtaking when it happens to the meditator. Here "teaching by analogy" works best for the uninitiated—Swami Sri Yukteswar once said, "The little fishes of ideas make quite a stir in shallow minds. The whales of inspiration make hardly a ruffle in oceanic minds." This gives you an idea of how less perturbed one becomes when patience improves and calmness is a daily learned habit. Another benefit is that one's intuition improves, which was amazing to me since my intuition was practically dead as a twenty-year old. I thought only women had the gift of intuition. Ideas which are accurate but seem to come from nowhere start occurring with more regularity as one perseveres with daily meditation practice. Meditation had other important benefits in my life too, such as relieving nervousness and even a tendency to stutter, as I turned twenty-one.

PURIFICATION BY FASTING

Back in 1972, on the evening in which I learned the TM technique, I skipped dinner for the first time, to which my mother was astonished. However, though she was impressed, my mom said she didn't like meditation because it "stalls the brain." Then, after going through a difficult time, I attended my first 10-day yoga retreat by Yogi Amrit Desai at Ursinus College in 1975, fasted for three days on watermelon, and ate mostly live vegetarian food for the rest of the retreat. Near the end, some of us saw several clouds line up in the sky in a formation I later found to resemble the Tun hexagram from the I Ching, which is entitled "retreat." Along with the pranayama breathing exercises, this purifying yoga experience convinced me that consciousness can be favorably and profoundly changed without drugs. Within a year, I applied for the meditation lessons through Self-Realization Fellowship and even gave a lecture on meditation at a local high school biology class. Fasting on fruit juice, for example, is something that I now do every Monday, and recommend it as a purifying method for the body and brain. Books on

fasting (such as *Fasting*, *the Super Diet* by Shirley Ross) describe how the body dumps toxins during a fast. My thinking and meditations become clearer during and after fasting, even if it is only done for one day.

WHY DO WE MEDITATE?

"We meditate to find, to recover, to come back to something of ourselves we once dimly and unknowingly had and have lost without knowing what it was or where or when we lost it" says Dr. LeShan. Referring to meditation, a scientist at a conference once told him, "It's like coming home." This, in a nutshell, summarizes the essence of this mysterious fourth state of consciousness (waking, dreaming, and sleeping being the other three). Dr. LeShan also states,

"Essentially, meditation seems to produce a physiological state of deep relaxation coupled with a wakeful and highly alert mental state...quite opposite from the state brought about by anxiety or anger."

However, meditation is not an excuse to sleep while sitting up! When done properly, meditation provides deeper rest than deep sleep, according to research done at Maharishi International University. Meditation produces subtle rewards that increase over time and oftensurprising insight in just a few minutes of practice. It creates a balance between your inner world and your outer world. It also contributes to greater self-acceptance and therefore, greater self-esteem when you begin to carry what the yogis call a "portable paradise" within you. Meditation helps us to live more consciously as well since our sensitivity and receptivity increases. Lastly, meditation contributes to the inner feeling of positive personal growth being created day after day, as if we are continually evolving each time we meditate.

The bubble diagram of TM, from the book *The Science of Being* and the Art of Living by Maharishi Mahesh Yogi, shows one tracing the thought of a mantra (a repeated word or sound) back to its source deep below the normal level of consciousness. This diagram helps us Westerners understand why, when all of our restless thoughts are on the surface of

our consciousness, that the diving below the surface will create for us a new, deeper, more profound experience.

ANCIENT MEDITATION AND PRAYER

The *Man*, *Myth and Magic* encyclopedia (Marshall Cavendish, BPC Pub.) says that meditation was "once regarded almost exclusively as a preoccupation of mystics, saints and hermits." It goes on to say that the ancient Chinese practiced a Taoist form of meditation, trying to reduce all striving for a goal. In the Islamic mystical tradition, Sufis sit in solitude repeating the name of Allah without ceasing. Buddhist meditators will often use a mandala, an elaborate symmetrical, circular design representing the cosmos, to focus their attention. Jewish followers of the Kabbalah meditate on the treelike "sefiroth" or the chariot "Merkabah" to carry their consciousness upwards.

