



FLOATING

the sensory deprivation experience

By ADAM KARDASH

I have floated eight times, but of all my floating experiences the first one was the most intense. I remember being so anxious during the brief shower that preceded the hour and a float. And before I knew it, I was sitting naked inside a grey, water-filled oval pod, eight feet in length, five feet wide, and five feet deep.

With the door still open, I gazed around the insides of the chamber and reassured myself that nothing dreadful could possibly happen. I then lay horizontally. In an instant, the 800 pounds of dissolved Epsom salts had me floating on the surface like a buoy.

Within a few moments I began to feel a little more relaxed. In one swift motion, I closed the door of the chamber. I was lying in utter darkness. The cotton in my ears deprived me of hearing. As I lay motionless, my body temperature regulated itself to the 93½ degree water and I soon felt nothing.

I was completely sensory deprived. I began craving any type of stimulus. And soon, after what seemed to be a few minutes of sheer restlessness, my mind turned all awareness inward. I became acutely aware of how tense my body was; my heartbeat became extraordinarily loud; I felt my stomach churn; and a grey-blue haze glowed before my eyes.

After a minute or so my body felt as though it was slowly spinning, and without sight and sound to navigate I became totally disoriented. Isolated from all external stimuli, I became drugged by the throbbing of my own heart and the functions of my body. Paradoxically, although I was completely deprived of sensations, I felt extremely stimulated.

I then started to relax different parts of my body. At first this was difficult, as my mind kept wandering off and exploring its new environment. But soon after, a strange sensation began to occur. Each part of my body, as it became relaxed, slowly felt as if it were disappearing into the black void that surrounded me. First my legs, hands, arms, torso, then finally my chest and head felt as if they had all evaporated. The only thing that seemed to be left of me was my mind.

I presume that these initial events occurred within the first 10 or fifteen minutes. What followed in the remaining 45 to 50 minutes is much harder to recall in an ordered fashion.

During this time, my mind was the medium for a myriad of images, sounds, and sensations. At first I let these unpatterned thoughts flow in and out of my mind. But later, because I wanted to fully relax and purge myself of all distractions, I attempted to stop this stream of thoughts. Strange as it may sound, I was unable to do so. I could not control what was coming in or leaving my mind. I remember finding it very disturbing that I could not "stop thinking."

Before I knew it, as if only a few minutes had passed, soft music began to play in the flotation chamber, signifying the end of the float. But although my first floating experience was technically over, in essence, it had just begun.

In a daze, I exited the tank, slowly dressed myself, and paid the 30-dollar fee. During the two-block walk to my car, I could not suppress the smile on my face. My body

felt extremely refreshed and relaxed; it was as though I had just had an eight-hour sleep.

The biggest change, however, occurred in the clarity and acuity that all my senses were experiencing. It was as if my senses were compensating for the deprivation they had just endured. Every object seemed to be bright and vivid. I heard everything with a sharpness and clarity which I had never experienced. My sense of touch was tremendously magnified; everything seemed to possess great texture. I was also encountering all the city's scents with an uncontrollable vigor.

The most change, however, could be best articulated by what a Tranquillity Tanks staff member Gord Stevenson mentioned before my float. Stevenson said that after you float, for about two days or so, "you will feel more inside your body."

I usually frown on such phrases because they sound completely ridiculous. How would I possibly be able to "feel more inside my body?" Strangely enough, though, that is exactly how I felt.

Scientific Verification

To those who have never experienced it, floating may sound like just another New Age gimmick. But unlike much of the New Age movement, numerous studies have been published attesting to floating's powerfully positive physiological and psychological effects.



floating has been scientifically proven to have powerfully positive effects on our physical and mental well-beings.

For example, as I mentioned earlier, floating is extremely relaxing and there is ample scientific evidence to back this up.

Endocrinologist John Turner and psychologist Thomas Fine of the Medical College in Ohio, for example, have done extensive testing on floating's effects on hormones and other neurochemicals. They discovered that floating activates what is commonly referred to as the body's *relaxation response* — a state where levels of stress-related biochemicals are sharply reduced; heart rate, blood pressure, and oxygen consumption drop; breathing becomes deep and slow; dexterity increases; and muscles relax.

