Original Article

Emergency Obstetrical Hysterectomy (One Yr Review) at Nishtar Hospital Multan

1. Shaista Anjum 2. Muhammad Sajjad Masood 3. Mehreen Badar

1. WMO, Obs. & Gynae 2. SMO, Obs. & Gynae 3. PG Student, Obs. & Gynae Unit-I, NMC/H, Multan

ABSTRACT

Objective: The objective was to study the cases of obstetrical hysterectomy in one year period in the teaching hospital and to determine incidence, indications and maternal outcome of the patients and suggesting ways to improve outcome.

Study Design: Observational retrospective study.

Place and Duration of Study: This study was conducted at Nishtar Hospital Multan from Feb 2011 to Feb 2012.

Materials and Methods: One year observational retrospective study of 71 consecutive cases of obstetrical hysterectomies performed during study period (i.e. from Feb 2011 to Feb 2012) in Nishtar Hospital Multan were analyzed.

Results: Total number of deliveries conducted during study period were 10406 and 71 obstetrical hysterectomies were undertaken. Frequency of obstetrical hysterectomies being 0.68% and booked cases 39.43%. The most common cause of procedures were morbid adherence of the placenta, uterine atony and uterine rupture. Total hysterectomies were 57.74% and subtotal were 42.25%. Number of maternal deaths were 12.6%. Patients who died were in critical condition with massive blood loss, late arrival , dai handling and non availability of blood beacase of uncooperative attendants and malpractices of doing caesarean sections at peripheries without any indication.These were main factors for maternal mortality.

Conclusion: Emergency obstetrical hysterctomy remains essential life saving procedure especially for high risk cases. Proper antenatal care, early admission in labour ward, proper resuscitation and in time refferal, increase favour of normal deliveries and reduced caesarean section rates will go long way to reduce the incidence of this procedure.

Key Words: Emergency obstetric hysterectomy, postpartum haemorrhage, Caesareans section.

INTRODUCTION

Postpartum hemorrhage according to WHO causes 25% maternal deaths[1]**.** The most common cause of maternal mortality is hemorrhage[2,3]. Obstetrical hysterectomy is a life saving procedure in obstetrical hemorrhage and it is considered "near miss" event[4]. Obstetrical hysterectomy was first attempted 200 years ago as surgical attempt to manage the hemorrhage and infections[5]. In the last few decades, uncontroled hemorrhage has become a major indicative factor. Causes such as uterine atony, placenta previa, and ruptured uterus vary from area to area and influenced by standards of practice and quality of antanatal care[6,7]**.** Obstetrical hysterectomy is more common in developing countries like ours because of high incidence of unbooked and improperly supervised deliveries outside the hospital. One of the main indications of obstetrical hysterectomies is high incidence of caesarean sections. Sometimes patients present delayed in hospitals which makes obstetrical hysterectomies to be associated with high maternofetal morbidity and mortality[8,9]. The purpose of the present study was to determine frequency, indications and maternal outcome of obstetrical hysterectomies and suggestion of some ways to improve the outcome.

MATERIALS AND METHODS

This study was conducted in the Nishtar Hospital Multan over a period of one year i.e. form February 2011 to February 2012. Patients were identified from all three units. Record was taken from labour ward registers and operation registers. Results analysed were according to age , parity, social status, previous history of caesarean section, mode of delivery, indications for obstetrical hysterctomy and maternal morbidity and mortality. All data were evaluated and analysed by using SPSS 10.

RESULTS

During one year period 10406 deliveries including 4997 caesarean sections and 5409 vaginal deliveries were conducted. Frequency of obstetrical hysterectomy was 0.68%. After caesarean section frequency of obstetrical hysterectomy was 1.42% and after vaginal deliveries frequency of hysterectomies was found to be 1.31%. Majority of the patients (43.66%) fall in 30-35 years age group. 36.61% of th patients were multiparous with parity >5 (Table 1). Out of 71 patients 37 patients were delivered by caesarean section and 34 (47.88%) patients were delivered vaginaly. Highest rate was found in unbooked cases (43 patients) and it was 60.56%. Booking status matters alot in incidence of obstetrical hysterectomies (Table 2). Morbid adherence of placenta

was most common cause of obstetrical hysterectomies (25.35%) and incidence of morbid adherence was increased because of increase in the rate of caesarean sections.