Positive Therapeutic Effects of Intercessory Prayer in a Coronary Care Unit Population

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ABSTRACT: The therapeutic effects of intercessory prayer (IP) to the Judeo-Christian God, one of the oldest forms of therapy, has had little attention in the medical literature. To evaluate the effects of IP in a coronary care unit (CGU) population, a prospective

Southern Med. Journal, V. 81, No. 7, July, 1988, p. 826 – One of the best single-blind studies on prayer ever conducted, according to Dr. Larry Dossey – 7/01.

Meditation has also been a practice of Christian contemplatives and mystics as well including St. Francis and St. Ignatius of Loyola. For example, St. Teresa of Avila is well known for her four stage "water wheel" analogy (*The Way of Perfection*, Doubleday). At first it is a lot of work for the aspirant to pump the water of devotion to feed the garden of the soul. However, by the four stage, the water flows freely and unaided. In fact, prayer, contemplation and meditation are very closely related, as the cardiologist Dr. Larry Dossey has pointed out in his books, such as *Prayer is Good Medicine*. Dr. Dossey has also proven, through many articles now published **in medical journals**, that prayer can effect healing

changes even in unsuspecting patients, most often in the range of 40% to 50% efficacy, which he points out is a huge percentage of patients, signifying a major effect beyond chance. (Dr. Dossey was the keynote speaker at the USPA Conference in 2001, so I was also able to meet him personally. I highly recommend the videotape of his lecture to everyone.)

Many spiritual leaders of various religions go even further by teaching that anything is possible through prayer. What better state of mind for an effective prayer, clear of mental "noise and static," than just after meditation? In Yogananda's book, *How You Can Talk With God*, it says, "We should speak to the Divine Spirit with confidence and with a feeling of closeness, as to a father or a mother. Our relationship with God should be one of unconditional love." God's response, he states, can be felt during meditation "as peace, as love, or as joy."

Meditation is referred to in the biblical sayings, "Be still and know that I am God," "If thine eye be single, thy whole body shall be filled with light," and "The kingdom of God is within you." These sayings have great significance that can be explored during deep meditation. For me, the striving for stillness, even of the breath, and the concentration aspect of **one-pointedness**, within the depths of meditation, have been two very important insights, which have created memorable breakthroughs for me in meditation.

In the Buddhist tradition, the emptying of the mind is the key concept for meditation. Often a mandala or "yantra" is used to focus the mind to an interiorized state. In a *TIME* article on Buddhism (10/13/97), the magazine says that enlightenment is regarded as the "awakening to the true nature of reality" but also, "a little below Nirvana." In the Hindu tradition, the state of samadhi is very similar to Nirvana, but enlightenment is definitely regarded as the highest goal. To reach this goal, the ancient eight-fold path of Patanjali's *YOGA SUTRAS* is the accepted roadmap for the path of yoga taught in the schools of Raja Yoga, Kundalini Yoga, Kriya Yoga, etc. *The Science of Yoga* by Taimni (Theosophical Press), is one of the best translations, with excellent commentary. Patanjali's eight stages are:

- 1) Self-restraint (Yama),
- 2) Observance (Niyama),

- 3) Posture (Asana),
- 4) Control of breath (Pranayama),
- 5) Withdrawal from sense perception (Pratyahara),
- 6) Concentration (Dharana),
- 7) Meditation (Dhyana),
- 8) Super-consciousness (Samadhi).

It can be said that the connection between meditation and religion is obvious. In a recent survey, respondents who used meditative prayer were **twice as likely** to feel a "strong relationship with God" than if they stuck to the usual petitionary style of prayer. When we reflect that the word "religion" comes from the Latin word "religio," meaning "to link back," it reminds us of Dr. LeShan's statements about "coming home," in regards to meditation. Thus, meditation is inherently compatible with any religion, though it is often taught and practiced without any religious connotation. The practice of meditation is effective, even if regarded simply as a technique. Many people just meditate for what Dr. Herbert Benson called the "relaxation response" in his book with the same title. The main reasons professionals have for prescribing meditation for their patients are: *for stress reduction as well as improving health and mental clarity*.

