Toward An Explanation of Near-Death Phenomena

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Introduction

The human conception of death has undergone radical changes with the gradual waning and repression of archaic modes of thought. Early man lived in a world under the sway of the magical omnipotence of thought; moreover, the modern, post-renaissance man's narrow and mechanized sense of self was unknown to the first people in the first people in the childhood of the human race. Orthodox science's view of death is not the view of primitives or of people of the great religious traditions. To the typical scientist, consciousness is the by-product of brain events and perishes with the body. Nevertheless, let us bracket this dogma for a moment and ask: Is death really the extinction of human personality or does it permit some continuity of consciousness? One purpose of what follows is to insist that this deserves to remain an open question, for the evidence suggesting survival is neither so compelling nor the dogmas which deny it so commanding that one can judge on the issue with much confidence.

A complex set of phenomena associated with near-death states seems at first glance to clash with the scientifically orthodox view of death as extinction. Scientists investigating these phenomena refer to them collectively as <u>near-death experiences</u> (NDEs). I want, first to call the reader's attention to certain features of these

experiences which demand explanation; we will then look at some of the explanations that have already been proposed and try to evaluate them impartially. At the very least, classic NDEs suggest some rather bizarre capabilities of the human mind; on that score alone they deserve to be studied by students of human behavior. On the other hand, they may turn out to be the foothills of a new frontier of knowledge.

What Needs to be Explained?

Two Types of Near-Death Experience

There are two types of NDE. The first consists of deathbed visions. Here the subject typically is ill, usually bedridden, and suddenly at the hour of death experiences a vision. He often "sees" the apparition of a deceased relative or friend. The experience may be accompanied by a remarkable elevation of mood. The dying person is frequently in a state of clear, wakeful consciousness, and the apparition seems to inhabit, or temporarily manifest in, the public space continuous with the patient. Early collections of these cases were compiled and studied by Bozzano (1906, 1923), Hyslop (1908), and Barrett (1926). More recently, Osis (1961) took up the question of deathbed visions, and Osis and Haraldsson (1977a, 1977b) pursued the problem using a cross-cultural approach.

In the second type of NDE a person, not necessarily ill, is suddenly brought into a state on the verge of physical death. This might arise from cardiac arrest, near drowning, mountain-climbing falls, suicide attempts, auto accidents, or other life-threatening incidents. Moody (1975) has constructed a model of this type of near-death experience. The main common elements in the experience

are ineffability, feelings of peace and quiet, entering a dark tunnel, being out of the body, meeting with others, encountering a being of light, reaching a border or limit, and undergoing changes in outlook and attitude. The subsequent work of Ring (1980) largely supports the informal studies of Moody (1975, 1977). Ring describes five stages of a "prototypical" core experience: euphoric affect, an out-of-body state, entering darkness, seeing an unearthly world of light, and entering into that world of light. These stages seem like parts of an ordered and developing sequence in which subjects reach the final stages with decreasing frequency. At any one of these stages there might occur what Ring calls a "decisional process." The person "decides" to return to life. However, many cases involve anger or regret over being brought back to life; the process appears to be quite automatic. As Ring points out, we seem to be observing a prototypical or suprapersonal mechanism which manifests in a fragmentary way through a spectrum of personalities.

In addition to the five stages and the decisional process, Ring's cases include other features of classic near-death experiences such as meeting with others, panoramic memory, and so forth. On the whole, features of the two types of NDE, deathbed visions and close-call or resuscitation cases, are not inconsistent.

In a large number of the resuscitation cases the patient temporarily ceases to display any vital signs. But can we say that such patients were "really" dead? The problem is that during the period of the patient's "death," the organism was still capable of being restored to vital functioning. But we cannot say this of the

body of someone who has died "permanently"; so in this sense the resuscitated patient was clearly not dead. On the other hand, the patient, having temporarily lost all vital functioning, would in the great majority of cases have soon joined the ranks of the permanently and irrevocably dead had it not been for the intervention of on-the-scene medical workers. In this sense, one is tempted to say that the resuscitated patient really was dead.

