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A Study on Early Hysterectomy: Justification and Consequences.

KEYWORDS: Hysterectomy, Conservative management, Ethical practice

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ABSTRACT *Introduction: Hysterectomy is the most commonly performed major surgery in gynecology. According to literature, hysterectomy is to be done to save life, relieve suffering and to correct deformity. However, according to reports, hysterectomies are being performed for unwarranted reasons. In the state of Andhrapradesh alone, around 10,334 hysterectomies were performed during the year 2008-09. Methods: All the women who underwent hysterectomy for benign conditions before the age of 40years and attending the OPD at a tertiary referral hospital during a two year period from july 2009 to june 2011 were recruited, consented and relevant data collected. Results: A total of 150 women were studied. Many of the women were married before the legal age for marriage in India (18years) and the mean number of children ever born per woman who had hysterectomy is 2.8. The average age at which hysterectomies were performed in the study group was 28.6 years. 58% of the sample had hysterectomies before the age of 30 years. Majority of them are illiterate, belonging to low SE status. An overwhelming majority of the women got the surgeries done in government hospitals through abdominal route and the most common indication being white discharge followed by fibroid uterus. It is apparent that a high (40%) percentage of women were subjected to removal of ovaries and in fact, 68% of the women are ignorant about the exact nature of the surgery. Only 12% were advised regarding alternate management. In 14% of hysterectomy specimens no pathologic lesion was found. About 52% women presented with multiple symptoms, the most common being bone pain, accounting for about 24% presenting between 10-15 years after hysterectomy. Conclusion: Although many alternate options of medical management and conservative surgeries are available, hysterectomy is still commonly performed procedure even in developed countries. While awareness has to come among women that hysterectomy is not a solution to all their problems, doctors need to adhere to ethical practice.*

Introduction:
Hysterectomy is the most commonly performed gynecological surgical procedure. In 2003, over 600,000 hysterectomies were performed in the United States alone, of which over 90% were performed for benign conditions. Such rates being highest in the industrialized world has led to the major controversy that hysterectomies are being largely performed for unwarranted and unnecessary reasons.

It is the treatment for various gynecological disorders. The present day safety of operative procedures coupled with the safety of anesthesia has made this operation more frequent. The advent of blood transfusion (1940) has drastically reduced the mortality rate of this operation. The developments in pharmacology in terms of antibiotics have also contributed towards the safety of this procedure. Thus hysterectomy has become a safe procedure in present day gynecological practice, to a large extent. Yet there are pit falls in terms of mortality and morbidity, though it has been reduced to a large extent.

In the past twenty years there has been definite tendency to use total abdominal hysterectomy more often than subtotal abdominal hysterectomy. There is also a marked increase in vaginal hysterectomy. However with developments in the field of radiotherapy and chemotherapy there has been a fall in the number of radical hysterectomies done for the treatment of carcinoma cervix. But 90% of hysterectomy patients opt for the surgery for noncancerous, non-life-threatening—and some would say unnecessary—reasons. Today, twice as many women in their 20s and 30s undergo hysterectomy as do women in their 50s and 60s.

Hysterectomy Educational Resources and Services (HERS) Foundation says there are also economic reasons to curb the use of hysterectomy and estimates that $17 billion would be saved annually if doctors stopped performing the procedure unnecessarily.

Women who reach menopausal stage prematurely or suddenly due to the surgical removal of uterus and ovaries suffer more distressing symptoms. This stage requires care and attention by the husband and other family members of the woman, besides her gynecologist to keep her in good mental and physical health. Supervision by the gynecologist will save her from a number of health problems and risks. This will also give an insight into the health status of her husband, which may otherwise be neglected.

Most women start suffering from one or more unwelcome symptoms which are by and large divided into vasomotor, genitourinary, cardiovascular, psychological symptoms.

Aim:
The aim of the study is to analyze the complications of early hysterectomy (before 40 years of age) and to determine the time interval between hysterectomy and appearance of complications & to investigate its effect on menopausal symptoms.

