

Impact of Involvement in Tapovan Research Centers on Anxiety of Pregnant Women

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Abstract

The primary aim of this study was to compare two groups of pregnant women involvement in a Tapovan research centre, one whose pregnant women involved in Tapovan research centre regularly during pregnancy, the other whose pregnant women did not involved. A random sampling method was used to select 120 pregnant women's from Various Tapovana Research Centre's affiliated to children's University of Gujarat. Collection of data was carried out with the help of Comprehension Anxiety scale. For analysis of data 'F' test was used. Results revealed that significant difference was found that whenever pregnant women involved in Tapovan research center.

Keywords: *Anxiety, Tapovan Research Center, Pregnant Women, Involvement and Education.*

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Introduction

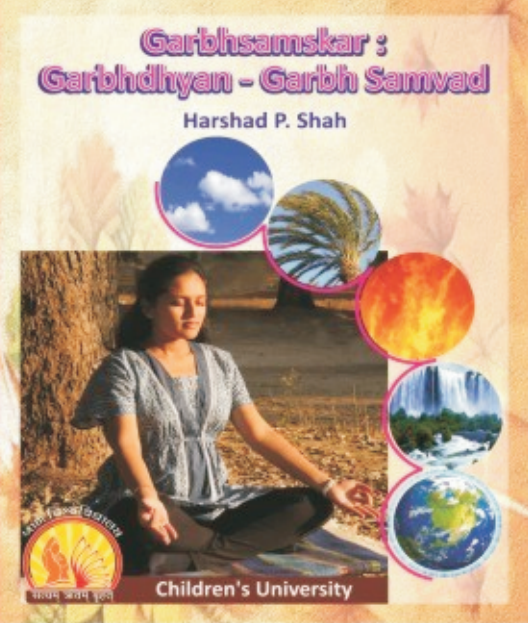
In terms of definition of person's development, Indian culture has been a unique culture in the world. As part of which, the vision of seeing a person's development is seen in the past. Pre-natal Care is a part of cultural way of life in Indian tradition. It is essential that the learning of a child's excellence begins from its conception and continues all through the life. For the period of pregnancy the child is affected by the Physical, Social, Emotional, Psychological and Spiritual well-being of the mother. We want to verify this knowledge through a series of researches. Children's University has taken initiative with the help of a two-dimensional concept of TAPOVAN RESEARCH CENTRE. These two dimensions are: Researches in the eugenics and Guidance and education of pregnant Women's for giving birth to the most excellent of the children.

"In Bharat, the only and very first Children's University has been established to do the basic work for the overall development of children. Children's University encompasses all the aspects for the overall development of a child right from the womb of the mother to the age an

adult-18 years. In that ,the very important work of education before birth is being carried out by "Tapovan Samshodhan Kendras". In these Tapovan kendres pregnant mothers are given physical, mental, emotional and spiritual guidance" (shah, 2013).

"Tapovan Research Centre is a Beautiful centre for educating pregnant women; it has a beautiful garden and other facilities. A unique place for nurturing best progeny for transforming the society, A centre of development and implementation of deep and the best practices in Garbh-sanskar and Garbh-vignan, A centre for the harmony of family and the expecting mothers, A research-centre for studying the developmental progresses of a child in the womb and the expecting mother's physiological, psychological and affective development" (Thanki, 2013).

The following activities are done in Tapovan Research Center run by Children's University.

<ul style="list-style-type: none">• PRANAYAM/YOGA• PRAYER• GARBHASAMVAD• ART SKILLS/PAININGS• GAMES –INTELLECTUAL/PHYSICAL• READING/DISCUSSION	 <p>Garbhsamskar : Garbhdhyan - Garbh Samvad Harshad P. Shah Children's University</p>
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<p>गर्भसंवाह - गर्भध्यान</p> 	<ul style="list-style-type: none">• Meditation• Showing Film / Video• Prakrtivihar• Sanskrit Reading• Personal Counseling• Group Counseling• Mathematical Puzzles• Storytelling
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Pregnancy is one of the most important periods in a woman's life, as it brings along numerous changes, not only in the physical aspects, but also socially, emotionally, psychologically and spiritually. Fear of unknown, stress, rootless feeling and daily problems associated with physical and hormonal changes can frequently lead to anxiety. Anxiety is a normal response to threat or hazard and part of the usual human experience, but it can become a mental health problem if the response is exaggerated, lasts more than three weeks and interferes with everyday life (Mental Health Foundation, 2007).

A woman's ability to adapt to the changes and challenges of pregnancy is unique and the level of the anxiety she experiences affects the outcome of pregnancy. Almost all studies reported varied prevalence rate from different parts of the world and majority of them explored general anxiety than pregnancy-specific anxiety. Prevalence of high anxiety disorders in pregnant women was found to be undiagnosed and untreated (Hodnett, 2002).

