

**THE EFFECTS OF ALBERT ELLIS' PSYCHOTHERAPY ON THE
CHANGE OF
AGGRESSIVE BEHAVIOUR IN PRISONERS
A Biological Psychiatric Approach**

Abstract

There has been a trend toward an increase in the rate of recidivism recently. This indicates that there is social insecurity and a failure in condemnation efforts. Seen from the point of view of the prisoners themselves, the researcher could guess that there are prisoners who are responsive and those who are resistant to condemnation, with the result that they tend to become recidivist. It is also known that cytokines do not only play a role in immunity, but also in behaviours, including aggressive behaviour. As psychosocial emphasis and the treatment of psychotherapy could influence an individual's cytokine level. The researcher hopes that evaluating a prisoners cytokine level would reveal his specification of behaviour and his response to condemnation.

The objectives of this study are to prove that the different quality of aggressiveness among prisoners can be seen from the different composition of cytokine serum level of IL-1 β , IL-2 and TNF α , and to prove that the change in the quality of the prisoners' aggressiveness as indicated by the change of the composition of cytokine serum level IL-1 β , IL-2 and TNF α is the result of psychotherapy.

This study is quasi-experimental in nature, it uses a pretest and posttest control design, which involve recidivist and non-recidivist prisoners who are being imprisoned in Sragen Penitentiary and Surakarta Detention Centre and are subjected to condemnation and psychotherapy. The data observed are of the cytokines of IL-1 β , IL-2 and TNF α and the scores are of Scale 4 MMPI. Statistical analysis used in this study are Menova for the sampel homogeneity test, Quick cluster to determine the classification of prisoners based on the cytokine serum, discriminant analysis to identify the factor which plays a discriminating role as a result of psychotherapy.

The result of the study show that the quality of prisoners' aggressiveness could be discriminated based on composition of the cytokine serum level of IL-1 β , IL-2 and TNF α , in which aggressive type 1 prisoners have a higher average TNF α serum level (68,00 pg/ml), while aggressive type 2 prisoners have a lower average TNF α serum level (21,10 pg/ml). Response to the treatment of psychotherapy among prisoners are also found to be different. Aggressive type 1 prisoners show that the TNF α serum is reduced to -52,9364 pg/ml indicating that they are responsive, While aggressive type 2 prisoners show less change in the level of TNF α serum, of which there is an increase of +0,3143 pg/ml indicating that they are resistant.

As a conclusion, the researcher recommends that 1) a doctor / psychiatrist should be involved as expert to evaluate prisoners' responsiveness by measuring

the level of TNF α serum in a judicial process. 2) as soon as they arrive at the penitentiary, prisoners should be classified based on their TNF α level of < 21,1 pg/ml tend to the resistant to condemnation and psychotherapy. 3) the decrease of a TNF α serum can be used to evaluate the improvement of the prisoners' aggressive behaviour. 4) other efforts to reduce the aggressive behaviour of resistant prisoners should be made, among others by extending the time of therapeutic visits and by giving medicines at the early phase of psychotherapy or gene therapy. 5) To obtain a more precise a classification of prisoners who are resistant to condemnation and psychotherapy, further studies should involve others variable such as cytokines which are closely related to psychosocial stressor, or involve more samples. 6) To increasing validity of research, respondents in others studies should be matched in age, type of crime, martial status, intelligence, etc. 7) Psychological instrument for aggressive as well as antisocial behaviour which are suitable for the sociocultural reality in Indonesia.

Keywords : *prisoners, aggressiveness, antisocial behaviour, scle 4 MMPI, cytokine (TNF α), psychotherapy.*