The fact that resuscitated patients would, without medical intervention, have died seems rather difficult to reconcile with their having any experience whatsoever. Suppose one dies in the sense that, apart from resuscitation procedures, one would remain irreversibly dead. Once that process has begun, what biological function can we ascribe to having any experiences--no less the extraordinary near-death experiences? As long as the organism is functioning vitally, however imminent death may be, it seems less surprising that the brain might throw off some adaptive phenomena--phantasms, memories, deliria. But once the first step of the irreversible is taken and the brain is rapidly depleting its last store of oxygen and glucose, it seems like an overstated and perfunctory gesture to go on producing such elaborate and useless epiphenomena.

Three Classes of Puzzling Effects

In particular, there are three components of NDEs which have to be explained: (a) the consistency and universality which they generally display, (b) their paranormal (psi) aspects, and (c) their power to modify attitudes and behavior.

The Consistency and Universality of NDEs

For the phenomenologist or student of the natural history of the mind, the NDE appears as a distinctive finding; a coherent, spontaneous psychic mechanism. The firsthand accounts arise from the most diverse sources--religious believers and atheists, the educated and the ignorant; from old and young, saint and sinner, man and woman. In case after case the same message, though coded differently and in accents and styles that vary, seems to emanate from a universal stratum of consciousness. What appears is a cross-cultural pattern of phenomena that is filtered down and personalized by the experient's inherited cultural constructs. For example, as Osis and Haraldsson (1977a, 1977b) and Ring (1980) have found, religious beliefs influence the interpretation, not the content of the experience. Lundahl (in press) has studied near-death experiences of Mormons, some of which date back a hundred years, and found the core phenomena I have described above. Crookall (1965) has collected large numbers of cases, rich in descriptive detail, which again reinforce the reality of the core phenomena. For further historical studies supporting the consistency and universality of the core phenomena, see Audette (in press) and Rogo (1979).

Moreover, there seem to be aspects of the NDE which manifest in contexts which are not directly related to pathology or life-threatening situations: for instance, in dreams (Russell, 1965), mystical experiences (Noyes, 1971), esoteric death-training techniques (Evans-Wentz, 1957), psychedelic therapy with terminal patients (Grof and Halifax, 1977), and mystery cults of antiquity (Grosso, 1979

Needless to say, more work needs to be done to substantiate the claim of universality; nevertheless, the widespread pattern of the phenomena under examination calls for an explanation.

The Paranormal Aspects of NDEs

The second component that needs explanation is the paranormal material sometimes reported in NDEs. Most of this material is anecdotal, but the cumulative effect strongly suggests that there is some substance to the psi-dimension of these experiences. Further support comes from the evidence that altered states of consciousness are psi-conducive (see, e.g., Honorton, 1977). This point is important because near-death situations generate altered states of consciousness.

The psi-components lend weight to the meaningful and consistent features of NDEs in two ways. First, they indicate that NDEs express more than just wish-fulfillment or self-serving fantasy. To the extent that such experiences contain elements of genuine psi, they are oriented toward objective reality. Secondly, psi in general suggests the existence of an alternate, nonsensory reality--a reality which could be construed in terms relevant to post-mortem states. This second point is of course controversial. But the facts about psi persist in being inexplicable in terms of physical theory (Beloff 1980); they seem to imply the existence of an autonomous psychological order of reality. This should be kept in mind in trying to understand the wider implications of near-death phenomena.

Of course, there is nothing to prevent us from assuming that any psi components found in NDEs result from delusive expectations and

irrational desires.' This psi-dependent Freudian interpretation will have to be considered later. For now let us briefly examine some of the types of ostensible ND-related psi effects, for it is these effects which sharpen the challenge of near-death phenomena.