Anxiety and depression in pregnancy have been related with prematurity, low birth weight (Rondo, et al., 2003). In Spain an observational, analytical cross-sectional study among 174 third trimester pregnant women classified as low down, medium and high-risk concluded that pregnant women's anxiety levels were higher than common population and is increased according to pregnancy risk. Prospective study which examined course of maternal anxiety from pregnancy till seven months among hundred Australian pregnant women reported 21% anxiety disorder (Garcia, et al., 2010; Grant, et al., 2008). Anxiety during pregnancy is associated with prematurity, low birth weight and fetal growth restriction which in turn, are risk factors for impaired cognitive and social developmental outcomes (Talge, et al., 2007; Qiao, et al., 2012; Fishell, 2010).

The main aim of this study was to compare two groups of pregnant women participating in a Tapovan research centre, one whose pregnant women involved in Tapovan research centre regularly during pregnancy, the other whose pregnant women did not involved. The comparisons concerned differences in Anxiety during pregnancy.

Objective of this Study:

1. To investigate the main effect of Involvement on Anxiety among involved and not involved Pregnant Women.
2. To investigate the main effect of Education on Anxiety among above and below Education Pregnant Women.
3. To investigate the Interaction effect of Involvement and Education on Anxiety among Pregnant Women.

Hypothesis of This Study:

1. There will be no significant main effect of involvement on Anxiety among Involved and not Involved Pregnant Women.
2. There will be no significant main effect of Education on Anxiety among above and below Graduate Pregnant Women.
3. There will be no significant interaction effect of Involvement and Education on Anxiety among Pregnant Women.

Variables:

The following variables were treated as independent and dependent variable:

- (1) Independent Variables:
 - (I) Involvement of Tpovan Research Centre - Involved and Not Involved
 - (II) Education - Above graduate & Below Graduate
- (2) Dependent Variables: The Score achieved on Anxiety.

Research design:

In Present study to examine the main and interaction effect of two variable i.e.

involvement and education a 2x2 factorial design was used for collecting the data.

Education (B)	Involvement (A)		Total
	Involved (A1)	Not Involved (A2)	
Above Graduate (B1)	(30)	(30)	60
Below Graduate (B2)	(30)	(30)	60
Total	60	60	120

Research Population and Sample:

To make the study worthwhile a representative of the pregnant women resides in the districts of middle part of the Gujarat state were taken. The samples of the study were comprised of 120 pregnant women in various place of Tapovana Research Center of Gujarat. The samples were randomly selected from various location of Gujarat as per the requirement of research design of this study. The sub groups of the sample were distributed as shown in research design of the study.

Tools:

Comprehensive Anxiety Test:

Comprehensive Anxiety Test, Constructed and Standardized by Sinha, A. K. P. and Sinha L. N. K.(1971). The research tool is Sinha's anxiety scale which translated in Gujarati by D. J. Bhatt. Test Re-Test reliability is shown 0.85 and Spearman Brown formula are 0.92. The scale consists of 90 items. The highest possible score of this test is 90 and minimum possible scores are zero (0). Each item of the test is scored 01(one) for positive response and 0(zero) for negative response.

Result and Discussion:

Table: 01: Showing Analysis of Variance for Anxiety in relation to Involvement and Education.

Variable Squares	Sum of Squares	df	Mean Square	F	Significance
Involvement	2412.800	1	2412.800	53.39	0.01
Education	73.633	1	73.633	1.62	NS
Involvement & Education	2.133	1	2.133	0.05	NS
Error	5241.400	116	45.184		
Corrected Total	64758.000	119			

Main Effects:

It could be seen from the Table No. 01 that the one main variables i.e. involvement (F=53.39) are significantly influencing the

Anxiety, while education variable is not found to be significant (F=1.62).

The null hypothesis regarding the Involvement variable can be stated in following manner.

Ho1 There will be no significant main effect of involvement on Anxiety among Involved and not Involved Pregnant Women.

Table 2: Showing Mean Scores on Anxiety with regards to Involvement.

Variables	N	M	'F'	Significant
Involved	60	17.32	53.39	0.01
Not Involved	60	26.28		

It is observed from Table No. 02 that the mean scores of not involved Pregnant women demonstrate high Anxiety (M=26.28) than the involved Pregnant women (M=17.32). In general the two groups have scoring above the median point of 45 for Anxiety. Table No. 01 and 02 reveals that the mean scores of two groups as regards Involvement are differ each other on

Anxiety and these difference are significant at 0.01 level (F=53.39); therefore null hypothesis No.1 is rejected.