BREATHING EXERCISE

Does anyone believe that we can change your consciousness and induce a relaxation response in less than **5 minutes?** Let's try a simple breathing exercise that will induce a meditative state. Sit with spine straight, preferably away from the back of the chair with the eyes closed:

Oxygenating Relaxation Exercise to Quiet the Breath

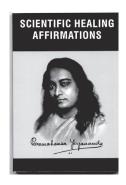
- 1) Inhale slowly for the count of 10,
- 2) Hold for a count of 10,
- 3) Then, slowly exhale for a count of 10.
- 4) Repeat a few times.

Doing this pranayama exercise before meditating will: (a) quickly interrupt the internal dialogue, (b) improve the depth of meditation, and (c) produce better and more satisfying results in a shorter period of time.

THE POWER OF AFFIRMATION

Another area of great help to meditators is the science of affirmation. Affirmations are really like guided meditations and a good introduction to the **mental interiorization** necessary for meditation. They work in conjunction with your goals. Furthermore, they have been shown to program your subconscious "biocomputer" with new habits and produce healthful results. Another less well known result are the beneficial synchronistic events from affirmation practice, such as the first insight in the book, *The Celestine Prophecy*, by James Redfield (Warner Books). As mentioned earlier, the effect of the concentrated conscious mind over objective reality usually surpasses normal expectations. Affirmation practice is the key to creating major changes in one's life. What we strongly believe usually becomes true for us, whether good or bad. Therefore, be careful, as Anthony Robbins warns, of negative affirmations said during periods of anger or fear. Instead, I suggest creating new, beneficial beliefs slightly beyond your comfort zone, repeat them mentally and see what positive things will happen. Using the directions from his wonderful pocketbook, Scientific Healing Affirmations, Yogananda instructs us to:

"Free the mind from restlessness and worries. Choose your affirmation and repeat all of it, first loudly, then softly and more slowly, until your voice becomes a whisper. Then gradually affirm it mentally only...until you feel that you have attained a deep, unbroken concentration—not unconsciousness, but a profound continuity of uninterrupted thought."



Once background mental repetition in a rhythmic fashion is achieved, the affirmation takes on a life of its own and we notice that it sort of "echos" in the mind as it keeps repeating. Then, days or weeks later, we find a change has taken place in our lives, which is beneficial and sometimes surprising. This is how the yogis change physical reality. Try one of these examples from the book, "There is a hidden strength within me to overcome

all obstacles and temptations", "I am a prince of peace, sitting on the throne of poise directing my kingdom of activity" or "I will purify my mind with the thought that God is guiding my every activity." Read it out loud a few times until it is memorized and then repeat mentally. Other affirmations that I use often are: "I will go forth in perfect faith in the power of omnipresent good to bring me what I need at the time I need it" or my favorite, "I am ever-protected by omnipresent goodness." It is recommended that you memorize a few of them, like these that Yogananda says he has "spiritualized," to have a fully equipped arsenal with you at all times to use as needed. Thoughts are things. Concentrated affirmation practice will prove it for you.

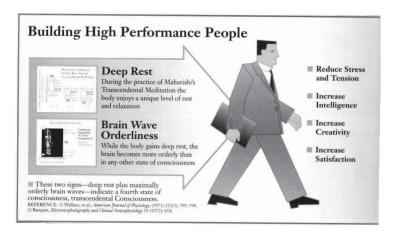
MANTRA MEDITATION

Meditating "about" something is essentially contemplation, which Patanjali's YOGA SUTRAS define as "Dhyana," where the concentration is narrowed and focused to discern the foundational essence of the object of meditation. To quote Evelyn Underhill from her 500-page treatise called Mysticism (Oneworld Pub.), written in 1911, "The modern American schools of mental healing and New Thought recommend concentration upon a carefully selected word as the starting-point of efficacious meditation." Examples that are popular today include the words, "one," "aum," "the Lord is my shepherd," or a direct command like "relax." One can also ask a single identity question, as Paul Brunton says in Discover Yourself, (Samuel Weiser Pub.): "Who is it that is trying to make the mind still? Then you must wait reverently. The answer will be heralded by an intuition, a gentle sense, and something very

indeterminate. You cannot force it. You must pay the keenest attention and yield yourself up to it. That is the higher meditation, when you let the interior world reveal itself to you." This carefully chosen line of questioning, from my experience, can create a consciousness breakthrough when used as a point of concentration with earnest sincerity.

