Knowledge, Awareness And Attitude of Antenatal Women Towards Labor Pain And Labor Pain Relief.

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Abstract:

Objective

Epidural labor analgesia has not been fully accepted and is not routinely practiced in most of the centers in India. The aim of this study was to find out the awareness and attitude of pregnant Indian women attending antenatal clinic at tertiary care centre affiliated to medical college towards labor analgesia.

Materials and methods

Two hundred women attending antenatal clinic of hospital were interviewed using a questionnaire that determined their awareness, knowledge and attitude towards labor analgesia.

Results

All participants were between the age of 18 to 35 years. Majority (71%) belonged to lower socioeconomic class. Majority of them (87%) expected that labor is painful. 67% of women strongly believe that it is severe and excruciating. 7.5% of primigravida were unaware of the nature of pains. Few of them (5.5%) felt labor is pain free. 95% of the patients were totally unaware of the concept of labor analgesia.

Conclusion

This study revealed that most of the Indian parturient still suffer from the agony of labor pains due to lack of awareness, lack of availability or knowledge of availability of labor analgesia service. The awareness level needs to be improved. Involvement of the obstetricians is crucial in this education program.

KEYWORDS:

labor analgesia, labor pain

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INTRODUCTION

Natural labor is a painful process.Pain relief management during labor has undergone various advancements since 1847, when Simpson found that chloroform could help relieve the pain women felt during labor. His findings were not received favorably on religious and medical grounds. Childbirth was viewed as a physiological process best managed with as little interference as possible. Several methods for labor analgesia have evolved over the years, but pain relief is still controversial.^{4.} In developed countries the issue is focused on the choice of methods and complications, while in developing countries, the issues revolve around awareness, acceptability and availability of labor analgesia.⁵ In addition to the fear of child birth women may not be aware of the analgesic option for labor.¹⁻³ Culture, ethnic group, age and education may have a strong influence on the attitude towards pain relief in labor.4

Several studies have been conducted worldwide to determine the influence of socioeconomic and obstetric factors on the patient's knowledge and acceptance of the labor analgesia.⁴⁻⁷There is a paucity of such data from the Indian subcontinent, as Indian women still have minimum participation in their pregnancy and healthcare decisions. Number of the patients who demand labor analgesia is very less in spite of service being available. This study thus aims to assess the level of awareness, knowledge and attitude of pregnant women attending antenatal clinic towards labor pain and labor pain relief.

MATERIALS AND METHODS

This study was conducted at a tertiary care centre affiliated to medical college in the Gujarat, India over a calendar month. Two hundred antenatal women attending antenatal clinic of hospital were included in this survey. They were interviewed using a questionnaire that determined their awareness, knowledge and attitude towards labor pain and labor pain relief.

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RESULTS

The demographic data are presented in table no.1 and table no.2

Table 1. Demographic data				
Age	Years	Numbers of patients	Percentage	
	18-25	148	74	
	26-30	46	23	
	31-35	06	03	
	>35	0	0	
Gestational	Weeks	Numbers of	Percentage	
age		patients		
	Up to 12	18	09	
	13-28	68	34	
	>28	114	57	
Gravidity		Numbers of patients	Percentage	
	Primigravida	110	55	
	multigravida	90	45	
Religion		Numbers of patients	Percentage	
	Hindu	172	86	
	Muslim	24	12	
	Others	04	02	

Table 1 : Demographic data

Table 2 : Demographic data

Occupation		Numbers of	Percentage
	Homemaker/	patients 172	86
	unemployed		
	Laborer	06	03
	Teacher	02	01
	Paramedical	02	01
	Others	18	09
Income		Numbers of patients	Percentage
	APL	58	29
	BPL	142	71
Education		Numbers of	Percentage
		patients	
	Illiterate	44	22
	Primary	62	31
	Secondary	50	25
	Higher	32	16
	Secondary		
	Graduation	12	06
Previous	Cesarean	30	15
surgery	section		
	Other surgery	04	02
Geographical distribution	Urban	194	97
	Rural	06	03

All participants were between the age of 18 to 35 years. Majority of them were (74%) between 18-25 years of age. Most of them were Hindus (86%). Majority (71%) belonged to lower socioeconomic class. Around half of them (55%) were primigravida and rest were multigravida patient. Most of them were Homemakers (86%) or unemployed and 14% were employed. Amongst 14%, 3% were laborer, 1% were teachers, 1% were nursing staff and remaining 9% were involved in small business or other.