Materials and Methods:
Study Group:
All the women who underwent hysterectomy for benign conditions before the age of 40years and attending the Gynaecology clinic at Alluri Sitarama Raju Academy of Medical Sciences(ASRAM), Eluru during a two year period from july 2009 to june 2011 were recruited, consented and relevant data collected.

Volume : 4 | Issue : 6 | June 2014 | ISSN - 2249-555X

Methods:
The relevant data regarding information of socio demographic data, reproductive health profile, age at hysterectomy, indication of hysterectomy, complications of hysterectomy and other related data was collected.

Exclusion criteria:
Women on psychiatric drugs
Women with malignancies
Caesarean/ Post partum hysterectomies

Study design:
Observational study.

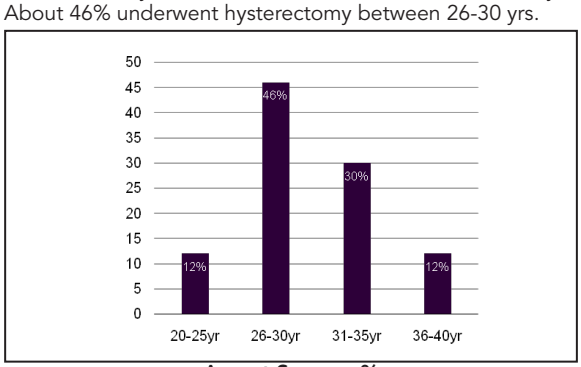
Statistical analysis:
Statistical analysis of the study was performed using standard statistical software SPSS.

Results:
A total of 150 women met our inclusion criteria and were studied.

Table 1: Age at hysterectomy

Age at hysterectomy	Number
20-25 yrs	18
26-30 yrs	69
31-35 yrs	45
36-40 yrs	18
Total	150

Most of the hysterectomies were done between 26-30 yrs. About 46% underwent hysterectomy between 26-30 yrs.

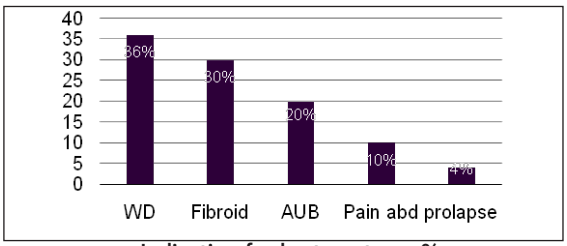


Age at Surgery %

Table 2: Indication for hysterectomy

Indication	Number
White Discharge	54
Fibroids	45
AUB	30
Pain abdomen	15
Prolapse	6
Total	150

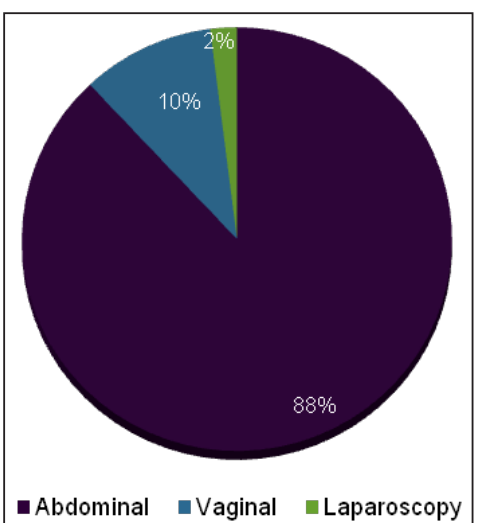
The most common indication for hysterectomy is white discharge, accounting for about 36%. Next common indication is fibroids (30%)



Indication for hysterectomy %

Table 3: Route of hysterectomy

Route of hysterectomy	Number
Abdominal	132
Vaginal	15
Laparoscopy	3
Total	150



Route of hysterectomy %

Table 4: Post operative complications

complications	Number
Bone Pain	36
Ovarian Cyst	9
Pain Abdomen	6
White Discharge	6
Vault Prolapse	6
Urinary Incontinence	6
Dyspareunia	3
Multiple symptoms	78
Total	150

The most common post operative complication is bone pain, accounting for about 24%. About 52 patients presented with more than 1 symptom.

