THE PHYSIO-KUNDALINI SYNDROME AND MENTAL ILLNESS

Bruce Greyson
Farmington, Connecticut

In Eastern spiritual traditions, the biological mechanism of both individual enlightenment and evolution of the species toward higher consciousness is called kundalini, a potential force that once awakened can produce a variety of mental, emotional, physical, and spiritual effects. The ancient yogic texts described a life energy present in all living beings called prana. Kundalini was described as a normally dormant mechanism or organizing principle that could be activated or awakened under certain conditions, to strengthen or purify an individual's prana, transforming its effects upon the individual.

Kundalini has been held responsible for life itself (Krishna, 1972), the sexual drive, creativity, genius, longevity, and vigor (Krishna, 1975), and our evolution toward an ultimate, magnificent state of consciousness (Krishna, 1974b). The dormant kundalini is said to be situated at the base of the spine (Muktananda, 1974; Kason et al., 1993), and when aroused can travel upwards along the spinal cord to the brain, where it can stimulate a dormant chamber of the brain (the brahma randhra), leading to biological transformation and immensely expanded perception (Krishna, 1972, 1975).

THE PHYSIO-KUNDALINI SYNDROME

Itzhak Bentov (1977), a biomedical engineer who studied the physiological effects of altered states of consciousness, concluded...
that the normal biological evolution of the human nervous system could be accelerated under certain circumstances, triggering a predictable sequence of physiological stresses on the body that he described as a progressive sensory-motor cortex syndrome. While Bentov acknowledged that the concept of kundalini involves spiritual forces and effects beyond these physiological symptoms, he proposed a limited mechanical-physiological portion of the kundalini syndrome as a useful working model.

This intentionally simplistic model, which Bentov called the "physio-kundalini syndrome," describes a characteristic anatomic progression of sensory and motor symptoms. While classical esoteric literature envisioned kundalini as rising from the base of the spine up through the head (Krishna, 1971; Muktananda, 1974), Bentov speculated that the physio-kundalini symptoms could result from an electrical polarization spreading along the sensory and motor cortices, in turn induced by acoustical standing waves in the cerebral ventricles. Some kundalini scholars maintain that the physio-kundalini concept oversimplifies kundalini and ignores the critically important spiritual evolutionary features that define that process; others maintain further that the physiological symptoms may not represent kundalini activation at all, but rather a less profound effect of bioenergy or prana (Greenwell, 1990; Kieffer, in press; Scott, 1983).

Nevertheless, Lee Sannella (1987), a psychiatrist and ophthalmologist who has encountered patients presenting with problems attributable to kundalini activation, views Bentov's physio-kundalini syndrome as the best available model. Observing that the classical kundalini process is inexplicable in terms of Western medical science, Sannella proposes that we employ the physio-kundalini model to study (and treat patients suffering from) the physiological dimension of the kundalini experience. Most Western health professionals familiar with kundalini now have gained their understanding of the concept through Bentov's neurophysiological model and Sannella's elaboration in medical terminology of the implications and symptoms of the physio-kundalini syndrome (Greenwell, 1990).

KUNDALINI AND THE NEAR-DEATH EXPERIENCE

Some investigators in the field of consciousness and near-death studies have suggested that the significance of the near-death experience (NDE) may be its role as a catalyst for human evolution (Grey, 1985; Grosso, 1985; Ring, 1984). They view the reported mental, physical, and spiritual after-effects of NDEs as indications
of an accelerated development in near-death experiencers (NOErs) of intuitive functioning on a different order, and as similar to changes traditionally reported by people awakening to a higher-order state of consciousness. If those speculations are correct, then near-death experiencers might be expected to show signs of kundalini awakening.

Kenneth Ring (1984) was the first Western consciousness researcher to speculate in detail about the role of kundalini in near-death experiences. He presented anecdotal evidence of similarities between kundalini awakenings and the common after-effects of NOEs. More recently, seeking more objective evidence of kundalini among NOErs, he embedded nine kundalini items in a 60-item inventory of psychophysical changes administered to 74 NOErs and to a control group of 54 subjects who expressed interest in NOEs but never had one themselves. He found that the NOErs acknowledged an average of 36% of the kundalini items, while the control subjects acknowledged an average of 11% of those same items (Ring, 1992). Ring proposed two possible explanations of the association between kundalini and the NOE: 1) kundalini is the energy underlying the near-death experience, and thus every NOE is an indication of an aroused kundalini, or 2) the NOE is one of many possible triggers that can stimulate a kundalini awakening, but doesn't necessarily do so in every case.