The *relaxation response* is the body's counter-response to what endocrinologist Hans Selyne termed the "fight-or-flight" reaction — an emotionally triggered state where all the above-mentioned body functions increase in intensity. The body uses the fight-or-flight response to aid itself in situations where we might be, for example, "running for our lives."

But an overactivation of the fight-or-flight reaction impairs our capability to perform dextrous and skilful movements and, more significantly, limits our ability to think coherently.

Floating in a sensory-deprived environment, Turner and Fine found, allows the body to easily assume the *relaxation response* — a virtual stress-free state which, once one is familiar with it, is highly conducive toward clear thinking.

Studies have also shown that floating helps to decrease or even eliminate pain. A number of clinics, such as Dr. Fine's, use floating as a method of helping chronic-pain patients ease their suffering. Floating, Turner and Fine speculate, stimulates the secretions of endorphins — the body's own opiates. During one 45 minute float the body likely floods itself with its opiates and may not only reduce feelings of pain but cause the euphoric sensation felt by many floaters.

Floating can also have a powerful effect on mental processes. For example, studies have shown that floating increases the awareness and functions of the right hemisphere of the brain — the side which processes information in a mostly non-verbal, simultaneous, innovative, non-linear, and imagistic manner. Today's society, according to many academics, stresses left-brain functions — that is, most of us are more or less conditioned to use our analytical, sequential, logical, and time-oriented processes. This is best exemplified by our school systems where, for the most part, right-brain functions such as fantasizing and intuitive answers to questions are frowned upon. By the time a student is finished his formal education, left-brain functions are firmly rooted in their dominating roles.

Therefore, most of us would greatly benefit from an increased use of our right-brain hemisphere's processes, Michael Hutchison, author of *The Book of Floating* — a comprehensive examination of the effects of floating — suggests that it is precisely this increase in the functioning of the right-brain processes which leads to a claim by many people who have floated that they feel more confident, competent, and productive.

Practitioners of Zen, yoga, meditation, self-hypnosis, and even jogging — activities which have been scientifically found to nourish right-brain functions — often claim to have the same feelings. But in a review of the literature Hutchison has found that of all the practices which stimulate right-brain functions, floating is the most effective.

Perhaps the greatest example of a right-brain function that can readily occur in the tank is a therapeutic technique called visualization. Many floaters, according to

Tranquillity Tanks staff, practise this technique on a regular basis.

The most well-known practitioner of visualization is Rafael Septien, a place-kicker for the Dallas Cowboys, who began floating at the beginning of the 1981 season when he was suffering from a crippling injury. While floating to ease the pain and to relax, Septien found that his ability to manipulate mental images was strengthened. He therefore began visualizing himself kicking perfect field goals. Septien performed well that season and was later selected for the all-star team. He maintains that his floats were largely responsible for his recovery and effectiveness that season.

"There's no doubt the tank is powerful," Septien told Hutchison in a November 1984 *Esquire* article. "They say that practice makes perfect, but actually it's *perfect practice* that makes perfect. That's what you visualize in the tank — perfect practice."

Studies have shown that if the mind is presented with a vivid image, the subconscious and the body perceive it to be real. Septien visualizing himself kicking perfect field goals may have been just as effective as actually kicking them.

Visualization, however, is difficult to perform without total concentration. The flotation chamber, with its absence of distractions, is an ideal place for the technique. According to Hutchison, many athletes — such as the US bob-sled team members and javelin thrower David Schmeltzer — now float regularly to enhance their performance. In fact, both the Philadelphia Eagles football team and the Philadelphia Phillies baseball team installed flotation chambers before their 1980-81 season. Both teams, interestingly, had successful seasons that year, winning a Superbowl and World Series respectively.

Visualization via the flotation chamber has also proven to be a powerful technique for the elimination of unwanted habits and addictions. Hutchison states that a number of physicians have found that destructive behaviour patterns such as over-eating or smoking could easily be changed by short series of floats.

The first step toward change, he explains, is to just go for a float without any expectations. At the very least, he states, you will feel *very* relaxed. Relaxation, Hutchison adds, not only reduces stress — which very often causes unwanted behaviours — but aids in self-awareness.