Psi effects related to deathbed visions. In so-called "Peak in Darien" cases, the dying person sees the apparition of a person not known by the former to be deceased. If this is what it appears to be, we could describe it as a kind of transworld ESP. There are a few reports (Barrett, 1926, Bozzano, 1906) of cases in which nobody present ~~with the patient~~ was aware that the person whose apparition was seen was in fact dead, thus ruling out telepathy from people at the dying person's bedside. Cases of this type are rare, but this is not surprising in view of the peculiar combination of factors necessary to produce them. Unfortunately, most of the Peak in Darien cases derive from the older literature, though Lundahl (in press) and Ring (1980, p. 208) offer some current illustrations. The impersonal nature of dying in modern hospitals may account for the dearth of recent examples.

Psi effects related to resuscitation cases. In resuscitation cases, or other types of near-death encounters, the dominant psi component comes in the form of ostensibly veridical out-of-body experiences (OBEs). Not all OBEs, of course, contain psi components. Yet there seems to be an almost typical report of a classic OB situation in which a person near death finds himself located outside his body and able to observe in detail events occurring in neighboring

regions of space. Cases such as this, assuming they can be corroborated, strongly suggest paranormal OB perception, though in any single instance ad hoc normal explanations could be invoked. In order to substantiate such claims of ND-related paranormal OB perception, it will be necessary in the future to obtain the cooperation of medical professionals. Obviously this will not be an easy task, given the stringent duties of physicians and nurses on the job. Yet much could be learned if psi investigation could be routinely incorporated into certain medical settings where one might suppose a gold mine of useful data awaits exploration.

As far as I know, Michael Sabom, a cardiologist working at the Emory University School of Medicine, Atlanta, is the first physician actively concerned with investigating the paranormal elements of NDEs. As an example[1] of an OBE with a possible psi component, Sabom has described a case in which a patient anesthetized for open-heart surgery, after a period of black-out--called "entering the darkneess" by Ring and "the tunnel" by Moody and Crookall--suddenly became aware of his body being operated upon. The patient's face was covered by a sheet, yet he claims to have observed the operation from a point out of and above his body, as if he were another person, an unconcerned observer. The patient described how the

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1 This example is taken from a tape recording of a lecture given by Dr. Sabom at the Psychical Research Foundation (Sabom, 1980; see also Sabom and Kreutziger, 1978).