To summarize, follow these simple steps for your meditation practice:

- 1) Sit upright with the eyes closed, relaxing the body and calming the mind, while putting aside all outward thoughts, giving this time exclusively to meditation. You may start with a prayer if you are so inclined to help elevate your consciousness and spiritualize the experience.
- 2) Do the breathing exercise from the previous section, thus gaining control over the breath.
- 3) Pick a single word or phrase (mantra) which has meaning for you. In a similar fashion as affirmation practice, repeat the mantra in your mind, returning to the mantra when you get distracted.
- 4) You may also simply watch the breath, gently bringing the mind back to your single purpose, as you continue to relax and let go of every thought except one.



Practice on a regular basis, for 10-15 minutes (Dr. Simonton suggests to start with once-a-week, then twice-a-week, then finally daily.) Most meditators find daily practice well worth the effort. Suggestion: it is important while the habit is being formed, you practice regularly, with an empty stomach, even if only for five minutes, rather than skip the agreed-to routine because of some "emergency."

MODERN MEDITATION

Popular magazines like the *Washingtonian*, *SELF*, *TIME*, *SPA*, and *Let's Live*, have all had articles on meditation and yoga, with experts like Dr. Andrew Wyle suggesting that inducing a state in which you are relaxed and emotionally comforted can have substantial health benefits. Insurance benefits are also available if you are a veteran or working at IBM or GM. The Veterans Administration, IBM, and GM all pay for part of Transcendental Meditation training under the category of "stress management."

Regarding a modern approach to meditation, Dr. Khalsa, medical physician and author of the recently published book (and audiobook), *Brain Longevity* (Warner Books), says that,

"Occasionally my patients will add various elements of their brain longevity programs one at a time, and will delay their participation in meditation. Sometimes they put off meditation for a week or two, because it seems exotic to them, particularly if they are older patients who have never meditated. But when they do finally begin to meditate, they invariably report to me that the meditation 'took them to a new level.' Meditation is really that powerful."

He talks about how great athletes use meditation to achieve their repeatable performances. He boasts about taking over 90% of his students through a medical course that had a 50% national pass rate by training them in meditation first. Dr. Khalsa presents the following medical benefits from meditation in his book, *Brain Longevity*:

MEDITATION CAUSES A DECREASE IN	MEDITATION CAUSES AN INCREASE IN
Oxygen consumption	Healthspan
Blood lactate	Lifespan
Heart rate	Hearing
Blood pressure	Vision
Respiration rate	Youthfulness
Cortisol production	Vitality

SOME SUGGESTIONS

In the beginning of meditation practice, the most important task you can accomplish, which may take all of your will power and determination, is to sit still, in silence, for at least 10 minutes each day. If you can promise yourself or someone else, that you will keep such a commitment to create a beneficial habit, this time will become your resource. A yoga magazine once stated, "The more trouble you have allocating twenty minutes a day for meditation, the more desperately you probably need it." Having your own "meditation room" in the house is a great reinforcement for the importance of this practice. I am also happy to see that BWI Airport now has a meditation room. Going to a weekly meditation group, such as an Employee Sponsored Meditation Group (like the Pentagon has maintained for over twenty years), can become an oasis of peacefulness and restoration in an otherwise hectic week. At first, the subconscious mind tends to use the time to "dump" on you. All of your worries, troubles, desires, etc. will at first plague many or most of your meditations. A lot of people get discouraged at this point if day after day it seems that they are not really meditating. However, that is a trap created by the ego. Instead, this experience of "clearing" the mind of "garbage thoughts," as meditators call them, is very therapeutic. It makes way for the clear thoughts to come and the "space between thoughts" which becomes blissful. By the way, "bliss" is the Eastern phrase for the very subtle joy that wells up from deep within everyone who becomes proficient at meditation. It is so peaceful, transforming and expansive that meditators sometimes call it "transcending" because it really is like a new level of consciousness.

