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## **Gender based comparative study of anxiety among young adults of rural and urban area**

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### **Abstract**

Rural Young adults have more difficult living conditions than urban young adults, yet the research on the frequency of anxiety disorders in rural settings is interesting. We looked at how often anxiety is in rural versus urban regions and also male vs female. The objectives of the current study include examining to assess and compare the level of anxiety level across gender and place of belong. The construct of Anxiety level is measured by the Hamilton M. The assessment of anxiety states by rating. Br J Med Psychol 1959: 32:50-55. Two hundred fourteen (N=214) young adults from different parts of India constitute the sample of this study out of 214 respondents, 127 males and 87 female respondents in which 89 respondents belong to rural area and 125 respondents belong to urban area. Research suggest that in a rural area, 80% male and 57.9% female had mild severity of anxiety, 12.8% male and 26.3% female had mild to moderate severity, and 7.2% male and 15.8% female had moderate to severe severity. In the urban area, 78.9% male and 66% female had mild severity of anxiety, 8.8% male and 16% female had mild to moderate severity, 12.3% male and 18% female had moderate to severe severity. The prevalence of anxiety level slightly but higher in urban area respondents compared to rural area respondents and in the same manner, female respondents has a high level of anxiety compared to male respondents.

**Keywords:** anxiety, young adults, gender, rural area, urban area, gaba and mental illness

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### **Introduction**

#### **Anxiety**

In young adults of the present generation, anxiety is a psychological and physiological situation that consists of cognitive, somatic, emotional, and behavioral aspects. These elements come together to produce an unpleasant sensation that is often associated with unease, apprehension, fear, or worry <sup>[1]</sup>. Anxiety is a warning signal that alerts the person to an oncoming danger and allows them to deal with the issue. Pathological is a subjective feeling of as the predominant or only symptom that is not justified in response to real-life circumstances <sup>[2]</sup> It differentiates from chronic anxiety and adjustment reactions as a distinct component of anxiety disorder. Normal anxiety is a reaction to a recognizable danger or threat to one's safety and security that subsides once the danger or threat has passed. Genuine endogenous anxiety is "ego alien" and "ego dystonic" <sup>[3]</sup>. According to behavioral theory, anxiety is seen as an unconditioned intrinsic response of the organism to painful or harmful stimuli. Conditioning attaches this to seemingly neutral cues in anxiety and phobias. Theory of Cognitive Behavioral Therapy (CBT) According to cognitive behavior theory, anxiety disorders are characterized by selective information processing (with a greater focus on threat-related information), cognitive distortions, negative automatic thoughts, and a sense of loss of control over both internal and external stimuli <sup>[4]</sup>. Biologically chemically produced anxiety states: In predisposed individuals, infusions of chemicals (such as sodium lactate, isoproterenol, and caffeine), consumption of yohimbine, and inhalation of 5% CO<sub>2</sub>

can cause panic attacks. MAOIs (orally) before the lactate infusion protects the individual(s) from panic attacks, pointing to a possible biological model of anxiety. GABA-benzodiazepine receptors: One of the most recent advances in the hunt for the etiology of anxiety disorders is the discovery of GABA-benzodiazepine receptors <sup>[3]</sup>. Physical indications and symptoms include trembling, dilated pupils, restlessness, and muscle twitching, as well as palpitations, dizziness, elevated heart rate, flushing, excessive sweating, fast breathing, diarrhea, and a dry mouth. Fear, depersonalization, easy distractibility, poor attention, loss of sleep, inability to relax, fearfulness, and irritability are cognitive symptoms. Diagnosis and treatment options: From the history, physical examination, and mental examination findings, the physician or psychiatry diagnosed anxiety disorder, which helps rule out any apparent medical problem connected with anxiety <sup>[5]</sup>.

