C. APPLICATION OF THE POLYGRAPH

Many agencies of the Federal Government employ the polygraph method of lie detection in the security program and in criminal investigations, as follows:

(1) Preemployment screening in sensitive agencies: To judge the accuracy of information provided by an applicant on a personal-history questionnaire (i.e., attempted deception). In one agency, the polygraph test is administered before a background investigation is undertaken while in another agency only after the investigation has been completed. Critical areas where a truthful reply is sought include membership in Communist organizations, association with Communists, relatives living in Communist countries, conviction of a felony, history of emotional instability and homosexual activities.

(2) Prior to assignment to sensitive activities: Some organizations use lie detection prior to special assignments even though a person may have been

cleared previously.

(3) Periodic security review: Periodic rescreening of all members of certain organizations for recent evidence of homosexual activities, security violations, etc.; and to verify the reports and activities of individuals who have returned from special oversea assignments which may have brought them into contact with enemy agents.

(4) Screening refugees or foreign agents: To evaluate the personal reliability of foreigners when a thorough background investigation is not possible; though preferably conducted in the foreigner's language, such

tests are sometimes conducted through an interpreter.

(5) Criminal interrogation: To provide independent verification of information collected by other means in criminal investigations. In the military service, this applies to thefts of personal or Government property, arson, murder, willful destruction or sabotage of Government property, and, of course, serious violations of the security regulations.

Many police departments employ lie detection equipment in support of criminal investigations; the examiner may be a police officer or a private examiner hired for the purpose. Some commercial organizations and private examiners offer lie detection services on a fee basis to banks, supermarkets, department stores, and industrial organizations. The purpose of such services is to encourage honesty in filling out preemployment questionnaires and in the handling of money or expensive merchandise.

On an experimental basis, two of the three indicators used in lie detection equipment (galvanic skin response and respiration) have been employed to measure the level of interest in advertisements and in TV programs. The responses of a group of individuals have been measured simultaneously for such purposes (Backster, private communication, 1959, 1962). This work has

not been reported publicly and its value (if any) is not known.

Many physiological responses, including those used in lie detection instruments. have been studied in research on emotions, drug effects, learning, bioastronautics, environmental contamination, hospital surgery, fatigue, personality, and psychotherapy. The purpose of these researches was not lie detection though some of the results can be applied to this field and will be reported below.

D. LEGAL STATUS

Some lawyers have been attracted by the possibility that lie detection could provide a powerful assistance to the ever difficult business of assessing the validity of testimony. This type of application has both proponents and oppo-

nents (Wicker (1953), McCormick (1926), Summers (1939), Burack (1958)). At present, information collected "solely" by means of lie detection tests cannot be entered as evidence either in a civil procedure (Inbau and Reid, 1953, pp. 122-141) or a court-martial (Everett, 1955). The major reason cited by the courts is that lie detection does not have sufficient "scientific recognition among physiological and psychological authorities" to warrant the admission of testimony (Frye v. U.S., 1923; Henderson v. State, 1951). The word "solely" is important because confessions otherwise obtained properly are not rendered inadmissible by the fact that a polygraph was used during the interrogation (Wicker, 1953). A polygraph examiner can be permitted to testify as to a confession received during the course of an examination even though the charts themselves are not admissible.