Awareness of our physical and emotional states makes it easier to see the effects that unwanted behaviour may have on our body. Smokers, for example, would intensely feel the effects their habit had on their lungs. Overeaters would easily feel the effects of their extra weight. Whatever the unwanted habit may be, Hutchison explains, floating increases our awareness about its nature and cause, and subsequently we are more likely to be motivated to do something about it.

Vividly imagining oneself in situations where our habit to smoke or overeat is triggered, and then picturing our-

selves resisting the temptations, has been scientifically proven to be a powerful method of positive behaviour change.

But stemming an addictive behaviour is difficult because often the habit causes the body to release pleasurable endorphins, limiting our ability to experience pleasure on its own. But in addition to imagining ourselves resisting the habitual behaviour, scientists have found that visualizing pleasurable and fulfilling scenes where the unwanted behaviour plays no part at all is particularly effective in changing unwanted behaviour patterns as well.

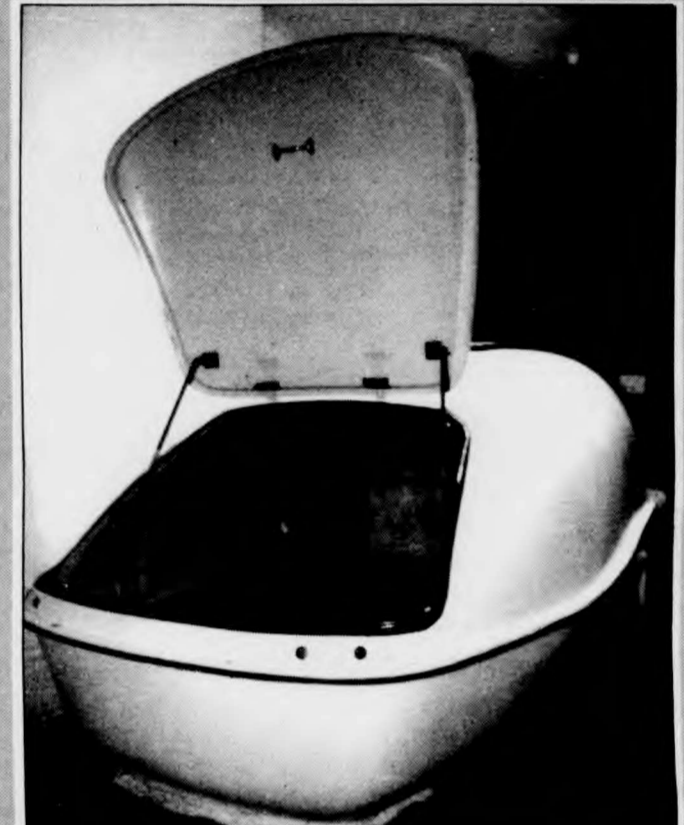
It seems that because the brain perceives these visualized images to be real, after a while, the imagined *desired* behaviour becomes ingrained, making it easier to actually change the unwanted habit. Scientists have also found that if the brain perceives an imagined pleasurable scene to be real, it will react to it by releasing neurochemicals, such as the pleasurable endorphins. In other words, if the visualization technique is effectively employed in the tank, you may actually start to feel the positive results of changing an unwanted habit during the float. These feelings, Hutchison states, will stay with you and help you to change your habitual behaviour.

Developing the Float Chamber

Sensory deprivation, in one form or another, has been employed for thousands of years. Yogis, mystics, and monks, for example, used sensory deprivation techniques to meditate and ultimately attain enlightenment. But the flotation chamber, as we know it, was developed by a psychoanalyst and neuropsychologist named Dr. John C. Lilly in the early 1950s.

Lilly was fascinated with the topic of brain-mind processes and, in particular, the question of the origin of consciousness. He found that the best way to study this topic was to isolate the mind from external stimulation. In 1954, at the United States National Institution of Mental Health, Lilly stumbled upon an ideal facility — a sound-proof chamber containing a tank constructed during World War II for experiments by the navy on the metabolism of underwater swimmers. This gave Lilly and his co-researcher Dr. Jay Shurley the impetus to construct their own sensory deprivation chamber.