#### **Diagnosis and treatment**

Anxiety disorder in young adults is diagnosed by a physician or psychiatrist based on the patient's history, physical examination, and mental examination findings, which rule out any evident medical disease linked to anxiety. Anxiety is managed differently depending on the symptoms, although psychiatry frequently prescribes psychopharmacological medicines in conjunction with a particular type of behavior treatment, such as Cognitive behavior therapy <sup>[6]</sup>. Besides these treatment methods, a young adult should focus on the Self-Monitoring technique. Early in

treatment, self-monitoring techniques are frequently used to establish a baseline frequency of the behaviors that are being changed [7]. Patients commonly report that meticulously tracking and recording facts about their behavior leads to increased awareness and knowledge, as well as a significant reduction in maladaptive behavior. Changes in diet, exercise behaviors, time management, and sleep hygiene are typically beneficial to patients with clinical anxiety disorders. Caffeine abstinence and heavy alcohol consumption are strongly advised. Many patients describe feeling rushed as a result of skipping meals or eating "on the run." [8]

### Young adult

Young adulthood is a stage of acclimating to a new way of life. A young adult is typically someone in their late teens or early twenties who is in their thirties, though definitions and viewpoints, such as Erik Erikson's stages of human development, differ. Young adulthood comes before middle adulthood in human development. A young adult, also known as a prime adult, is a person between the ages of 20 and 40, according to Erikson's phases of human development. Mental illness is a common problem among this age group [9]. Young adults are often thought to be a healthy age group, yet 20% of them experience a mental health problem at any given time, the most prevalent of which is anxiety [10]. Anxiety or depression in adolescence may be a precursor of anxiety or depression in young adults: suicide is among the leading cause of death in young people [11]. The sensation of academic stress can be distressing for specific individuals. In depressed teenagers, family strife and a strained relationship with their parents were linked to an increased risk of suicide. Few types of research on the prevalence of depression among students have been undertaken on a global scale [12]. All of these researches have been carried out in both Western and non-Western nations. There are few epidemiological types of research on depression in adolescent students in India. Anxiety in this age group is of paramount importance and warrants serious study. Early-onset anxiety among adolescent students interferes with psychological, social, and academic functioning, placing him or her at greater risk for problems such as substance abuse and suicidal behavior [13]. Numerous factors have been linked to the high occurrence of anxiety among adolescents. Students' anxiety was linked to several factors, including their educational experiences, social factors such as alcohol usage, drug addiction, family problems, sadness in the family, and living away from home. Such studies will be an excellent tool for taking appropriate steps, such as therapy for depressed kids. As a result, this research was conducted to determine how the transition in age, gender, and context (rural or urban) affects anxiety and depression in teenagers [14].

### Objective

The objectives of the current study include examining to assess and compare the level of anxiety across gender and place of belong. Examine the association between the level of anxiety and place of residence of young adults.

### Following are the hypothesis of the current study

**Ho1:** There exists no significant difference between Levels of Anxiety across place of belonging.

**Ho2:** There exists no significant difference between Levels of Anxiety across gender

### Material and Method

#### Sample

A sample of 214 young adults (N=214), 89 respondents belong to rural area and 125 respondents belong to urban area. 127 males and 87 females between the age range of 20 to 40 years from various parts of India, was taken for the study based on the exclusion and inclusion criteria of the study.

#### Research design

A research design is prepared for compiling and analyzing new data for interpreting the already available facts in a new form. Preparation for a research design involves making proper arrangements for simple systematic research work. The researcher plans the various operations, keeping the theoretical framework and the required resources in mind [15]. In the present study, a descriptive research design was chosen. It was chosen as we observed and described the relationship between anxiety and emotional intelligence among young adults' subject. The subject was being observed in a completely natural and unchanged natural environment. This helped us gain insights on the demographic profile, academic, and all types of anxiety and emotional intelligence of the young adults without influencing their behavior in any way.

#### Tools used for the study

- A self-structured demographic profile shall be used to study the demographic profile of young adults to collect general and specific information about the respondents.
- Anxiety level measured by the Hamilton M. The assessment of anxiety states by rating. Br J Med Psychol 1959: 32:50-55.

#### Reliability and validity

The Hamilton Anxiety Rating Scale (HAM-A) was one of the first rating scales to assess the severity of anxiety symptoms, and it is still widely used in clinical and research contexts today. The scale consists of 14 items, each characterized by symptoms, and assesses both psychic and somatic anxiety. Although the HAM-A is still extensively used as a clinical trial outcome measure, it has been challenged for its inability to distinguish between anxiolytic and antidepressant effects, as well as somatic anxiety and somatic side effects. There are no standardized probe questions in the HAM-A. Despite this, the scale's indicated levels of inter-rater reliability appear to be acceptable.

