REASONS FOR CONTINUING DOUBT ABOUT THE EXISTENCE OF PSYCHIC PHENOMENA

D. J. WEST

From the earliest days of psychical research serious students of the subject have complained, and often with good reason, of the prejudice and ignorance of many critics and unbelievers. Even now, works of criticism in parapsychology, such as C. E. M. Hansel's book ESP: A Scientific Evaluation, can be faulted both on grounds of inaccuracy as to detail and on grounds of unfair and selective argument. Nevertheless, in spite of the protests of some parapsychologists on the one hand, and the bias of some critics on the other, there are some sound reasons for doubting whether research has so far achieved anything at all convincing.

The state of affairs is certainly not due to parapsychologists' failure to pay attention to canons of evidence or neglecting to take precautions against experimental error or fraud. Having had my first taste of research in the field of parapsychology, and then gone on to work in other branches of behavioral research, I am continually struck by the contrast in standards. Research workers in conventional fields of social and psychological inquiry are content with much lower standards. They are prepared to base conclusions upon observations known to be subject to a certain amount of bias and inaccuracy, and they are prepared to accept statistical evidence that falls far short of certainty. If they tried to emulate the perfectionism advocated by some parapsychologists the quality of their investigations might be improved, but the speed of their discoveries would be greatly retarded.

Parapsychologists tend to adhere to a policy of almost obsessional precautions in their experimental work and to a policy of extreme reserve in all matters dependent upon human testimony, but these policies have failed to provide immunity from criticism. In one sense they amount to a confession of failure, for they have been forced upon parapsychologists by the recalcitrant nature of psychic phenomena.

It is often said that parapsychologists need to be ultra-cautious, and critics need to be ultra-skeptical, because of the a priori improbability

of the phenomena in question, which seem to challenge fundamental scientific principles. This may have been the case in the past, but we have seen so many revolutions in scientific thought consequent upon the rapid advance of the physical sciences that presently accepted principles no longer seem inviolable. A much more important reason for skepticism is that, as soon as anyone tries to investigate with persistence and determination, the alleged phenomena become strangely fleeting and uncertain.

Scientists in ordinary fields of endeavor can afford to be more relaxed. The occasional false lead, deriving from careless or disingenuous research, is relatively harmless. As more valid observations accumulate, all pointing in another direction, the false lead is soon left behind and forgotten, being overtaken by the inexorable advance of knowledge. In parapsychology, unfortunately, there is hardly any recognizable advance and the phenomena remain as mysterious, and as uncontrollable, as they were before the effort to investigate them began. Because the observations of parapsychologists do not, as yet, form a coherent pattern, the findings of any particular investigation cannot be evaluated against a background of already assured knowledge. Each observation stands on its own as a separate miracle, which the critic must accept or reject according to the strength of the evidence presented on a particular occasion. In fact, parapsychology consists of a series of historic demonstrations of miracles rather than a body of scientific knowledge.

This situation, which some of you may think I exaggerate, arises from some highly inconvenient characteristics of the phenomena in question. First, the phenomena are sporadic and uncontrollable. Except in an immediate and limited sense, experiments are not repeatable at will. Second, the phenomena often seem to retreat before too close an inquiry. Results that seem indisputable at first dwindle away to nothing when other investigators try to follow them up. Third, the nature of the phenomenon tends to change from one research to the next. For example, no one is quite sure of the limits of ESP as regards time and distance because different investigators have reported contradictory findings.

The following example illustrates some of these points. The earliest reports of guessing experiments designed to demonstrate telepathy utilized as targets qualitative materials, such as pictures or household objects. Certain selected subjects, such as the famous Liverpool shop girls investigated by Sir Oliver Lodge and others, proved remarkably successful at describing or sketching such concealed targets. In the course of time, although for some reason it took rather a long time, researchers began to question whether this faculty of successful divination of con-

cealed targets was limited to a few specially gifted individuals, or whether it might not be demonstrable, at least to some slight degree, by many ordinary persons. The question was opened up to investigation largely through the work of J. B. Rhine and the development of the card-calling technique. With the use of a mathematically-random sequence of target symbols, and by having very long series of calls, it became possible to demonstrate powers of correct divination even when they were very weak and intermittent.

Contrast what one might have expected from the earlier telepathy experiments with what actually transpired when these techniques came into use. In the first place, hardly anyone was ever as successful at divining card sequences accurately as were the early subjects at divining hidden objects. A few instances were reported in the early days of subjects getting a substantial series of calls exactly or almost exactly correct, but nothing of this kind has been claimed over the last quarter century. This was the first sign of retreat of the phenomenon.

