Proceedings of the Iowa Academy of Science

Volume 42 | Annual Issue

Article 79

1935

New Apparatus for the Measurement of the Electro Dermal Response

D. U. Greenwald University of Iowa

Copyright ©1935 Iowa Academy of Science, Inc. Follow this and additional works at: https://scholarworks.uni.edu/pias

Recommended Citation

Greenwald, D. U. (1935) "New Apparatus for the Measurement of the Electro Dermal Response," *Proceedings of the Iowa Academy of Science*, *42(1)*, 169-169. Available at: https://scholarworks.uni.edu/pias/vol42/iss1/79

This Research is brought to you for free and open access by the Iowa Academy of Science at UNI ScholarWorks. It has been accepted for inclusion in Proceedings of the Iowa Academy of Science by an authorized editor of UNI ScholarWorks. For more information, please contact scholarworks@uni.edu.

1935] ABSTRACTS

169

results also show that the one-armed driver takes 8% longer time than the same driver using both hands. Errors in observation are very slightly affected by a handicap in manipulative ability, and there is no significant difference between the number of errors made with either or both hands. The correlation of manipulation and errors was $-.22 \pm .08$. The correlation between manipulative ability and time taken of the test, i.e., speed, was $+.19 \pm .09$. These intercorrelations indicate relative independence of the variables compared.

DEPARTMENT OF PSYCHOLOGY,

Iowa State College, Ames, Iowa.

NEW APPARATUS FOR THE MEASUREMENT OF THE ELECTRO DERMAL RESPONSE

D. U. GREENWALD

An analysis of the literature on apparatus used to measure electro dermal responses shows that about ten characteristics have been considered important by the majority of investigators.

Apparatus which includes most of these is presented. Its circuit and accessory photographic recording mechanism is explained. The chief distinguishing features are:

1. Measurement in standard physical units (ohms).

2. Continuous measurement.

3. A permanent record of all variations.

4. Constant visibility of the resistance level and response variations.

5. Ruggedness.

6. Adequate sensitivity for most researches in psychology.

7. Portability.

8. Simplicity of circuit and operation.

9. Use of alternating exosomatic current.

10. Dry electrodes with little polarization.

11. Very constant current through the observer.

12. Reasonable cost.

13. Single current source from a commercial supply lead.

DEPARTMENT OF PSYCHOLOGY,

UNIVERSITY OF IOWA,

Iowa City, Iowa.

Published by UNI ScholarWorks, 1935