



# EFFECT OF PSYCHOLOGICAL IMPLICATIONS ON LIFE STYLE FOR DIFFERENT AMOUNT OF DEVIATION FOR ESOTROPIA

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## Abstract

**Purpose:** The aim of the present study is to compare the effect of Psychological Implications in different amount of deviations in Esotropia.

**Methods:** Prospective, Cross sectional and observational study was performed at tertiary eye care centers. Subjects with Ocular deviation between 10 to 40 prism diopters, Corrected distance Visual Acuity should be greater than 6/18 and Age should be between 10 to 40 years of age were included in the study. Questionnaire was prepared on the effect of Psychological Implications on the Life style in presence of Ocular deviation. Response score of the subjects were noted and Mean score of the responses were compared in different amounts of deviation. Data was analyzed using SPSS software version 20.

**Results:** 50 subjects were included in the study. Out of that, 28 subjects were included in 11-20 age group, 18 subjects in 21-30 and 4 subjects were in the age group of 31-40 years. 54% subjects were Females and 46% were Males. Comparison of mean score of Questions on Psychological Implications for different amount of deviation for Esotropia was analyzed and it shows that with increasing amount of Ocular deviation, Psychological Implications hampers more.

**Conclusions:** In the ocular deviation of Esotropia, as the amount of ocular deviation increases, Psychological Implications hampers proportionately.

**Key Words:** Esotropia; Amount of Deviation; Psychological Implication

# Introduction

In case of Eso deviation, the images of an object are falling on the Nasal parafoveal region. With increase in Ocular deviation, the images are falling more in parafoveal region compared to normal Ocular deviation. In the macular region, anatomical deformity is present. It means that cone cell density is more in foveal region as compared to para foveal region and number of cone cells is also highest in foveal region as compared to para foveal region. So, there may be chances of hampering of Psychological Implications on Life style in the presence of Eso deviation. With increase in Eso deviation, Psychological Implications on Life style is hampered proportionately. Partha Haradhan Chowdhury: Effect of Psychological Implications on Life Style for Different Amount of Deviation for Esotropia

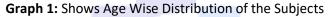
# Methodology

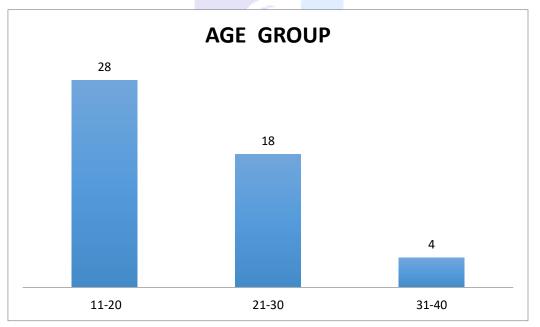
50 subjects were included in the study. Prospective, Cross sectional and observational study was performed at tertiary eye care centers. Subjects with Ocular deviation between 10 to 40 prism diopters, Corrected distance Visual Acuity should be greater than 6/18 and Age should be between 10 to 40 years of age were included in the study. Individuals with any other systemic disease (specially which can affect study), Individuals with any other Ocular Pathology, with any active ocular infection, any ocular anomalies like Corneal Scar etc, ocular deviation if less than 10 degree and Significant amount of amblyopic patient were excluded from the study. Full refractive correction along with detailed fund us evaluation was performed in each and every patient. All visual parameters were taken with full Refractive correction. Questionnaire was prepared on the effect of Psychological Implications on the Life style in presence of Ocular deviation. Options in

the Questionnaire was kept using Likert 5-point scale system. Test – Re Test Reliability was performed, and its score is 0.8. Response score of the subjects were noted and Mean score of the responses were compared in different amounts of deviation. Data was analysed using SPSS software version 20.

#### Results

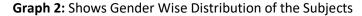
50 subjects were included in the study. Graph 1 shows age wise distribution of the subjects. It shows that 28 subjects were included in 11-20 age group, 18 subjects in 21-30 and 4 subjects were in the age group of 31-40 years. Graph 2 shows Gender wise distribution of the subjects.54% subjects were Females and 46% were Males. Graph 3 shows comparison of mean score of Questions on Psychological Implications for different amount of deviation for Esotropia. It shows that with increasing Ocular amount of deviation, Psychological Implications hamper more.

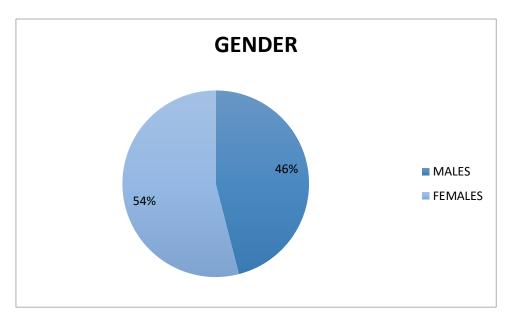




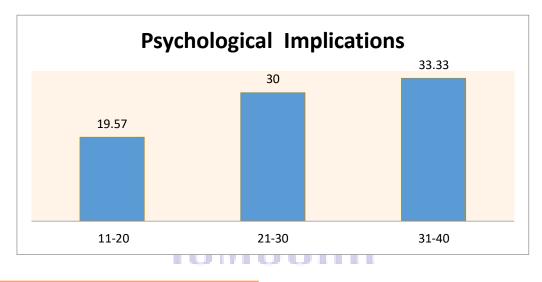
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Graph 3: Shows Comparison of Mean Scores of Questionnaire in Different Amounts of Deviation in Esotropia



#### Discussion

In the Ocular deviation of Esotropia, mean score of Questions (Effect of Psychological Implications on Ocular deviation) for 11-20, 21-30 and 31-40 Prism Diopters are 19.57, 30, and 30.33 respectively which shows that maximum deterioration of mean score of questions is in 31-40 Prism Diopters of Esotropia. With increasing Ocular deviation proportionately, image is shifted from the foveal region and thus deterioration is present. The present study shows that as amount of deviation increases, Psychological Implications will also hamper more.

#### Conclusion

In the ocular deviation of Esotropia, as the amount of ocular deviation increases, Psychological Implications hampers proportionately.

# Consent

Oral/ written consent was obtained from patient as well as from tertiary eye care centers.

#### **Ethical Approval**

It is not applicable.

#### **Competing Interests**

Authors have declared that no competing interests exist.

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