In the history of card-calling the so-called star subjects (or significant scorers) in fact identified something like an additional ten percent of the targets over and above what might be obtained by chance. This was amply conclusive from a statistical point of view, but hardly comparable with the dramatic successes of earlier reports. At first, Rhine thought that one in five of unselected subjects might be capable of producing substantial and persistent extra-chance scores of this magnitude. As time went on, however, it became very clear that persistent scorers are a great rarity. With Stewart and Shackleton finishing some twenty years ago, we are now left with Stepanek, who holds the uncomfortable and suspicion-provoking position of being the only persistently significant card scorer of modern times. This almost complete disappearance of the star guessing subjects is not to be explained by lack of enthusiasm for searching. Mass home testing projects and the use of mass radio audiences have failed to yield a single star subject. Here we have another striking instance of the retreating phenomenon.

Some commentators take the view that card calling is a boring pursuit which fails to produce results because the subject's interests and emotions are insufficiently aroused. It seems to me, however, that it is continual failure, rather than the technique itself, which makes for boredom. Real extra-chance scores are exciting and stimulating to experimenter and subject alike. It is the implications of success that are exciting rather than the content of the divination, as can be seen clearly in the excitement aroused by gambling and games of chance.

Following these further retreats of the phenomenon of experimental ESP, the investigators were left wondering whether still more minute doses of ESP might be demonstrated by still more refined methods of

analysis. One rather obvious method of amplifying any ESP effect that might be present is the use of the majority vote technique. If a large number of subjects all guess at the same target (or alternatively if the same subject guesses repeatedly at the same sequence of targets) it might be hoped that the chance guesses would cancel each other out while the ESP inspired guesses would accumulate sufficiently to produce a correct majority guess. Some years ago Fisk and West (1957) tried this out in a series of distance tests. We elicited impressive-seeming majority guesses, but unfortunately they proved incorrect!

ESP investigators have had to fall back on yet another idea to explain away such failures. Suppose that different individuals tend to produce opposite effects, some naming the targets correctly and producing above chance scores, others consistently misnaming the targets and producing below chance scores. The upshot might be a total score close to chance expectation, although each individual's scores, at least over short periods, might display a significant scatter effect, some above and some below the mean. Under these circumstances taking a majority vote would not improve the results unless there were some means of eliminating from the count individuals with a negative scoring tendency. This might be done by discounting those individuals who possess characteristics thought to be associated with negative scoring, such as persons with a disbelieving attitude. Alternatively, one might use an individual's actual scores to decide whether his tendency is positive or negative. This might be done by using every alternate call (or perhaps every alternate run of calls) to decide the direction of each subject's calls. When the positive scorers have been identified in this way their remaining calls can be used for determining majority guesses. Procedures of this kind have been reported recently by Brier and Tyminski (1970), but they have not been strikingly successful so far.

This is but one example of the ESP phenomenon retreating before investigators like a will o' the wisp. In point of fact, all kinds of ideas have been tried out to try to bring out a reliable and repeatable ESP effect. Targets with emotional overtones, subliminal targets, conditioned responses, unconscious responses picked up on lie detectors, the use of altered states of consciousness in hypnosis, dreams and drugged conditions, the use of animals as subjects, all these have been tried. Attempts have been made to increase efficiency by identifying particular calls as the ones most likely to show an ESP effect. This has been done by noting that successful guesses most often cluster in certain positions in the run, or are associated with particular guessing sequences, or are accompanied by subjective feelings of confidence. Many of these ideas appeared at first to yield promising results, but every one has tended to fade into oblivion as success dwindled with repetition.

In my view, the strongest reason for continued doubt is not, as many critics imply, that experimenters may be thought to be fraudulent or incompetent. It is the tendency of the results to dwindle away with continued investigation that makes the phenomenon so uncertain. The fact that these difficulties are stated frankly in the published reports for all to see and comment upon argues in favor rather than against the integrity and conscientiousness of parapsychological experimenters.

In the face of so many disappointments it could be argued that ESP phenomena are plainly illusory and there is therefore no room for continued doubt. In my opinion that would be going too far. In a number of instances the results of ESP experiments have been so clear cut, and obtained under such careful conditions, that failure to obtain similar results on repetition is not in itself sufficient ground for rejecting the initial observations. One is left with the uncomfortable conclusion that from time to time investigators of good faith and apparent competence obtain results seemingly inexplicable except in terms of an ESP effect, but that because these results cannot be reproduced to order they remain mysterious, they lead nowhere, and they add nothing to our knowledge of the phenomenon.