Volume : 4 | Issue : 6 | June 2014 | ISSN - 2249-555X

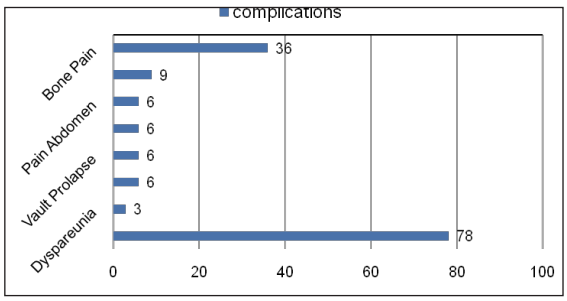


Table 5: Duration from hysterectomy to appearance of complications

Duration	Number
<5 yrs	24
6-10 yrs	30
11-20 yrs	45
>20 yrs	51
Total	150

About 24 cases developed complications within 5 years of duration of hysterectomy, 51 cases developed complications after 20 years of hysterectomy.

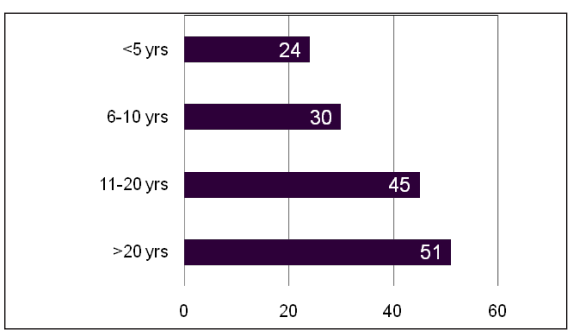


Table 6: Symptoms

complication	<5yr	6-10yr	11-20yr	>20yr	Number
Bone Pain	7	7	12	10	36
Ovarian Cyst	1	1	3	4	9
Pain Abdomen	2	3	1	0	6
White Discharge	3	1	2	0	6
Vault Prolapse	0	0	0	6	6
Urinary Incontinence	0	3	0	3	6
Dyspareunia	0	1	2	0	3
Multiple symptoms	11	14	25	28	78
Total	24	30	45	51	150

72 patients presented with only one symptom. Out of these, 36 patients presented with bone pain, 9 patients with ovarian cyst and 6 patients with pain abdomen. 78 patients presented with more than one symptom. Out of these, 14 patients presented with bone pain and irritability, 13 patients presented with pain abdomen, hot flashes, irritability.

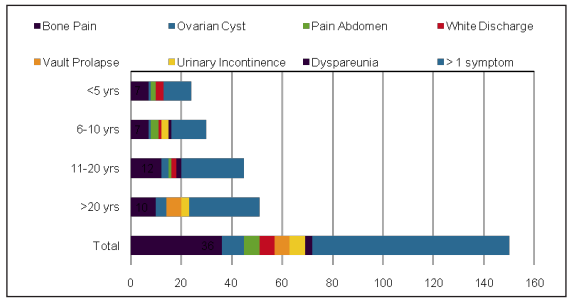


Table 7: Socio economic status

class	number
High	3
Middle	36
Low	111
Total	150

In our study most of the patients, belong to low socio economic status (74%)