Awareness of nature of labor pain and attitude towards labor pains is presented in table no.3

Awareness about labor pain	Number of patients	Percentage			
Noidea	15	7.5			
Pain free	11	5.5			
Painful (174)					
Mild	25	12.5			
Moderate	15	7.5			
Severe	134	67			
Should labor pain be relieved ?					
Yes	133	66.5			
No	42	21			
No opinion	25	12.5			

Table 3 : Awareness of nature of labor pain and attitude towards labor pain

All women were assessed for their expectation and experience (in multi gravida patients) about the labor pains. Majority of them (87%) expected that labor is painful. 67% of women strongly believe that it is severe and excruciating. 7.5% of primigravida were unaware of the nature of pains. Very few of them (5.5%) felt labor is pain free because they had not experienced the labor pain as most of them had undergone elective cesarean delivery in last pregnancy. One hundred and thirty three women (66.5%) felt that labor pain should be relieved. Some (21%) felt that labor pain should not be relieved citing following reasons: it is a natural process, to enjoy the experience, without pain one can't become a mother, family members will not agree, may affect the baby etc... Awareness regarding the labor analgesia is presented in table no.4

Awareness	Number of patients	Percentage
Yes	10	5
No	190	95
Source of information(10)		
Media (TV, media, books)	2	20
Doctor	5	50
Friends and relative	3	30

Table 4 : Awareness regarding the labor analgesia

all women were assessed regarding their knowledge and awareness about laboranalgesia. 95% of the patients were totally unaware of the concept of labor analgesia. Out of the 10 women who were aware of labor analgesia 50% had acquired knowledge from their doctors. Other sources of information were media friends and relatives.

DISCUSSION

Majority of participants (87%) were aware that labor is painful. Severe to excruciating pain is experienced by more than half the patients(67%).Pain during labor can be the most intense pain known,¹¹ and most of the respondents obstetrician from the clinical audit study done by Bharti Taneja et al¹² seem to agree to it. Melzack found that over 80% of both primigravida and multigravida found labor pain severe, very severe or excruciating. Melzack and Katz found that pain scores for labor pain in both primigravida and multigravida were greater that the pain score given by patient with chronic back pain, post herpetic neuralgia and phantom limb pain.⁸ Uterine contraction, cervical dilatation and stretching of the lower uterine segment are responsible for the pain during first stage of labor. Visceral afferent C-type fibers accompanying the sympathetic nerves carry the pain impulses and enter the spinal cord at the T10-L1 levels. In the second stage of labor, somatic afferent fibers from the vagina and perineum convey pain impulses in the pudendal nerves to the S2 to S4 spinal nerve roots. $^{9\cdot10}$ To many it is simply inhuman to let the parturient suffer from this intense pain when efficient and safe methods of painless labor are available.

We have conducted interview by a questionnaire format in 200 antenatal women, to assess awareness and attitude towards labor pain and labor pain relief. An increasing number of women worldwide are opting for epidural analgesia as a pain management strategy during labor, but in our study we found that only 10 women (05%) were aware of the availability of pain relief during labor; when the primary information regarding painless labor was given, 133 women (66.5%) agreed that pain during the labor should be relieved, 42 women (21%) were in favor of tolerating labor pain citing reasons pertaining to religious, social and cultural belief.