Margot Grey (1985) also points out the similarities between classical kundalini awakenings and "core" NOEs, including their common precipitation by temporary cessation of heartbeat and respiratory activity. She concludes that similar physiological mechanisms operate in both NOEs and kundalini phenomena, and that both are manifestations of the same evolutionary force. Describing the theoretical mechanism for the link between kundalini and NOEs, Gene Kieffer (in press) has argued that in a near-death situation kundalini attempts a last-ditch, life-saving effort by empowering and directing the body's prana to flow directly into the dying brain; this overwhelming rush of potent energy produces the visions and other phenomena typical of NOEs.

I recently examined the occurrence of physiological aspects of kundalini in NDErs as described by Bentov (1977) and Sannella (1987). Using a 19-item questionnaire developed for that study to elicit physio-kundalini symptoms, I compared the responses of a sample of 153 NDErs with those of two control samples: 55 individuals who had come close to death but not had NDEs, and 113 individuals who had never come close to death. The NOErs in that study acknowledged a mean of 7.6 out of 19 physio-kundalini symptoms, significantly more than the mean of 4.6 symptoms
classical literature did not dwell on the problems acknowledged by each of the two control groups, supporting the impression that kundalini awakening is more common among NDErs than among nonNDErs (Greyson, in press).

This association between kundalini and nearly dying is by no means a recent discovery. While Eastern traditions have developed elaborate lifelong practices and life-styles with the intent of awakening kundalini, they have also claimed that when the brain is deprived of oxygen, kundalini may actually rush to the brain in an effort to sustain life. In fact, one bizarre and unusual yoga sect practiced suffocation by tongue-swallowing in the hope that kundalini would rush to their brains and produce enlightenment (Dippong, 1982), a practice that may have a Western counterpart in lapetite mort, in which a considerable number of adolescents die each year seeking orgasmic initiation by asphyxiation (Kieffer, in press; Rosner, 1987).

This theoretical arousal of kundalini by life-threatening crisis has traditionally been regarded by Eastern philosophers as dangerous (Krishna, 1975). According to those sources, kundalini should only be awakened by a gradual process under the guidance of someone who has first-hand experience with it; otherwise, a kundalini awakening in a body and soul not properly prepared can produce negative effects, including psychosis.

KUNDALINI AND MENTAL ILLNESS

Because the ancient traditions provided gurus to supervise kundalini awakenings, the classical literature did not dwell on the problems of these phenomena. It was assumed that enlightenment, developed in the proper context and with proper guidance, though it may be difficult, would lead to good outcomes. However, contemporary Western culture typically provides neither proper context nor proper guidance, so that the earliest indications of kundalini activity may lead to major disruptions in functioning that are often confused with psychotic disorders (Grey, 1985; Krishna, 1975; Sannella, 1987). Because near-death experiences often occur without preparation or warning, NDErs facing the chaos and change of kundalini awakening may seek professional counseling (Greenwell, 1990). Therapists unfamiliar with kundalini phenomena, however, may misinterpret clients’ symptoms as reflecting an underlying mental illness (Bentov, 1977).

Greenwell (1990) describes clients undergoing the kundalini process who seek therapy because they feel disengaged from their former sense of self, engage in irrational behavior, see visions, make involuntary movements usually associated with mental ill-
ness, and suffer physical pains and changes. She lists one of the effects of kundalini awakening as psychological and emotional upheaval, including intensification of unresolved psychological conflict, fear of death or insanity, overwhelming mood swings, heightened sensitivity to others’ moods, confusion, ritualistic or impulsive behavior, insomnia, uncharacteristic intense sexual drives, gender identity issues, seeing lights or hearing sounds, indecisiveness and "boundary issues," grandiosity, and trance-like states of consciousness.

Gopi Krishna claimed "countless" cases of spontaneous kundalini awakening lead to insanity or less severe mental illness: "Apart from psychosis, there are also many people in whom the awaking of kundalini leads to neurosis and other psychic disorders. They lead an imbalanced life without crossing the border into the territory of the incurably insane" (1974a, p, 149). Bentov (1977) estimates that 25 to 30 percent of institutionalized schizophrenics may be experiencing kundalini phenomena.