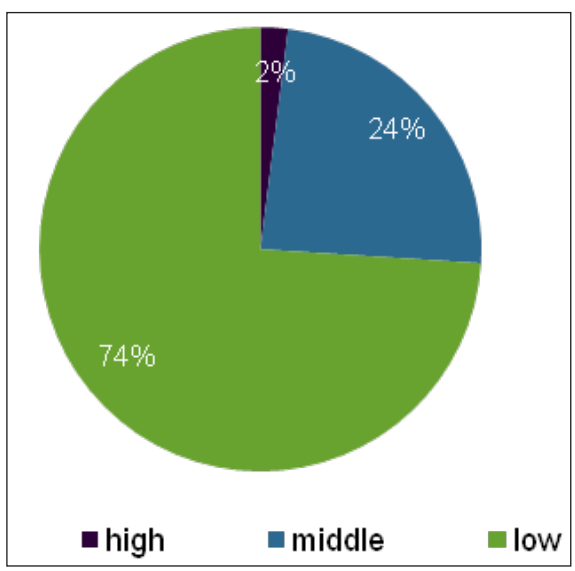


Table 8: Educational status

Education	Number
None	90
Primary	48
Secondary	9
Graduate	3
Total	150

Most of the patients (60%) are illiterates and about 32% had primary education.

Volume : 4 | Issue : 6 | June 2014 | ISSN - 2249-555X

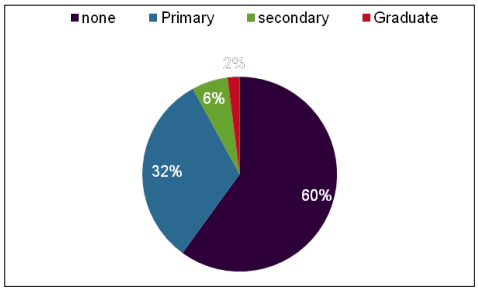


Table 9: Parity of the study population

Parity	Number
Nulliparous	3
Primipara	16
2 children	59
> 2 children	72

Multipara were more (88%) compared to primipara and nulliparous.

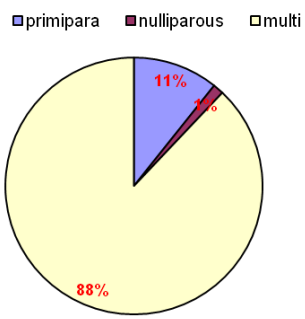


Table 10: Place of surgery

Place of Surgery	Number
Government sector	93
Private	57
Total	150

Most of the hysterectomies (62%) are done at government hospitals, as most of the patients belong to low socio economic status and most of them are illiterates.

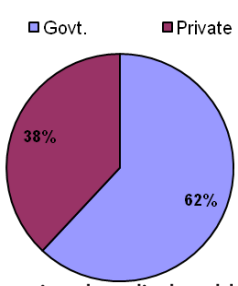


Table 11: With associated medical problems

Medical disorder	Number
Diabetes & Hypertension	27
Diabetes	8
Hypertension	6
others	9
No associated disorder	90
Total	150

27 patients were having both diabetes and hypertension, 8 patients are diabetic, 6 patients are having hypertension. These problems are age related rather than with hysterectomy. 90 cases not associated with any problem.

Table 12: Ovarian status

ovarian status	Number
Removed	15
Retained	33
Not Known	102

As most of the patients are illiterates, 68% don't know regarding their ovarian status. By USG, we could know that ovaries are not removed in 60% of cases

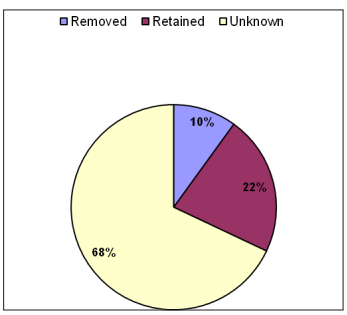


Table 13: Advised alternate treatment

Alternate treatment	Number
Advised	18
Not advised	132
Total	150

Only 12% were advised regarding alternate treatment. Remaining patients were not aware of alternate treatment.

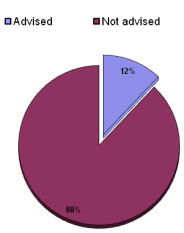
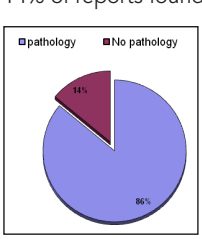


Table14: Histopathology

Uterine changes	49
cervical changes	53
others	27
No pathology	21
Total	150

14% of reports found no pathologic lesion.