#### Procedure

The interview schedule was protested on fifteen respondents for validity. This study helped assess the calculated information. The information was gathered through an in-depth interview with the respondents to elicit the necessary information. The sample was identified, and permission to conduct the study was secured from them. Efforts were made to ensure that the answers were accurate, precise, and relevant. Using suitable statistical processes, the data was then coded, scored, tabulated, and evaluated.

#### Data analysis

The data were tabulated, coded, and decoded. Descriptive and relational statistical tools were used to analyze the data to study

the relationship between dependent and independent variables. Google Forms, Google Sheet, MS Excel (Version 2019), and SPSS (Version 26) analyzed descriptive and relational statistics. The data analysis was done using descriptive statistics regarding frequency, percentage, and relational statistics applied correlation coefficient. Descriptive (frequency and percentage) and relational statistics (ANOVA) were used to analyze the data. One-way ANOVA was applied. The significance level was  $P < 0.05$ .

**Result**

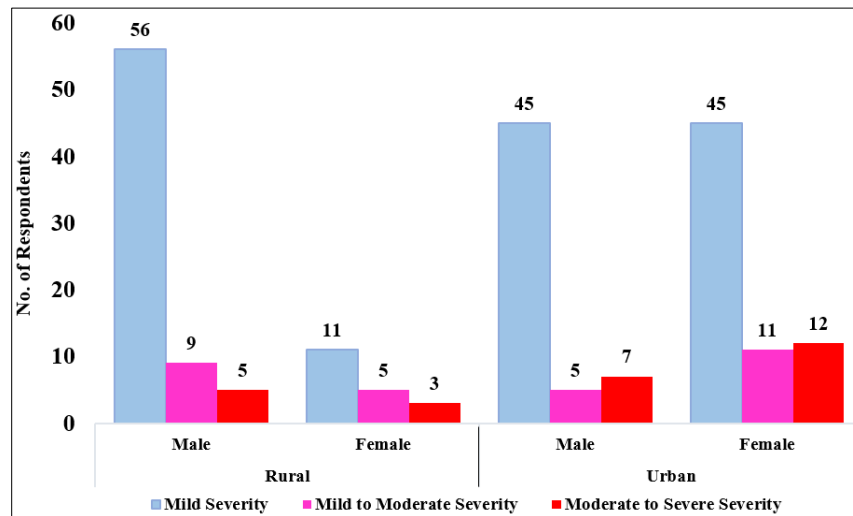
**Distribution of respondents based on their gender, place of belonging and level of anxiety**

The general profile of respondents was collected using a pre-designed interview schedule. Data collected was presented in the form of descriptive statistics, that is, frequency and percentage. Results show that the majority of the respondents (58.4%) were belong to urban area, and the rest of the respondents (41.6%) were belong to rural area.

**Table 1:** Distribution of respondents on the basis of the gender, place of belonging and level of anxiety (N=214)

Place of belonging	Gender	Mild severity	Mild to moderate severity	Moderate to severe severity	Total
Rural	Male	56 (80%)	9 (12.8%)	5 (7.2%)	89 (41.6%)
	Female	11 (57.9%)	5 (26.3%)	3 (15.8%)	
Urban	Male	45 (78.9%)	5 (8.8%)	7 (12.3%)	125 (58.4%)
	Female	45 (66%)	11 (16%)	12 (18%)	

Table 1 and Figure 1 describe distribution of gender, place of belonging and level of anxiety, the above data inform us 89 respondents belong rural area and 125 respondents belong urban area. Table and figure suggest that in a rural area, 80% male and 57.9% female had mild severity of anxiety, 12.8% male and 26.3% female had mild to moderate severity, and 7.2% male and 15.8% female had moderate to severe severity. In the urban area, 78.9% male and 66% female had mild severity of anxiety, 8.8% male and 16% female had mild to moderate severity, 12.3% male and 18% female had moderate to severe severity.