Unlike Krishna (1974a, 1975), Bentov (1977), and Sannella (1987), Sri Aurobindo (1971) believed that kundalini in itself would not induce psychosis in a previously healthy individual, but that a constitutionally weak nervous system already predisposed to emotional problems might decompensate under the stress of kundalini awakening. Psychotic decompensation following kundalini awakening may be less common in Asian cultures, where proper preparation and mental discipline are prerequisites for yogic training, than in the West, where ancient preparatory (and screening) practices are not available and where, for example, kundalini could be as likely to be awakened by an accidental near-death event in an unprepared individual (Greenwell, 1990).

Greenwell (1990) notes that the more drastic psychological effects of kundalini awakening, such as hallucinations, may lead therapists unfamiliar with the phenomenon to consider it a psychosis, neurological disorder, or manic-depressive illness. She suggests that kundalini has been linked to psychosis because some kundalini symptoms appear similar to a psychotic break and because therapists lack other diagnostic categories in which to categorize hallucinatory experiences. Like Aurobindo, however, she does not believe that kundalini or inappropriate treatment of it can cause psychosis, or that spiritual components of psychosis are necessarily evidence of kundalini awakening. Rather, she suggests that spontaneous kundalini awakening in individuals with borderline or narcissistic pathology may precipitate psychosis, or that weak ego boundaries or disturbed energetic phenomena in psychosis may activate physiological processes similar to those of kundalini, leading to confusion between the two.
Certainly some kundalini phenomena resemble, at least in description, symptoms of schizophrenia. For example, hearing internal voices, a kundalini manifestation, resembles auditory hallucinations, a schizophrenic symptom; becoming locked into unusual positions (postures), another kundalini manifestation, resembles catatonic rigidity, another schizophrenic symptom; the kundalini-related experience of sudden, intense mood swings for no reason resembles the schizophrenic symptom of inappropriate affect; and thoughts speeding up or slowing down in kundalini awakening resemble the formal thought disorder of schizophrenia. But while those symptoms may be common to both kundalini and schizophrenia, they alone are insufficient to delineate either condition. In actuality the overlap between these two conditions is quite limited if the entire constellation of their symptoms is considered.

Such typical physio-kundalini phenomena as pockets in the body of extreme temperature, changes in breathing, specific localized pains, expanding beyond the body, out-of-body experiences, deep ecstatic tickles, internallights or colors, and an ascending anatomic progression of symptoms are not characteristic of schizophrenia. On the other hand, such typical schizophrenic phenomena as delusions, deteriorating hygiene, social isolation, lack of energy, incoherent speech, illogical thoughts, bizarre behavior, and deteriorating social role functioning are not necessarily seen in kundalini awakenings.

Thus the relationship between kundalini and mental illness in general and psychosis in particular remains controversial. Some authors have asserted that kundalini awakening, or inappropriate treatment of it, is a frequent cause of psychosis; while others maintained that mental illness occurs only in individuals predisposed to it or already suffering from borderline or narcissistic pathology prior to a kundalini awakening. And finally, some have suggested that the ego weakening characteristic of psychosis might promote either true kundalini awakening or some lesser psychophysiological energy phenomena that mimic kundalini.

The purpose of this study was to explore indications of kundalini awakenings in an unselected sample of psychiatric patients. In the interest of conceptual simplicity, quantifiability, and replicability, the physio-kundalini syndrome was used as an indicator of kundalini awakening. I administered the Physio-Kundalini Syndrome Index to a sample of patients consecutively admitted to an inpatient psychiatric unit, and compared their responses to those of previously collected control groups. As a comparison group of individuals who had shown definite signs of kundalini arousal, the previously collected data sample of near-death experiencers was used; and for a comparison group of "normal" individuals who had not shown signs of kundalini phenomena, the two control groups from
the study of NDErs were combined, as those groups yielded identical basal rates of physio-kundalini symptoms, presumably that of the general population.