Often it lasts for a while after meditation period is over. More so, it is directly proportional, from my experience, to the **length** and **depth** of meditation. In other words, if you meditate for an hour or so but not very deeply, another "deeper" meditation may be more refreshing and have lasting effects, though it is shorter.

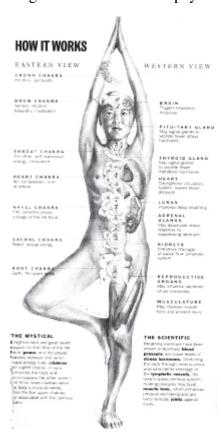
I have experienced transforming and memorable changes in longer meditations that in some cases have become milestones for me in my spiritual evolution. I've had three-hour meditations at home where the last hour is the most exciting and uplifting. The inspirations that come make it all worthwhile and memorable, especially when combined with prayer. St. Teresa of Avila, for example, called meditation the "prayer of quiet" for good reason (*The Interior Castle*, Doubleday). I've also participated in 6 and 8-hour meditations with our DC Meditation Center in College Park, Maryland. To reassure those who can't imagine such a long time "doing nothing," the first thing one invariably finds is that the time passes quickly for an experienced meditator without a lot of mental noise. It is the mental distractions that create the awareness of time. Meditators benefit from longer meditations, especially if they mentally prepare for the experience by "cleaning house" first.

In deep meditations, one will detach from the consciousness of the body. It starts to happen slowly as time goes on, starting from the lower part of the body and moving upwards, until it seems that only the spine and brain are present in your field of awareness. That is when the mental space of meditation begins to expand and "lighten." Mentally retreating to the spine and brain helps this process. Often referred to in yoga as "kundalini," the upraising of spinal energy and consciousness is central to the universal phenomena of meditation. In fact, Gopi Krishna, author of *The Biological Basis of Religion and Genius*, and also Dr. Lee Sanella, author of *Kundalini: Psychosis or Transcendence?* both believe that the kundalini process is biologically inherent in all human beings. Sometimes the mental expansion it induces happen spontaneously, as in the case with Gopi Krishna, following years of daily meditation.

What a kundalini awakening or the state of samadhi may feel like can be imagined by mentally visualizing an expanding bubble of consciousness from the room to the building, city, country, world, solar system, galaxy, and finally letting go to infinity to mentally touch the universe. This is also a good visualization to use at the start of meditation. Another similarly fulfilling visualization taught the pocket book, *Metaphysical Meditations*, is to increase the feeling of joy as a growing bubble, expanding it to infinite size whenever we find ourselves feeling happy.

CENTERS OF CONSCIOUSNESS

As you meditate, it is important to remember to "look up," even while your eyes are closed. The frontal lobe of the brain is a mystery to scientists today and yet provides our advanced insights and our sense of inspiration if activated properly. By looking downward, one will start to feel sleepy, even while sitting up. Another finding is that the concept of "higher consciousness" is a physical phenomenon as well. What we focus



upon with concentration, we often can bring into being. Therefore, by concentrating upwards with our eyes closed during meditation, we can awaken the frontal lobe and what the Eastern mystics call "the spiritual eye" (Ajna center), the tunnel of light, as well as the highest "crown chakra" center of consciousness, (Sahasrara) at the top of the head. (Recall that many paintings of saints show a "halo" around the top of the head because the crown chakra has opened in that saint.) The practice of looking upward with the eyes closed also tends to draw the consciousness upwards, which can easily be physically perceived during meditation. Other chakras, as indicated in TIME (4/23/01) include the throat center (Vishuddha) of powerful speech, the heart center