The central dilemma of parapsychology seems to be the inconvenient characteristic which the phenomena have of disappearing when submitted to too close scrutiny. In this they are not unlike other delicate psychological phenomena, such as creative inspiration. Maybe parapsychologists should be searching for means of detecting and registering ESP responses without subjects realizing that they are under ob-

servation.

BIBLIOGRAPHY

BRIER, R. M. and TYMINSKI, W. V.: "Psi Application: Part II. The Majority-Vote Technique-Analyses and Observations," J. Parapsychol. 34 (1970): 26-36. FISK, G. W. and WEST, D. J.: "Towards Accurate Predictions from ESP Data," J. Soc. Psych. Res. 39 (1957): 157-162.

OPEN DISCUSSION

MUNDLE: We now have half an hour to discuss the two papers. I suggest that as usual we take the papers in turn and first discuss Mr. Herbert's paper.

Might I seize the opportunity to make one comment on his paper. This morning I remarked that something Sir Alister said suggested that he was unduly narrowing the conception of ESP by painting telepathy as the genuine and important thing and the other varieties as something else-runs of luck. I would suggest that Mr. Herbert seems to be operating with a conception of parapsychology or its subject matter, paranormal phenomena, which seems to me to go to the other extreme -too wide, too impractical, too liberal in its implications-mainly, any phenomena which cannot be yet explained are to be treated as our subject matter, the subject matter of parapsychology. He has apparently discovered a phenomenon which is not explainable by physicists at present, but truly this phenomenon is something that should be investigated by physicists. Each branch of science has hosts of problemsphenomena which cannot yet be explained. Psychologists cannot yet explain mechanisms upon which memory depends, as I think Dr. Greenbank said of a conference of physiologists discussing how the nerve impulse travels, but I could find no adequate theory. Now surely we mustn't take on all the unresolved problems of the world. We don't know enough about physics (I don't, anyway) to discuss the possible explanations he mentioned. Well, that's my first view, and I'll stop and invite other comments.

HERBERT: Well, I think I have a very good answer to that. I fully agree. I'm naturally only interested in those problems which seem to have some bearing on parapsychology. May I cite a particular experiment, a typical experiment which seemed to have some success. We went to a haunted house, to the particular room involved. We had tape recorders in that part of the house and had control points at about fifty or a hundred feet away. This was to test the well-known idea that

people experience a feeling of coldness in a haunted house or in a séance room just before or during a phenomenon. We wanted to see whether this was revealed or was just imagination, and we did discover that during this time of testing, when our tape recorders were making peculiar noises, the temperature in the room being tested was between half a centigrade and a centigrade lower than what it was in the surrounding area. To check this, we reversed the thermometers.

HARDY: My question is: What was in your mind to begin with when you devised this experiment, and what are you trying to prove, and what conclusion do we come to?

HERBERT: My basic idea is to reject every single idea, including my own, and so I purposely have no idea at all. I do an operation and see what happens. I simply avoid having an idea. I'm curious, and so I do this.

HARDY: And you haven't any conclusion?

HERBERT: Oh, I have a very good conclusion if you want to hear it. First, get your facts. Get the data first and then worry about the theories. If I did have any idea at all, it was to see if anything unusual happened. I didn't expect this result at all.

COHEN: I think in your paper, Dr. West, you sort of brushed aside the improbability of psi phenomena in terms of modern science a little too lightly for my liking. You hit upon the contrast of standards between parapsychology and other psychological or behavioral sciences, and there you made a telling point. It has been pointed out by others that parapsychology is judged by standards far more severe than those which are applied to any other social or behavioral science. Indeed if the same standards were applied to most aspects of psychology, the field of psychology itself would cease to exist. That's a point that has been disputed by psychologists, but in any event, this is a criticism that has been raised and I can recall an experience I had with a reasonably well known physicist who asked me what sciences I wrote about and I said among others I write about the behavioral sciences and he looked me squarely in the eye and said very succinctly, "There are no behavioral sciences."