**Fig 1:** Distribution of respondents on the basis of the gender, place of belonging and level of anxiety

The above data suggest that rural respondents had a low level of anxiety compared to urban respondents, and in the same manner, female respondents had a high level of anxiety compared to male.

**Testing of hypothesis**

**Ho1:** There exists no significant difference between Levels of Anxiety across Place of belonging.

**Table 2:** ANOVA value between Level of Anxiety and Place of Belonging of respondents (N = 214)

Categories (Anxiety level / belong)	Mean	df	f	Sig. (p)	Conclusion
Rural	1.33	212	0.950	0.331	NS
Urban	1.43				

The result in table 2 depicted that  $p > 0.05$ , thus the null hypothesis is accepted, means that there is a thin or weak association between Level of Anxiety and place of belonging of among young adults' respondents. But mean value says rural area respondents had less level of anxiety (mean value = 1.33) with comparison to urban area (mean value = 1.43) respondents.

**Ho2:** There exists no significant difference between levels of anxiety across gender

**Table 3:** ANOVA value between Level of Anxiety and Gender of respondents (N = 214)

Categories (anxiety level /gender)	Mean	df	f	Sig. (p)	Conclusion
Male	1.29	212	5.636	0.018	S
Female	1.58				

The result in table 3 depicted that as  $p < 0.05$ , thus the null hypothesis was rejected, which means that there is a significant difference between Levels of Anxiety and gender of respondents. Mean value depicted that male respondents have less level of anxiety (mean value = 1.29) with comparison to female respondents (mean value = 1.58)

**Discussion**

Key findings emerge from the results above, and the proposed hypothesis was analyzed using different statistical techniques to test the hypothesis. The main objective was to see if there is any

difference in Anxiety Level across gender and their place of belonging. The results indicated that in rural area young adults 7.2% male have moderate to severe severity of anxiety and in case of urban area young adults 12.3 % male have moderate to severe severity same result in case of female population of rural area approx. 15.8 % female have moderate to severe severity of anxiety and in case of urban area 18 % female young adults have moderate to severe severity of anxiety. This says urban area respondents are high level of anxiety with comparison rural area respondents. The result in table 2 depicted the same, that  $p > 0.05$ , thus the null hypothesis is accepted, means that there is a thin or weak association between Level of Anxiety and place of belonging of among young adults' respondents. But mean value says rural area respondents had less level of anxiety (mean value = 1.33) with comparison to urban area (mean value = 1.43) respondents. This because of various study suggest that in cities, a high level of stress and a lack of social support are more prevalent than in rural settings. It is thought that the urban environment has an impact on mental health in early life and that it raises anxiety later in life. City life can also weaken your psychological immune system, which is especially dangerous for people who have a family history of mental illness. (Verma *et al.*, 2002) [15]. This stress can raise their chances of having a psychiatric problem like anxiety, depression, or bipolar disorder. Despite the fact that urban life can cause mental anguish, shame and stigma often prevent young adults from discussing their problems.

This could explain why they are more lonely than rural area young adults. Besides the above reason it appears that traffic noise can disrupt sleep and cause cortisol, a stress hormone, to rise elevated levels of this hormone can raise a person's risk of cardiovascular disease and insomnia over time which lead to high level of anxiety (Satyanarayana *et al.*, 2017). Another key finding of our result is female respondents have high level of anxiety than male respondents. The result in table 3 depicted the same, that as  $p < 0.05$ , thus the null hypothesis was rejected, which means that there is a significant difference between Levels of Anxiety and gender of respondents. Mean value depicted that male respondents have less level of anxiety (mean value = 1.29) with comparison to female respondents (mean value = 1.58)

### Conclusion

Key finding suggests that in a rural area, 80% male and 57.9% female had mild severity of anxiety, 12.8% male and 26.3% female had mild to moderate severity, and 7.2% male and 15.8% female had moderate to severe severity. In the urban area, 78.9% male and 66% female had mild severity of anxiety, 8.8% male and 16% female had mild to moderate severity, 12.3% male and 18% female had moderate to severe severity. The anxiety level slightly but higher in urban area respondents compared to rural area respondents and in the same manner, female respondents has a high level of anxiety compared to male respondents.

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### Conflicts of interest

There are no conflicts of interest.

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