METHOD

Instrument and Subjects

A 19-item Physio-Kundalini Syndrome Index was added to the admission diagnostic interview for all patients admitted to the inpatient psychiatric unit of the University of Connecticut Health Center for a 6-month period. This questionnaire, developed for an earlier study of physio-kundalini symptoms in NDErs and described elsewhere (Greyson, in press), includes items exploring motor, somatosensory, audiovisual, and mental phenomena, and permits answers of "yes," "no," or "not sure" in response to questions as to whether the subject ever experiences each of 19 symptoms. In tabulating the results, "no" and "not sure" answers are both regarded as negative responses. Documentation of the validity and reliability of this physio-kundalini questionnaire is not yet available.

During the 6-month period of this study, 138 patients were able to provide coherent and usable responses to the questions on the Physio-Kundalini Syndrome Index. Of these 138 subjects, 39 (28%) were male and 99 (72%) female. Their mean age was 34.0 years ($SD=11.2$, range=17-68 years).

Data Analysis

Subjects' responses were compared to the responses of (a) a sample of 153 NDErs studied previously (mean age 50.3 years, $SD=13.2$, range=22-82 years), a group that reported a high rate of physio-kundalini symptoms, and (b) control subjects in that previous study, who showed a lower rate of physio-kundalini symptoms, assumed to be the baseline rate in the general population. As noted above, the two control groups in the study of NDErs-55 subjects who had come close to death without having had NOEs and 113 subjects who had never been close to death-produced identical response rates. Therefore, for the present comparison, those two groups were combined and collectively treated as a normal control sample of 168 individuals (mean age 48.8 years, $SD=13.9$, range =20-86 years).

The primary hypothesis to be tested was that the study sample of psychiatric patients would acknowledge fewer physio-kundalini symptoms than did the previously studied sample of NDErs, a
population known to have experienced kundatini awakenings; and that these psychiatric patients would instead acknowledge a number of physio-kundalini symptoms comparable to that reported by the control sample. The difference between the number of symptoms acknowledged by these psychiatric patients and the NDErs was evaluated by t-test, as was the difference between the number of symptoms acknowledged by the psychiatric patients and the normal control sample.

Assuming a significant difference between these groups on the entire 19-item Physio-Kundalini Syndrome Index, a secondary focus of this study was whether particular symptoms of physio-kundalini would better differentiate psychiatric patients from NDErs or normal controls. Chi-square tests were used to evaluate the differences between the proportion of psychiatric patients acknowledging each individual symptom and the proportion of NDErs and control subjects acknowledging that symptom. Since these nineteen symptoms might not be statistically independent, the Bonferroni procedure was used to correct for interdependence of these tests. Accordingly, $p<.0026$ was chosen as the criterion for significance for each of these individual chi-square tests, which would yield a significance level of $p<.05$ for the nineteen tests considered together.

RESULTS

*Physio-Kundalini Syndrome Index*

The 138 psychiatric patients acknowledged a mean of 4.9 ($SD=3.6$) of the 19 physio-kundalini symptoms. That number was significantly fewer than the mean of 7.6 symptoms ($SD=4.7$) acknowledged by the 153 NDErs ($t=5.47$, $df=289$, $p<.0001$); and it was statistically indistinguishable from the mean of 4.6 symptoms ($SD=3.5$) acknowledged by the 168 control subjects ($t=0.53$, $df=304$, n.s.),

These psychiatric patients, therefore, did not report a high incidence of physio-kundalini symptoms, as did the NDErs, but reported the same average number of these symptoms as did the control sample. Given this difference between the psychiatric patients and the NDErs, an analysis of individual physio-kundalini symptoms follows.

*Motor Physio-Kundalini Symptoms*

The Physio-Kundalini Syndrome Index included four items that could be considered motor symptoms. One's body assuming and
maintaining strange positions for no apparent reason was reported by 14 patients, or 10 percent of the sample. That was neither significantly less than the 17 percent of NOErs who reported this symptom ($X^2=2.32$), nor significantly more than the 2 percent of control subjects reporting it ($X^2=8.56$).

One's body becoming frozen or locked into strange positions and immovable was reported by 21 patients, or 15 percent. That also was neither significantly less than the 20 percent of NOErs who reported this symptom ($X^2=0.69$), nor significantly more than the 6 percent of control subjects reporting it ($X^2=6.16$).

One's breathing spontaneously stopping or becoming rapid, shallow, or deep for no apparent reason was reported by 40 patients, or 29 percent. Again, that percentage was neither significantly less than the 39 percent of NOErs who reported this symptom ($X^2=2.55$), nor significantly more than the 20 percent of control subjects reported it ($X^2=2.70$).