What I'm driving at with this story is, that yes indeed, parapsychology has, because of its very improbability, been judged by far harsher standards than any other psychological areas have been judged by. However, an improbable idea needs support, more experimental support I would think than any probable one so that one can tend to be lax in some psychological areas which seem probable and yet become

very severe in parapsychology which itself seems improbable. This is not an unfair or particularly harsh way of doing it and it seems to me a natural outgrowth of the type of material or the type of field in which you are dealing.

West: I think the point I was trying to make was that I find in difficult, not because the phenomena are philosophically incredible, but because the results are inconsistent.

HILLMAN: The results being inconsistent, as I get it, is a kind of general decline effect through all of parapsychology. It is falling off with new people and new experiments. They seem to be good when they're new and then there's a general falling off. Is that more or less what you're boiling it down to? If that's the case, then it would seem to be important to parapsychology to study the problem of decline effects in all forms of research. There are perhaps decline effects in other kinds of research and perhaps this problem can be discussed philosophically too. Why the new does certain things and why the old doesn't do certain things, but does other things, and what is the relationship between the new and the spontaneous.

GREENBANK: A physician I know made a comment about that which is very appropriate. He said to the young doctors, "When a new medicine comes out, be sure and use it while it's still effective."

West: It's well known in drugs and perhaps known in other areas. It seems that this fits into the general research problem, both philosophically and methodologically.

HILLMAN: I was only going to comment that parapsychologists had thought of this and at one time decline effects were a topic of investigation—a very favorite topic of investigation, and one might deduce naively that one method of getting success would be to count only the early trials when things were new and fresh or to continually change the kind of approach that you were using so you constantly had a new experiment to do, but as far as I know, these things haven't worked out.

ROLL: I'll just make a further statement on the point raised by Dr. Hillman. I think a case can legitimately be made and has been made to the effect that far from being something distressing, the decline effect is one of the signs of regularity and lawfulness that we have. It also seems to me that if you think of the ESP process as essentially a memory process or of ESP as a memory response—because after all to some extent that's what it is—at the beginning of ESP experiments the subject is told, "Now here are the five symbols: star, circle, square, cross and

wave." He has to remember them. If he can't remember them—"well, you can't do the test." Also with the feedback-response material, it seems fairly evident that we're dealing as a rule with the mirror images of a medium. Now, if you had repeated experiments, not necessarily only with the five different symbols, but a sort of serial situation, guessing habits are likely to set in which perhaps is one of the contributing factors for the decline effects.

MUNDLE: Did you wish to answer, Dr. West?

WEST: No, I agree with that. The only point I'm making is introducing fresh material doesn't necessarily produce success. You can break up guessing sequences by having different types of targets.

Roll: In some cases it is reported that the high level scoring has been produced. Osis found in his experiments that when a pattern of guessing was interrupted there was evidence of ESP. But now there's one area, it seems to me, where we really haven't solved the experimental situation. There is one situation where we don't find exactly the same kind of decline and that is in experiments with mediumistic material. Now I'll grant you there have been difficulties in the level of scoring and this has been unsatisfactory, but, for instance, if we grant an element of paranormality in the scoring of some of the mediums, this has been achieved year after year after year. It seems where there's an open range of responses, there may be less likelihood of a decline setting in.

Servadio: I wanted to make one distinction about what Dr. Hillman said. It is quite possible that there are decline effects also in other fields of research, but there is, nevertheless, a difference. There is not total decline of effects in psychopharmacology or in medicine. Here we see a total decline effect in the whole range of what we are interested in so that we can't really finish with doubting our own discipline. Doctors can very well accept what Dr. Greenbank said. It's not a question of take it or leave it.

PAHNKE: I'd like to add to what Dr. Servadio said. I think that when a new treatment is introduced which has psychological components, then what Dr. Greenbank said is true. For instance, penicillin is just as effective now as it ever was.

WEST: I agree with what Dr. Hansel has said that many of the earlier card guessing experiments are open to other than ESP interpretations, nevertheless, although Rhine's early experiments can be criticized as being so unsatisfactory, if most people nowadays repeat those experiments in equally unsatisfactory conditions, they rarely get results. This is one of the most mysterious things about ESP experiments.

MUNDLE: One of the features of the experiments you mentioned before was that the subjects were selected. They were all professional or amateur sensitives who believed that they had the ESP capacity and Schmidt screened them and picked the best. Now this is probably an important methodological point. Perhaps we've been led astray by the sheep-goats experiments in thinking that everybody has these powers to a certain degree. Perhaps there are only a very few and rare individuals and probably the most promising subjects for research are mediums and sensitives, amateur or professional.