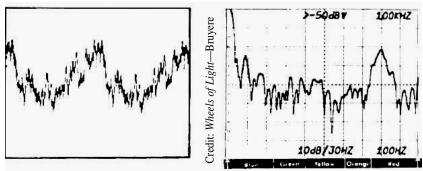
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(Anahata) where the feeling of love is the strongest, the lumbar center (Manipura) which is also called the power center of "chi" for martial arts, the sacral center (Svadhistana) of sex energy, and the root chakra (Muladhara) of survival at the perineum (most books simply say "the bottom of the spine"). I discovered my Muladhara chakra on June 15, 1977 quite unexpectedly while coincidentally in Chicago at the 2nd International Congress on Meditation and Related Therapies. I stuck my head out of a window from the 15th story of the YMCA to look down to the street. Try it sometime, from any tall building or bridge, looking down suddenly to the ground. The overwhelming, fearful surge of selfpreservation radiating from the perineum is unforgettable. Otherwise, the Muladhara center is mostly dormant in civilized, daily life. For those interested in an interdisciplinary understanding of the nature of the chakras, Dr. Caroline Myss in Anatomy of the Spirit, has proven a strong correlation exists between the 7 chakras, the 7 sacraments, and the 7 rungs of the Sefirot.

Not many people may know that the reality of the chakras of the body as centers of consciousness, has been shown by a UCLA professor, Dr. Valerie Hunt, who, during ten years of research, recorded electrode signal from the major body chakras during various states of consciousness. An example is shown here from *Wheels of Light* (Simon & Schuster) by aura reader, Rosalyn Bruyere, who worked closely with Dr. Hunt for all of those years. During her lectures, Dr. Hunt showed that new distinctive

Violet chakra signal and its spectrum - Dr. Hunt

Credit: Wheels of Light—Bruyere



Violet chakra signal and its spectrum – Dr. Hunt

frequency spectra are measurable from these centers, apart from the EMG and EEG frequency ranges, correlating to predominant colors of the "aura." She is currently working on an advanced biofeedback machine based upon her findings. (Dr. Hunt's lectures on videotape are available from the USPA where she spoke two years in a row.) Dr. Hunt's work is the first to prove that aura "colors" are objective, measurable states of consciousness, distinctly identifiable. Her work has profound implications for alternative health and wellness research. It will bring this esoteric subject of chakras and auras into the mainstream medical community, in the same way that acupuncture became accepted in the West, after research proved its worth.

Regarding the higher centers of consciousness normally activated during meditation, one indication that they are opening is the internal experience of light. Inexperienced meditators may laugh but remember that the pineal gland, esoterically connected to the crown chakra, responds to light though deep in the brain. This mystery of it being "optically activated" has been related to the reception of direct sunlight on the eyes. Esoterically, what I have found, especially during longer meditations, lasting a few hours, is that it appears to the meditator that someone has "turned on the ceiling light" in the room. This may be a result of meditation directly stimulating the pineal gland. Other times, various deep colors will be seen on the internal mental screen. Most often, simply a white, opal glow will be perceived as one relaxes into a deep meditation. However, in the beginning, the tendency is to think about it, which drives away the phenomenon. Visualizing a white vertical tube for the spine, lit up like a fluorescent bulb, has helped me focus on "retreating to the spine and brain", which is a powerful but advanced technique. Yogananda suggests that whenever you see a quiet pond without waves, stop and meditate nearby with eyes partly open, concentrating on quieting the mind to make it as calm as the pond. Merging and expanding one's awareness of light, peace, love, or joy, is certainly the best course to take, while consciously feeling gratitude in one's heart. Then we can understand why the ancient BHAGAVAD GITA from India, says that meditation induces "radiance of character."

ELECTRONIC MEDITATION

Some people believe that learning meditation is not necessary since there are many machines, many of which are patented, that put the brain in a state of meditation. Examples are James Gall's "Method and System for Altering Consciousness" Patent #5,123,899, also Robert Monroe's Patent 5,356,368 of almost the same title, and Tye Rubins' "Brain Wave Synchronizer" Patent #5,409,445. These were referred to as "electronic drugs" about ten years ago when they became very popular. I have tried a few of them, especially the ones with blinking lights in front of the eyes and low frequency tones for the ears. Though your brain may be driven to produce theta waves, your awareness can actually fight the experience since it may seem unexpected and often intrusive. They may work for some people but they don't allow the deep awareness to emerge from within which takes practice and bodily relaxation as well. Electronic drugs also can produce a dependency and a limit to the depth and scope of the experience. Therefore, I don't recommend them as a shortcut.