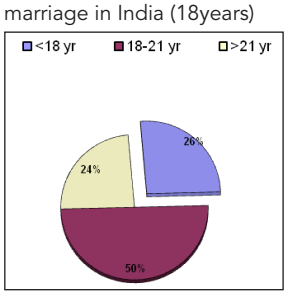


Volume : 4 | Issue : 6 | June 2014 | ISSN - 2249-555X

Table 15: Age at marriage

Age	Number
< 18 yrs	39
18-21	75
>21	36
Total	150

26% of the women were married before the legal age for marriage in India (18years)



DISCUSSION:

The subject of this is to analyze the complications of early hysterectomy (before 40 years).All the women who underwent hysterectomy for benign conditions before the age of 40years and attending the Gynaecology clinic at Alluri Sitarama Raju Academy of Medical Sciences(ASRAM), Eluru during a two year period from july 2009 to june 2011 were recruited, consented and relevant data regarding information of socio demographic data, reproductive health profile, age at hysterectomy, indication of hysterectomy, complications of hysterectomy and other related data was collected.

According to the study by Ikram et al., 2008, Pakistan & Shahida Aktar (2004) Pakistan; the most common indication is fibroid uterus compared to white discharge in my study. The most common route being the abdominal as in other studies like Wu JM, Wechter ME et al., (2003) US & Lewisce et al., (2003) US . At present the route of hysterectomy is mostly dependent upon institutional trends, personal preference, experience and expertise of the operator with different approaches. Only a small number of surgeons are equally competent in performing hysterectomy by all routes, and most are comfortable with one route only.

We see that the HERS study compared to the Chompoot study shows a very high prevalence in hot flushes (57% v/s 23%) compared to 38% in our study. This could be due to the difference in the study population taken, which include ages between 35 to 47 years and 40 to 55 years in the two studies respectively.

Possibly, as shown by these results itself, the woman's acclimatization of the body system as she ages, to the decreasing estrogen level could be responsible for decreasing vasomotor symptoms in the advanced age. However, we cannot conclude these findings in the present study, as this would require a long term longitudinal analysis and follow up methodology, instead of a cross sectional-one time survey. In addition to providing a base line result, the present study also opens the doors for long-term longitudinal studies on our population.

In my present study, the most common complication is bone pain as compared to HERS (Hysterectomy Educational Resources and Services) (2002) US. Hence early calcium and vitamin supplementation are important and should be fundamental part of any programme intended to prevent bone loss and osteoporosis. The percentage of vault prolapse(8%) is more in my study, when compared to HERS study(5.5%), as most of the hysterectomies are done before 40 years. Because of this there is estrogen deficiency, musculature atrophy which leads to vault prolapse. In my present study, the percentage of pain abdomen is 4% compared to HERS study (34.1%)

Conclusion:

As per my study, when hysterectomy is done in early age groups (before 40 years), they carry more risk of developing premature menopause and its complications. The most common indication for hysterectomy being white discharge, followed by fibroid.Most of the patients developed symptoms after 20 years of hysterectomy with the most common complication being bone pain.

The knowledge gained from this analysis, is "doing hysterectomy procedure at early age" may not be justified. This study shows that there are several adverse effects of hysterectomy in patients who underwent hysterectomy before 40 years, suggesting that alternate medical treatment should be considered for common indications such as fibroids, white discharge and hysterectomy should be advised , only if medical or minor surgical procedures fail.

This study requires a long term longitudinal analysis and follow up methodology, instead of a cross sectional-one time survey. In addition to providing a base line result, the present study also opens the doors for long-term longitudinal studies on our population.

While awareness has to come among women that hysterectomy is not a solution to all their problems, doctors need to adhere to ethical practice.

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