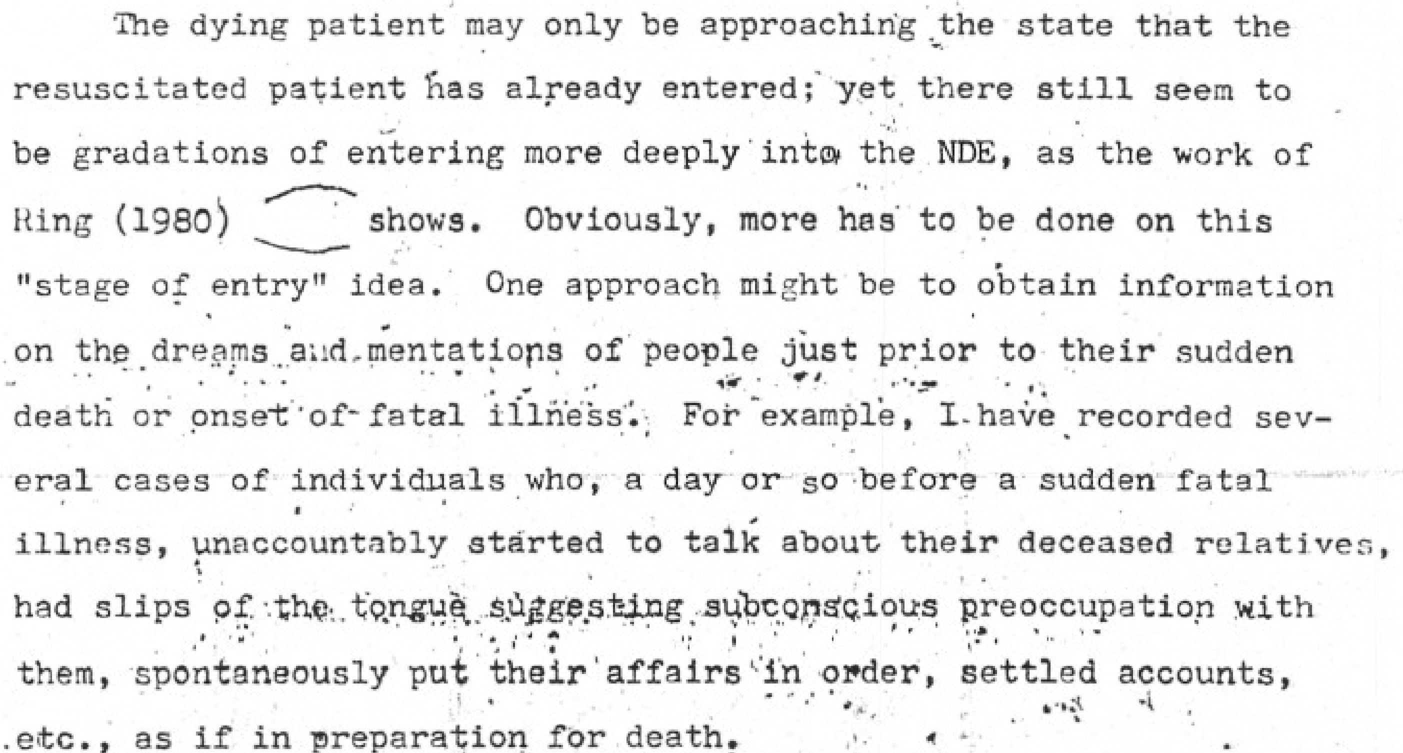
"shining metal" of the knife cut through his chest, the syringes inserted on each side of his heart, and the injection into it. He watched a physician cut off bits of his heart, poke around some veins and arteries, and then discuss with other physicians where the next bypass was to be made. He observed a doctor wearing blood-stained white shoes, another with a bloodclot in the fingernail of his right hand.

Two observations particularly struck Sabom from his perspective as a cardiologist. The patient expressed surprise at the large size and actual location of his heart; he compared its shape to the continent of Africa. According to Sabom, this is an apt comparison. The patient also said that part of his heart had a lighter color than the normal myocardial tissue; according to Sabom, discoloration would have marked the site of the patient's previous heart attack.

Such apparently veridical OBEs need to be explained; they lend some weight to the unverifiable visionary claims of near-death or dying percipients. For, if one aspect of the NDE is verifiable while at the same time providing testimony for an extraphysical factor, then it seems less implausible to ascribe ultimately verifiable reality to the rest of the experience.

There are also reports of OBEs in deathbed vision cases. But here the apparent separation process may be more gradual. Osis and Haraldsson (1977b, p. 129) write: "While still functioning normally, the patient's consciousness might be gradually disengaging itself

from the ailing body." And in Barrett's (1926) early study, witnesses are cited who have "seen" dying persons' "doubles" splitting off and disappearing at the moment of death. These observations might explain why terminal patients often experience a lessening of pain and discomfort shortly before they die.



The dying patient may only be approaching the state that the resuscitated patient has already entered; yet there still seem to be gradations of entering more deeply into the NDE, as the work of Ring (1980) shows. Obviously, more has to be done on this "stage of entry" idea. One approach might be to obtain information on the dreams and mentations of people just prior to their sudden death or onset of fatal illness. For example, I have recorded several cases of individuals who, a day or so before a sudden fatal illness, unaccountably started to talk about their deceased relatives, had slips of the tongue suggesting subconscious preoccupation with them, spontaneously put their affairs in order, settled accounts, etc., as if in preparation for death.