Finally, spontaneous involuntary bodily movements were reported by 50 patients, or 36 percent. Once again, that percentage was not significantly less than the 43 percent of NOErs who reported this symptom ($X^2=1.17$), and was almost identical to the 38 percent of control subjects reporting it ($X^2=0.01$).

Thus the psychiatric patients reported all four motor physio-kundalini symptoms at frequencies between those of the NOErs and control samples (or almost identical to the control sample, in the case of involuntary movements), However, differences in the rates of these motor symptoms did not differentiate the patients from either the NOErs or the control subjects. That is, motor physio-kundalini phenomena are not significantly more common in NDErs than in these psychiatric patients, but neither are they more common in the patients than in control subjects.

**Somatosensory Physio-Kundalini Symptoms**

The Physio-Kundalini Syndrome Index included six items that could be considered somatosensory symptoms. A spontaneous deep ecstatic tickle or orgasmic feeling was reported by 17 patients, or 12 percent of the sample. That was significantly less than the 37 percent of NOErs who reported this symptom ($X^2=24.49$, $p<.0001$) and statistically indistinguishable from the 15 percent of control subjects reporting it ($X^2=0.39$).

Physical sensations starting in the feet, legs, or pelvis, and moving up the back and neck to the top of the head, down the forehead, over the face, then to the throat, and ending in the abdomen were
frequency of somatosensory physio-kundalini symptoms

reported by 21 patients, or 15 percent. That also was significantly less than the 37 percent of NOErs reporting this symptom ($\chi^2 = 16.86, p < .0001$), and statistically indistinguishable from the 19 percent of control subjects reporting it ($\chi^2 = 0.53$).

Extreme sensations of heat or cold moving through the body for no reason were reported by 57 patients, or 41 percent. That was not significantly less than the 54 percent of NOErs reporting this symptom ($\chi^2 = 4.42$), but it was significantly more than the 21 percent of control subjects reporting it ($\chi^2 = 12.32, p < .0004$).

Moving pockets of bodily heat or cold being extreme enough to burn or otherwise affect someone else or an inanimate object were reported by 3 patients, or 2 percent. That percentage was statistically indistinguishable from both the 10 percent of NOErs reporting this symptom ($\chi^2 = 6.02$) and the 2 percent of control subjects reporting it ($\chi^2 = 0.03$).

Pains in specific parts of the body that begin and end abruptly for no apparent reason were reported by 58 patients, or 42 percent. That also was statistically indistinguishable from both the 59 percent of NOErs reporting this symptom ($\chi^2 = 8.16$) and the 51 percent of control subjects reporting it ($\chi^2 = 1.90$).

Finally, tingling, vibration, itching, or tickling on the skin or inside the body for no apparent reason was reported by 57 patients, or 41 percent. Again, that was statistically indistinguishable from both the 58 percent of NOErs who reported this symptom ($\chi^2 = 3.66$) and the 51 percent of control subjects who reported it ($\chi^2 = 2.67$).

Thus some somatosensory physio-kundalini symptoms, such as spontaneous orgasmic sensations and ascending anatomic progression of sensations, are reported significantly more often by NOErs than by psychiatric patients, who report those symptoms as seldom as do control subjects. On the other hand, psychiatric patients reported unexplained isolated temperature changes as often as did the NDErs, and significantly more often than did the control sample. Other somatosensory symptoms showed no differences between the three groups, perhaps because they are either too rare in any group, as with temperature changes so extreme as to burn other people, or too common in all groups, as with spontaneous unexplained pains and tingling or vibratory sensations.

Audiovisual Physio-Kundalini Symptoms

The Physio-Kundalini Syndrome Index included four items that could be regarded as audiovisual symptoms. Internal noises, such
as whistling, hissing, chirping, roaring, or flutelike sounds were reported by 28 patients, or 20 percent of the sample. That was significantly less than the 41 percent of NDErs who reported this symptom ($\chi^2=14.87$, $p<.0001$) and statistically indistinguishable from the 24 percent of control subjects reporting it ($\chi^2=0.57$).

Internal voices were reported by 26 patients, or 19 percent. That also was significantly less than the 46 percent of the NDErs who reported this symptom ($\chi^2=22.57$, $p<.0001$) and statistically indistinguishable from the 29 percent of control subjects reporting it ($\chi^2=3.83$).