25 women (12.5%) failed to opine whether it should be relieved or not. The incidence of awareness and acceptance of labor analgesia from Nigeria (27, 57.6% respectively) ⁵ and Lagos (38.9, 65.3% respectively) ¹⁴ differ from the Australian study (98, 80% respectively).¹This discrepancy in the level of the awareness and acceptance could be attributed to the fact that childbirth is still viewed as physiological process in most of the developing countries, which is managed with as little interference as possible. Women do not know that labor pain can be relieved. Creating awareness by giving proper and full information regarding painless labor would surely improve the acceptance level among the parturient. William WK also had similar results in their study.¹³ In our study Out of ten women who were aware about painless labor, two were paramedical staff, two were teachers, one was family member of nursing staff and others were housewives. Half of them acquired knowledge of labor analgesia from their doctors. Most of our patients were from lower socioeconomic class and not educated. Very few were aware regarding the painless labor.

CONCLUSION

This study revealed that most of the Indian parturient still suffer from the agony of labor pains due to lack of awareness, lack of availability or knowledge of availability of labor analgesia service. Antenatal women should be educated about the physiology of labor, labor pain and pain relief and available options for labor pain relief. This may be done at an appropriate time during the antenatal visits by obstetrician or anesthetist. The pregnant women's knowledge may also be improved by the provision of information leaflets, labor pain websites and childbirth preparation classes, but obstetrician has a crucial role in awareness program. So all obstetrician in collaboration with anesthesia department must be trained for painless labor during their residency training program with satisfactory exposure.

REFERENCES

1. Henry A, Nand SL. Women's antenatal knowledge and plans regarding intrapartum pain management at the Royal Hospital for women. Aus N Z J ObstetGynaecol 2004; 44:314-7

- 2. Lavender T. WalkinshawSA,Walton I. A prospective study of women's views of factors contributing to a positive birth experience. Midwifery 1999;15:40-60
- 3. Leap N.Pain in labor: Toward a midwifery perspective Midwifery Dig 2000;10:49-53
- 4. MugambeJM,Nel M, Hiemstra LA, Steinberg WJ. Knowledge and attitude toward pain relief during labor of women attending the antenatal clinic of Cecilia Makiwan Hospital, South Africa. SA FamPract 2007;49:16-24.
- Olayemi O, Aimakhu CO, Udoh ES. Attitude of patients to obstetric analgesia at the university college hospital, Idaban, Nigeria. J ObstetGynaecol 2003;23:38-40.
- 6. Hueston WJ, McClaflin RR, Mansfield CJ, Rudy M. Factors associated with the use of intrapartum epidural analgesia. ObstetGynecol 1994;84:579-82
- 7. Ochroch EA, Truxel AB, Frogel JK, Farror IT, The influence of race and socioeconomic factors on patient acceptance of perioperative epidural analgesia. AnesthAnalg 2007;105:1787-92.
- 8. Melzack R, Katz J, Pain measurement in persons in pain. In: wall PD, Melzack R, editor. Textbook of pain. Edinburgh: Churchiu Livingstone 1999 P 337-51.

- 9. Findley I, Chamberlain G.ABC of labor care. Relief of pain. BMJ 1999;318:927-30.
- FerneRB,Barbara MS, Cynthia AW, Alan CS. Obstetrical Anasthesia. In: Paul GB (editor). Clinical Anasthesia,6th ed. New Delhi: Wolters Kluwer (India) Pvt. Ltd;2009.p.1142-5.
- 11. Melzack R. Labor is still painful after prepared childbirth training. Can Med Assoc J 1981; 125:357.
- 12. Bharti Taneja, KirtiNath, Dua CK. Clinical audit on the existing attitudes and knowledge of obstetricians regarding labor analgesia. Indian J. Anaesth.2004; 48(3) 185-188.
- William WK. Quality Assurance Subcommittee in Obstetrics and Gynecology, H.A., Hong Kong., A questionnaire survey on patient's attitudes towards epidural analgesia in labor. Hong Kong Med.J.2007; 13 (3):208-215.
- 14. Okeke CI, Merah NA, Cole SU, Osibogun A. Knowledge and perception of obstetric analgesia among prospective parturients at Lagos University Teaching Hospital. Niger Postgrad Med J 2005; 12:258-61.