Psychokinetic phenomena have also been reported in the context of death and dying. Bozzano (1948) made a study of PK events in conjunction with the time of death. Osis and Haraldsson (1977b, p. 42) referred to a few tantalizing incidents--for example, the stopping of clocks belonging to two of Thomas Alva Edison's associates and also of his own clock within moments of his death. And L. E. Rhine (1970, pp. 330-334) cites several interesting cases of PK effects associated with the dying and the dead, taken from her collection of spontaneous cases on file at the Institute for Parapsychology.

Finally, as further evidence bearing on the psi-conducive nature of death and dying, there is the S.P.R. Census of Hallucinations (Sidgwick and Committee, 1894, p. 393), which showed that veridical apparitions "which coincide in time with the death of the person seen"--i.e., the "agent"--are more numerous than apparitions in any other category.

Changes in Outlook and Behavior

We observe in both types of NDEs a modification of outlook, affective states, values, and goals. This constitutes the third component of these experiences that calls for explanation. In the deathbed cases such effects are obviously of short duration because the patient dies shortly after the experience. Nevertheless, Osis and Haraldsson (1977a, 1977b) found cases of near-death rise of mood that could not be explained by medical factors. Sabom (1980) did follow-up studies six months after his patients' experiences and found that the modification effects persisted. Generally, it would appear that the near-death syndrome produces beneficial effects--in some respects resembling religious conversion. Chief among these effects is the reduction or elimination of the fear of death and alterations in outlook concerning the meaning of life and the nature of reality. The true benefits of these transformative experiences may, however, be blocked because of the confusion they elicit; patients are often unable to share their experiences and even fear for their sanity. Hopefully, with a better understanding of these phenomena the medical establishment will learn to enhance their utility. In sum, such near-death enhancement effects need to be explained because their

adaptive potential seems incongruous with thinking of them as illusory or pathological.

Remarks on Explaining Near-Death Experiences

For an explanation of the NDE to work, it must address itself to all three components of the phenomenon: its universality and consistency; its paranormal dimension; and its transformative effects, which are usually of a positive nature. It is the unique combination of these components which makes it a challenging matter to explain the NDE. Obviously, the mere fact that a phenomenon is universal and consistent in itself need not impress us; drunkards of all cultures and personality types, for example, consistently have the same sort of experiences--say, delirium tremens. Consistency and universality here is no bar against seeing the drunkard's experience as delusory. But it is a different matter with near-death experiences, for we do not expect delusory experiences to produce momentous changes in personality or to involve extensions of normal human capabilities.

Methods of Gathering Data

Scientific research in NDEs is still in its infancy. Most of the work so far has consisted of collecting reports unsystematically from pre-selected sources. Little or no medical and psychological data were included in the early collections of cases. The first systematic approach was that of Osis (1961), who used modern sampling techniques and computer analyses to sort out the patterns in his data. The recent work of Sabom (1980; Sabom and Kreutziger, 1978) and Ring (1980) has rightly stressed the importance of prospective research.

Respondents were selected on the basis of undergoing a near-death event, not necessarily a near-death experience. Both researchers found that over 40 percent of the patients who had undergone near-death events had the experience we are trying to explain. This seems to show that the NDE is a common clinical occurrence. However, this may be a hasty conclusion. Patients who have had an unusual experience when on the verge of death might be more likely to respond to a questionnaire than patients not having had such an experience, thus biasing the sample. A truly prospective investigation of NDEs would have to take place within a given hospital where all resuscitated patients were asked, as a part of the routine examination, whether or not they recalled any unusual experiences.

Special Problems in Trying to Assess NDEs

Near-death phenomena are not easy to assess impartially. One reason is the emotional reactions they arouse. One the one hand, people disposed to believe in life after death may be inclined toward credulity. On the other hand, those disposed to equate belief in survival with outmoded superstition might be prone to avoid dealing with the more challenging features of NDEs. Another reason is intellectual. The prevailing scientific orthodoxy tends in one way or another to identify human beings with their physical organisms; this, in effect, logically rules out any meaningful concept of survival of death. In short, the survival hypothesis, which is one possible explanation of NDEs, appears to be peculiarly resistant to rational and scientific investigation.