Their first tank had the floater suspended in an upright position, entirely underwater, with the head covered by an underwater breathing apparatus and mask. But over the years, Lilly and Shurley simplified and improved the general design of the tank, allowing the floater to lie in a more comfortable horizontal position, floating in a filtered and clean, buoyant Epsom salt solution in a thermostat-controlled environment.



Flotation chambers, such as the one pictured above, range from \$6,000-\$12,000.

But it wasn't until the 1970s that the general public began accepting the flotation chamber. By this time, Lilly had perfected the design of the tank and had begun inviting members of the newly formed "Human Potential" movement to his Malibu home for floats.

Word of the powerful effects and potential of the flotation chambers quickly spread and further innovations to the tanks — particularly the changes that allowed for the relatively inexpensive construction of tanks for private home use — occurred. By the late '70s, thousands of people had floated either in their private homes or through informal floating networks. In addition, newly-formed companies began manufacturing tanks for commercial use.

But it was the publication of Paddy Chayefsky's *Altered States* — a novel about a scientist's experiments on himself in a float tank, somewhat based on Lilly's experiences — and the release of the movie two years later that dramatically increased the general public's awareness of floating. Since the movie's release, both the number of people visiting commercial float-centres and sales of private flotation chambers have sharply risen.

Hutchison states that today there are thousands of tanks in everyday use and over 100 commercial float centres, like Toronto's Tranquillity Tanks, operating in North America, Europe, and Japan.

For years tanks were confined to psychology departments at universities, private homes, or in commercial tank centres. But now tanks are employed in hospitals, health spas, exercise and recreation centres, biofitness institutes, corporations, and even in beauty salons. Some universities even use that tanks for courses on "superlearning."

Research involving floating has also intensified. Many universities and research centres have acquired tanks in order to conduct research in a diverse range of topics ranging from biochemistry, electromagnetism, and sleep to suggestibility, self-regulation, and healing.

The tank design has also radically changed. There are dozens of flotation chamber models to choose from, ranging from a \$12,000 luxurious, domed-shaped model complete with in-tank lighting, water massage, underwater stereo, intercom, and video, to a \$2,000-\$2,500 do-it-yourself home model.

As Hutchison states: "Tanks are rapidly losing their air of the exotic, the laboratory, as they become attractive, glossy, high-tech appliances; they are no longer unwieldy curiosity pieces but tools, as accepted and as useful as the home computer."

Toronto's Float Centre

Tranquillity Tanks Inc., located at Sherbourne and Bloor in Toronto, is typical of hundreds of commercial float centres.

In business for about seven years, the centre was established as part of an existing holistic health shop.

"Business is carrying on quite well," said Tranquillity Tanks owner Elizabeth Randall. "Originally people were frightened by the idea, but now that the concept has become more familiar, it is much more accepted."

"Making the first step (to float) is usually the hardest," explained Randall. "Most of our clients — about 75 per cent — have been referred to the centre by friends."

Randall said that about 60 per cent of Tranquillity Tanks' clients are men and that its patrons' ages range from about 25 to 40. Other than these variables, a socio-economic profile of Tranquillity Tanks customers is hard to pin down. The facility, however, primarily services what Randall terms a "value-oriented, inner-directed group."

Tranquillity Tanks houses three tanks — all eight feet high, five feet deep, and five feet high — ranging in price from \$6,000-\$12,000. The tanks are run on a system similar to that of a swimming pool or jacuzzi, and therefore require a high degree of maintenance with such things as the water being checked for PH levels, density, clarity, and cleanliness. In addition, the tanks' 1,000 pound \$3,000 — Epsom salt solution must be closely monitored.

For \$30, a client receives approximately an hour and a half float, towels, and access to shower facilities. But the centre can only accommodate 21 clients a day, or seven a day per tank. In addition, Randall said that the centre is only busy during the winter months, making a commercial float centre not a very profitable venture.

"It's not a good choice of a business if you're doing it for the money," explained Randall, who also works in the film industry. "You really have to enjoy the psychology of the self and be of the self-exploratory nature. Then it's worthwhile."

ILLUSTRATION: ANNE HOOPER
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