HATHA YOGA AND PRANAYAMA

A more natural approach to relaxation and flexibility is Hatha Yoga. Often a state of mind can only be optimized if the body is free from tension, pain and distraction. Yoga *asanas* or Hatha Yoga, offered at many fitness centers, can be very beneficial for toning and stretching the ligaments, muscles, and spine. Yoga teaches that maintaining a flexible spine ensures the flow of kundalini energy upwards during meditation. Furthermore, doing a pranayama exercise (moving prana energy with the breath and concentrated visualization) such as the fire breath, khapalabhakta breathing, or even the gentle Kriya Yoga technique, helps clear the spinal "blockages" which keep our attention at the lower chakras. The Kriya technique, for example, also enables the meditator to feel the spinal currents of energy and use them beneficially to enhance the meditation experience. Even the beginner's Hong Sau technique is also a powerful pranayama capable of quieting the breath and focusing the

attention at the highest spiritual centers. Hatha yoga and pranayama are additional techniques that help prepare the body and mind for meditation.

A QUICK SHORTCUT

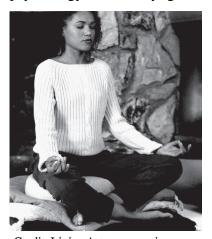
Here is an example of a consciousness changing breathing exercise or pranayama which I discovered that helps in times of drowsiness, especially while driving or working long hours is the following. It is also very similar to one of the kundalini exercises taught in the book by Dr. Khalsa. It will give you in a few seconds the feeling of what a longer meditation will feel like: 1) Inhale, hold the breath, and look up; 2) Keep holding the breath as you concentrate at the point between the eyebrows; 3) Exhale only after a minimum of 10 seconds. It only takes 10-15 seconds or so to feel the tingling sensation in the middle of the forehead and the mental change which will invariably awaken even a sleepy driver or a drowsy office worker. Holding the breath has been proven to cause the brain's blood vessels to expand in compensation. This immediately improves brain circulation and alertness. Practicing this each day may also directly improve mental faculties.

CONCLUSION

Meditation today is proven to be physiologically transforming and recommended by doctors. To review, we touched on the practice of mantra meditation, where it is recommended to stick with one mantra you choose for at least a month or more before trying another one. We also practiced a powerful breathing exercise that helps awaken brain cells through oxygen therapy. The discussion of kundalini and the chakras, vital to the advanced yogi, gave a basis for the deeper benefits that can be achieved through regular meditation. Also helpful in transforming the conscious mind is the astounding changes a person can experience through the correct practice of affirmation, implanted in the subconscious or superconscious, without any extraordinary effort. Thus, as you progress in affirmation and meditation practice, you may rightly expect some or all of the following:

- An increasing peacefulness during meditation.
- A conscious inner experience of calmness in meditation metamorphosing into increasing bliss.
- A deepening of one's understanding, and finding answers to one's questions through the calm intuitive state of inner perception.
- An increasing mental and physical efficiency in one's daily life.
- Love for meditation and the desire to hold onto the peace and joy of the meditative state in preference to attraction to anything in the world.
- An expanding consciousness of loving all with the unconditional love that one feels toward his own dearest loved ones.
- Actual contact with God, and worshipping Him as ever-new bliss felt in meditation and in His omnipresent manifestations within and beyond all creation. -Yogananda (Self-Realization magazine, Spring, 1992)

You may choose to take meditation lessons locally from a yoga center or through more than one correspondence courses offering meditation instructions. Dr. Carl G. Jung, founder of analytical psychology, said that yoga and meditation promise "undreamed-of



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possibilities." This is also the title of a free introductory booklet available from Self-Realization Fellowship, (3880 San Rafael Ave., Los Angeles, CA 90065) describing excellent and inexpensive meditation lessons, including the Kriya and Hong Sau techniques. Meditate to improve alertness, mindfulness, general health and well-being, while enhancing one's spiritual practice, whatever that may be...or as Yogananda says, "Why not unite all your smaller lights, letting



them shine forth in one splendid effulgence to illumine the bodily house