Internal lights or colors illuminating parts of the body were reported by 6 patients, or 4 percent. Again, that percentage was significantly less than the 19 percent of NOErs who reported this symptom ($\chi^2=13.28$, $p<.0003$), and statistically indistinguishable from the 7 percent of control subjects reporting it ($\chi^2=0.07$).

Thus with the exception of internal lights bright enough to illuminate a dark room, which was very rare among all groups, the audiovisual physio-kundalini symptoms were significantly more common among NOErs than among psychiatric patients, who reported them as seldom as did control subjects.

Mental Physio-Kundalini Symptoms

The Physio-Kundalini Syndrome Index included five items that could be regarded as mental symptoms. Observing oneself, including one’s thoughts, as if one were a bystander while activities go on as usual, was reported by 30 patients, or 22 percent of the sample. That was significantly less than the 55 percent of NDErs who reported this symptom ($\chi^2=30.60$, $p<.0001$), and statistically comparable to the 33 percent of control subjects reporting it ($\chi^2=3.88$).

Sudden, intense ecstasy, bliss, peace, love, devotion, joy, or cosmic unity for no apparent reason was reported by 47 patients, or 34 percent. That also was significantly less than the 76 percent of NOErs who reported this symptom ($\chi^2=49.67$, $p<.0001$) and statistically comparable to the 51 percent of control subjects reporting it ($\chi^2=7.79$).

On the other hand, sudden intense fear, anxiety, depression, hatred, or confusion for no apparent reason was reported by 88 patients, or 64 percent. That was statistically comparable to the 52 percent of NDErs who reported this symptom ($\chi^2=4.40$) and significantly more than the 35 percent of control subjects reporting it ($\chi^2=26.07$, $p<.0001$).
Thoughts spontaneously speeding up, slowing down, or stopping altogether were reported by 77 patients, or 56 percent. That percentage was neither significantly less than the 61 percent of NDErs who reported this symptom ($X^2=0.73$), nor significantly more than the 40 percent of control subjects reporting it ($X^2=7.08$).

Finally, experiencing oneself as physically larger than the body, as expanding beyond the material body boundary, was reported by 30 subjects, or 22 percent. That also was not significantly less than the 31 percent of NDErs who reported this symptom ($X^2=2.96$), nor significantly more than the 19 percent of control subjects reporting it ($X^2=0.19$).

Thus watching oneself from a distance, or "witness consciousness," and sudden unexplained positive emotions were significantly more common among NDErs than among the psychiatric patients, who reported them as seldom as did control subjects. On the other hand, sudden unexplained negative emotions were as common among the psychiatric patients as among NDErs, and more common than among the control sample. Changes in thought processes and the "greater body" experience were quite common among all groups, and did not differentiate among them.

**DISCUSSION**

These data do not support anecdotal suggestions that kundalini phenomena are common in mental illness. In fact, an unselected sample of psychiatric inpatients reported an incidence of physical-kundalini symptoms no different than a normal control sample, and significantly fewer kundalini phenomena than did a comparison group of near-death experiencers.

These findings contradict the assertions of some authors that large numbers of institutionalized psychiatric patients suffer from misdiagnosed kundalini awakenings (Bentov, 1977; Krishna, 1974a). While it is possible that some individuals with awakened kundalini may be mislabeled by therapists unfamiliar with the phenomenon, this study suggests that psychiatric patients are no more likely to experience kundalini awakening than the general public.

These data also bolster the claim that kundalini is a nonpathological force that produces a unique pattern of physiological and psychological effects. The low incidence of kundalini symptoms in psychiatric patients contradicts the notion that kundalini may be a product of the imagination or of suggestion in individuals with ego deficits.
**Kundalini among Psychotic Patients**

This study's sample of psychiatric patients was drawn from consecutive admissions to a general inpatient psychiatric unit, and included individuals with a variety of problems and diagnoses, including depression, anxiety, eating disorders, personality disorders, and substance abuse, as well as schizophrenic, manic, and organic psychoses. It might be argued that kundalini phenomena mimic psychotic symptoms which are not necessarily common in a general inpatient psychiatric sample. That raises the question of whether a limited sample comprised only of psychotic patients would acknowledge as many physio-kundalini symptoms as do NOEs.

