This abstract was originally published in the *Journal of Parapsychology*, 1978, Volume 42, pages 158-160, in the section for Parapsychological Abstracts.
(Available at: http://jeksite.org/others/zv1978jp.pdf)

VASSY, ZOLTAN. Method for measuring the probability of 1 bit extrasensory information transfer between living organisms. Unpublished manuscript.

The author reports a series of experiments using a method of testing GESP based on the subject's conditioned reflex in anticipation of an electric shock. The subject's response was measured by his GSR (galvanic skin resistance). Two subjects, an agent and a percipient, were isolated in separate rooms. After a random intertrial interval, the agent was shocked; and then, 3.5 seconds later, the percipient was shocked.

[page 159]
The GSR of the percipient during the 3.5-second interval immediately preceding his shock was investigated for the rise associated with the anticipation of the coming shock, an occurrence which presumably could be due only to ESP.

Two experimenters conducted the sessions. One monitored the GSR on a meter and pushed a button to signify when he judged an anticipatory event on the part of the percipient had occurred. This signaled the second experimenter, who controlled the timing of the events by using random numbers to determine the intertrial interval and a ball-and-ramp arrangement with electrical contacts to control the intershock intervals. In this manner the experimenter who read the GSR was blind as to whether an intershock interval had begun or not. To allow for an appropriate latency of 2.5 seconds in the conditioned GSR reflex, the active interval during which a GSR event was designated as a hit was defined as the one-second period before the percipient's shock. The probability of a given number of responses during the active interval in view of the accidental (intertrial) response rate was evaluated according to the binomial distribution to assess the significance level and was also evaluated to yield an "incidence of transmission" factor which gave the percentage of times that a given shock was successfully anticipated by the percipient.

Five agent-percipient pairs took part in a total of 10 experimental sessions, six of which were significant at $p < .01$. The transmission factors for these six ranged from 8.29% to 18.9%. Observations during this series indicated that the percipient might be responding to the initiation of the timing cycle by the experimenter, since GSR events often occurred after the experimenter placed the ball on the ramp, but before the agent received his/her shock.

To test this, a new series was carried out in which the agent's electric shock was replaced with a signal lamp, and the active interval was defined as the one-second period after the experimenter placed the ball on the chute, but before the agent was signaled that the intershock interval had begun. Five series were carried out in this manner, all of which were significant at $p < .01$ and with percentages of transmission ranging from 5.7% to 17.9%. This finding indicates that the percipient may have been receiving information from the experimenter as well as the agent, a problem best attacked by automating the control apparatus.

A series of five control sessions had been included as part of the first series. In these sessions the agent removed his hand from the shocking electrodes and was thus unaware of

the commencement of the intershock interval. This was done at times of his own choosing in order to keep the experimenters and the percipient blind. Of these five sessions, four were clearly nonsignificant and the fifth was signifcant at $p = .02$, this last one occurring about the same time the experimenters became aware of the possible complication arising from the percipient's response to the controlling experimenter. The associated percentages of transmission ranged from 0% to 5.7%. The author stresses the point that the complete data have been presented and that there is therefore no selection.

Though the present experiments may be faulted on the grounds that the apparatus was somewhat primitive, nevertheless, as the author states, the main advantages to be expected from the application of the method suggested here in comparison to earlier ones are briefly the following:

1. Because of the absence of the need for a conscious decision, the mental state of the percipient has little effect on the measurement.
2. For the same reason the experiments can be performed not only with humans but animals as well.
3. The selective effect of the conditioned reflex enables signals to be detected which would remain hidden in the classical experiments.
4. Because of the points 1 and 3 the uncertainties in the measurement dwindle away to such an extent that the quantitative characterization of the information transfer can be achieved.
5. Because of this possibility, by varying the physical and biological circumstances of the measurement, we can determine the effect of the various physical and biological factors in mathematical terms.
6. The measurements can be completed very much faster than the earlier ones.

The relative weakness of this method lies in its inability to treat more complex information transfer, at least in its present form. Therefore, it cannot be used in spectacular demonstrations. But the test experiment reported here shows that it is likely to meet the needs for a research tool to study some basic characteristics of extrasensory information transfer.—*Editors' abstract*

Return to: Other Papers