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## COMPARISON OF THE SACCADIC REFIXATION PARAMETERS IN PATIENTS TREATED WITH METHADONE AND INDIVIDUALS FROM THE CONTROL GROUP

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### Introduction

Administration of psychoactive drugs increases dopaminergic receptor stimulation, improves mood and stimulates motor activity. Structural and functional changes can be observed in particular structures of the central nervous system (CNS).

### Aims/Objectives

This study aims to assess the saccadic refixation parameters in opioid addicted subjects treated with methadone compared to control group.

### Methods

Eighty-six patients from the substitution program were examined. The study included 36 subject of the control group. The trial was conducted twice: before and about 1.5 hours after the administration of therapeutic dose of methadone. Performed Latency Test(LT) with Saccadometr diagnostic system.

### Results

The statistical analysis showed that the mean duration before and after the administration of methadone was a statistically significant increases ( $p=0,0001$ ) in the subjects from substitution program compared of the control group but after administration of methadone the value greatly increased in experimental group (before  $52ms$ , after  $56ms$ ). It was observed that the mean amplitude after the administration of methadone increased statistically significantly in experimental group compared of the control group ( $p=0,02$ ). Mean peak velocity of latency after the administration of a therapeutic dose of methadone was statistically significant decreased in experimental group compared of the control group ( $p=0,0004$ ).

### Conclusion

The results indicate a change in the dynamics of saccade after methadone administration. The observed changes in values for eye movements may be due to the inhibitory effect of methadone on CNS.