To test this hypothesis, a *post hoc* analysis was performed on the responses of psychotic patients to the Physio-Kundalini Syndrome Index. Of the 138 patients in this study, 15, or 11 percent of the sample, carried a diagnosis of some nondepressive psychotic disorder. These 15 patients, whose diagnoses included schizophrenia, bipolar disorder, organic hallucinosis, and psychotic disorder not otherwise specified (atypical psychoses), as a group reported a mean of 3.2 of the 19 physio-kundalini symptoms ($SD=3.1$). Thus patients with psychoses actually acknowledged even fewer physio-kundalini symptoms than did the larger sample of psychiatric patients. Though the sample of psychotic patients was small, they did not report *any* physio-kundalini symptom more often than did the larger sample of psychiatric patients.

This finding held true for those symptoms that specifically may be thought to mimic psychotic symptoms. Internal voices, for example, were reported by 20 percent of the psychotic patients, as compared with 19 percent of all the patients and 46 percent of the NOEs; becoming locked into a certain position was reported by 13 percent of psychotic patients, as compared with 15 percent of all the patients and 20 percent of the NOEs; spontaneous changes in thought processes were reported by 40 percent of the psychotic patients, as compared with 56 percent of all the patients and 61 percent of the NDEs; and unexplained negative emotions were reported by 47 percent of the psychotic patients, as compared with 64 percent of all the patients and 52 percent of the NOEs.

*Discriminative Value of Physio-Kundalini Items*

Thus, as pathological as some of them may sound, a number of physio-kundalini symptoms are reported significantly more often by near-death experiencers than by psychiatric, and particularly...
psychotic, patients. Seven of the 19 physio-kundalini items, including three of the four audiovisual symptoms, were significantly more common among NDErs than among psychiatric patients: spontaneous orgasmic sensations, ascending anatomic progression of sensations, internal noises, internal voices, internal lights or colors, watching oneself as if from a distance, and sudden positive emotions for no apparent reason. These seven items then may be useful indicators in differentiating kundalini awakening from mental illness.

Two items were as common among these psychiatric patients as among the comparison group of NDErs, and more common than among the control sample: unexplained heat or cold moving through the body, and sudden, negative emotions for no apparent reason. Thus, those symptoms, while they may be a part of the physio-kundalini syndrome, also appear to be associated preferentially with mental illness.

Eight items were reported by psychiatric patients with a frequency midway between those of NDErs and the control subjects, without differing significantly from either: assuming strange positions, becoming locked into position, changes in breathing, spontaneous involuntary movements, spontaneous unexplained pains, tingling or vibrating sensations, unexplained changes in thought processes, and experiencing oneself as larger than the physical body. Thus these symptoms appear to be too common among psychiatric patients and the general population to be useful indicators of kundalini awakening. Likewise, two items, bodily heat or cold so extreme as to burn or affect others and internal lights bright enough to illuminate a dark room, were so rare among all three groups as to be useless in differentiating kundalini awakening from other conditions.

CONCLUSION

In summary, symptoms of the physio-kundalini syndrome are reported far more often by individuals known to have experienced kundalini awakening than by psychiatric, and particularly psychotic, patients. Furthermore, certain specific physio-kundalini symptoms can be identified as being particularly helpful in differentiating kundalini awakening from mental illness.

Psychologist David Lukoff (1985) has recommended that psychotic symptoms in the context of kundalini experiences be diagnosed not as schizophrenia but as "mystical experience with psychotic features," with the implication that this condition may have a positive outcome if treated with alternative therapeutic strategies. More recently, Lukoff and psychiatrists Francis Lu and Robert
Turner formally proposed and had accepted for the next revision of the Diagnostic and Statistical Manual of Mental Disorders a new diagnostic category of "psychoreligious or psychospiritual problem," in the class of problems that may appropriately be a focus of professional attention or treatment even though they are not attributable to a mental disorder (Lukoff, Lu & Turner, 1992). This study, in differentiating kundalini from mental illness, has generated data supporting that proposal. It may also help stimulate caregivers to develop new and different techniques for assisting individuals seeking help with kundalini phenomena.

REFERENCES


Requests for reprints to: Bruce Greyson, Department of Psychiatry, University of Connecticut Health Center, Farmington, CT 06030-2103,