

Research design hypothesis testing

Psychology



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Research design / Hypothesis Testing

Comparable Research on the Effectiveness of Drug to Patients with Schizophrenia Part One Pharmaceutical company has continued to invest in producing drug that would treat the positive and negative symptoms of schizophrenia without triggering its side effects. The company desires to determine which drug is more effective in treating mental disorder. This study aims to measure and compare the effectiveness of previous and new drugs produced by the pharmaceutical company. This paper will include the research design in achieving the purpose of this study.

The researcher will utilize the quantitative research methods in measuring and determining the effectiveness of drugs treated to schizophrenic patients. This research method is appropriate in proving and rejecting hypothesis formulated by the researcher. Since this study uses statistics in determining the efficacy of the drugs, quantitative research is applicable through experiment. The researcher will select randomized group or patients that are diagnosed with schizophrenia. It also involves two groups: controlled and experimental so that the analysis will lead to the main objective of this study. Furthermore, quantitative research prevents biased result when properly used. It also allows for the repetition of experiment to reprove the result of the experiment.

To determine the effectiveness of drugs, the research utilizes the Clinical Global Impression (CGI) Scale that examines the patients' status in terms of its behaviour, symptoms, and response to treatment. It documents the history of patients with mental disorders (Busner, 2007). According to Kadouri, Corruble, and Falissard (2007), the CGI scale is widely used in

clinical research due to its “ face validity and practicability.” Moreover, another metrics developed by Logothetis will be utilized because it involves “ two receptors” that determine the function of drugs to the patient’s brain (Wood, 2011).

Part Two

This study hypothesized that the new developed drugs is more effective than the previous drugs formulated by the pharmaceutical company on the schizophrenic patients. To collect the data, the researcher will select schizophrenic patients randomly. The controlled group will be given the previous anti-psychosis drug while the experimental group will be rendered the new drug produced. Each patient will take 7. 5/30 mg of drug. Using the CGI Scale, the researcher will assess the effect of drugs on the patients. The CGI Scale consists of interviewing patients and recording their behavior or response to the drug used. Furthermore, the metrics is utilized to determine the effect of drugs on the brain. This will be based on the scale developed by the Logothetis. After 6 months of observation, the data gathered will be tabulated based on the statistical tools used.

The null hypothesis is tested through t-Test and ANOVA in determining and comparing the effectiveness of drugs used for schizophrenic patients. The result is considered significant when the p value is less than the alpha value. The alpha value is 0. 05 since it is the maximum percentage of error and the accepted convention in the field of science. After six months of observation on the outcome of drugs, the study found the p value is less than the alpha value, which means that the null hypothesis cannot be rejected since there is a significant difference on the effectiveness of drugs used in treating schizophrenia. Therefore, the new drug is recommended to treat patients

with schizophrenia.

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