The null hypothesis regarding variable of Education can be stated in following manner.
Ho2 There will be no significant main effect of Education on Anxiety among above and below Graduate Pregnant Women.

Table 3: Showing Mean Scores on Anxiety with regards to education.

Variables	N	M	'F'	Significant
Above Graduate	60	16.67	1.62	NS
Below Graduate	60	17.97		

Table No. 03 that the mean scores of below graduate Pregnant women demonstrate high Anxiety (M=17.97) than the above graduate Pregnant women (M=17.47). In general the two groups have scoring above the median point of 45 for Anxiety. Table No. 01 and 03 reveals that the mean scores of two groups as regards Education are not differ each other on Anxiety and these difference are not significant (F=1.62); therefore null hypothesis No.2 is not rejected.

Interaction Effects:

The main effects, significant or insignificant have to be unstated with caution and reconsidered in light of significant interaction of the variables. Here, interaction effects have been discussed under.

The null hypothesis regarding the Involvement and Education variable can be stated in following manner

Ho3 There will be no significant interaction effect of Involvement and Education on Anxiety among Pregnant Women.

Table: 4 Showing Mean Scores on Anxiety as held by Groups Involvement x Education (A x B).

Education	Involvement		'F'	Significant
	Involved	Not Involved		
Above Graduate	16.67	25.37	0.05	NS
Below Graduate	17.97	27.20		

It is evident from Table No. 04 that F ratio ($F=0.05$) is not significant which suggesting that the obtained differences among involvement and education interaction subgroup are not significant. To summaries among A x B interacting groups, the group have high Anxiety is not involved above graduate pregnant women ($M=25.37$) and the group comparatively the low is involved above graduate pregnant women ($M=16.67$) and not involved below graduate pregnant women ($M=27.20$); and involved below graduate pregnant women ($M=17.97$). Table No. 01 and 04 reveals that the mean scores of two groups as regards involvement and education are not differ on anxiety ($F=0.05$); therefore null hypothesis No.3 is not rejected.

Conclusion:

The difference between involved and not involved pregnant women in Tapovan Research centre on Anxiety is significant. The involved pregnant women have Low Anxiety than that of not involved pregnant women in Tapovan Research Center. The difference between above graduate and below graduate pregnant women on Anxiety is found to be not significant. The Interaction effect in relation to involvement & education on Anxiety is found to be not significant.

References:

- Fishell, A. (2010). Depression and Anxiety in Pregnancy. Retrieved From <http://www.ncbi.nlm.nih.gov/pubmed/21041870>
- Garcia, M. A., Rodriguez, A. J., Diez, S. M. & Real, M. C. (2010). Analysis of the relationship between maternal anxiety and pregnancy. *Progresos de Obstetricia y Ginecologia* 53, 273-279.
- Grant, K. A., McMahon, C. & Austin, M. P. (2008). Maternal anxiety during the transition to parenthood: a prospective study. *J. Affect. Disord.* 108, 101-111.
- Hodnett, E.D. (2002). Pain and women's satisfaction with the experience of childbirth: a systematic review. *Am. J. Obstet. Gynecol.* 186, S160- 172.
- Mental Health Foundation. (2007). The fundamental facts: the latest facts and figures on mental health. Retrieved from http://www.mentalhealth.org.uk/content/assets/PDF/publications/fundamental_facts_2007.pdf?view=Standard
- Qiao, Y., Wang, J., Li, J. & Wang, J. (2012). Effects of depressive and anxiety Symptoms during pregnancy on pregnant, obstetric and neonatal Outcomes: A follow-up study. Retrieved from <http://web.b.ebscohost.com/ehost/pdfviewer/pdfviewer?sid=71247550-6c39-4b4e-8715-0996ee29da5%40sessionmgr114&vid=1&hid=117>
- Rondo, P.H., Ferreira, R.F., Nogueira, F., Ribeiro, M.C., Lobert, H. & Artes, R. (2003). Maternal psychological stress and distress as predictors of low birth weight, prematurity and intrauterine growth retardation. *Eur. J. Clin. Nutr.* 57, 266-272.
- Shah, H. P. (2013). Garbhamskar: Garbhdhyan-Garbh Samvad. First edition. Children's university.
- Talge, N. M., Neal, C., & Glover, V. (2007). The Early Stress, Translational Research and Prevention Science Network: fetal and neonatal experience on child and adolescent mental health. Antenatal maternal stress and long-term effects on child neurodevelopment: how and why? Retrieved from <http://onlinelibrary.wiley.com/doi/10.1111/j.14697610.2006.01714>.
- Thanki, J. (2013). Tapovan Counselor Guideline. First edition, Children's University.

