(1) Strain Gauge Experiments

As a result of technical contacts with Prof. John Hasted, Birkbeck College, University of London, during an Iceland Conference on Physics and Parapsychology, we have developed an interest in attempting to confirm his claim[24,25] that he has observed inelastic and elastic deformations of metal bars by some kind of remote human interaction. During these experiments the subjects are reported to cause effects without any physical contact with the metal.

In an effort to replicate Prof. Hasted's results, we have constructed an electrically shielded enclosure having more than 135 dB RF attenuation from 10 kHz to 10 MHz and plexiglass sides (to shield against air currents). Within this enclosure is an experimental system of resistive strain gauges attached to a thin metal bar. These are wired as a temperature-compensating bridge and connected to battery-operated amplifiers and recording instruments. At present we can detect changes in the length of the bar on the order of 500 angstroms and applied transverse forces of approximately 100 mg. To date, we have been successful in isolating and correcting several sources of artifact, and have obtained hours of artifact-free baseline operation. All of the data will be magnetically recorded for later computer analysis, and a simple stripchart record will provide immediate feedback to the subject of any changes in the bar. We are encouraged with the progress of artifact isolation, and we propose to begin to task subjects to attempt to perturb the isolated metal bar.

Should experimentation reveal genuine subject-induced perturbations, we propose to determine whether such effects can be used as a message-transmission device (remote telegraph).

(2) Random Number Generator Experiments

Another class of experiments that have been extensively reported are those that involve alleged human/machine interaction with electronic random-number generators. In these experiments, digital electronic noise derived either from a thermal noise source or from the decay of a radioactive material is monitored while a subject is attempting to alter the statistical properties of the noise distribution.