Table No.1: Demographic features of the patients undergoing obstetrical hysterectomy (n=71)

Age(yrs)	Number	Percentage
15-25	5	7.04%
26-30	18	25.35%
30-35	31	43.66%
>35	17	23.94%
Parity		
0	6	8.45%
1-2	16	22.53%
3-4	23	32.39%
>5	26	36.61%
Booking status		
Booked	28	39.43%
Unbooked	43	60.56%

Table No.2: Number of previous caesarean deliveries, mode of delivery and type of obstetrical hysterectomy (n=71)

Number of previous caesarean deliveries	Number	Percentage
1	18	25.35%
2	16	22.53%
3	22	30.98%
4	15	21.12%
Mode of delivery		
Vaginal delivery	34	47.88%
Caesarean delivery	37	52.11%
Type of hysterectomy		
Total	41	57.74%
Subtotal	30	42.25%

Table No.3: Causes of haemorrhage in women undergoing emergency obstetrical hysterectomy. (n=71)

Causes	Number	Percentage
Morbid adherence of placenta	18	25.35%
Placenta previa	17	23.94%
Uterine atony	13	18.30%
Rupture uterus	12	16.90%
Abruption	4	5.63%
Other causes	7	9.85%

Out of 71 cases of obstetrical hysterectomies (17) 23.94% were due to placenta previa, 13 cases (18.3%) were due to uterine atony, 8 cases were after vaginal deliveries. Five cases of uterine atony were after caesarean sections. Two interesting cases were seen during study: One patient was operated due to previous 1 caesarean section. She was also a patient of chronic myeloid leukemia. She bled a lot on the operation table. Her obstetrical hysterectomy was done due to uterine atony but she didn't survive. She died after one day due to underlying qualitative platelet defect. Second patient was with fibroid uterus who also bled heavily on operation table but survived after obstetrical hysterectomy. Complications were rare in the study because most of the hysterectomies were done by the consultants. Complications seen during the study were anemia, sepsis, 21 cases were reported due to disturbed clotting profile. Maternal mortality Rate was 11.26%. 8 patients died due to severe hemorrhage. So the well known causes of obstetrical hysterectomies were morbid adherence and placenta previa.

DISCUSSION

The frequency of obstetrical hysterectomy in the present study was 0.68%. It is very high comparative to study done in Bahawalpur. Reported rate of emergency obstetrical hysterectomies in developed countries is very low(0.4/1000-0.2/1000) deliveries[10].

Difference in the incidence may be explained by unbooked cases for antenatal care and mostly reffered patients with detrimental health conditions. Majority of the patients(43.6%) were 30-35 years old and were multiparous. It is similar to the study of Berclay and Ahmad[11-12].

The most frequent indication for emergency obstetrical hysterectomy(EOH) in the present study was morbid adherence of placenta i.e. 25.35% and 23.94% hysterctomies were due to placenta previa. Almost similar results were generated by other studies done in different hospitals of Pakistan1[13-16].

Abnormal placentation has emerged as an important etiological factor since the last two decades and reported worldwide as well as in the third world countries. Well known risk factors are morbid adherence of placenta, placenta previa and previous caesarean births[10].

Obsterical hysterctomy is a life saving procedure for morbid adherence of placenta. Subtotal hysterectomies were done during studies. Although it is superior due to low degree of hemorrhage and speedy procedure but it has certain problems such as cyclical discharge, spotting and cervical carcinoma due to cervical stump remanent. It is not effective in placenta accreta and increta because of excessive bleeding from uterine artery but in our study it was probably surgeons's decision regarding situation whether to go for total or subtotal hysterectomy.

Our study also confirm the previous observation that obstetrical hysterectomy is associated with perinatal mortality and morbidity and post operative complications were anemia and sepsis[8,9].

Maternal deaths in this study were mostly in unbooked and refer cases because of their delayed arrival and lack of antenatal care and in most of the patients death occurred due to hypovolemic shock. Maternal mortality

in our study was 12.6 which is very high comparatively to developed countries[9].

CONCLUSION

EOH helps in reducing maternal mortality rate. High risk patients should receive proper antenatal care after booking. Vginal deliveries should be conducted by trained persons and caesarean sections should be done by qualified persons. By this we can reduce the caesarean section rate. Increase in maternal mortality is due to malpractice by mobile surgeons and unqualified persons in the obstetrics. They are doing unnecessary caesarean sections in peripheries and this practice should be snubbed.

REFERENCES

1. Abouzahr C. Antepartum and postpartum haemorrhage. In: Murray CJ, Lopez AD, editors. Health Dimensions of Sex and Reproduction. Boston, Mass: Harvard University Press; 1998.p. 172-4.
2. Fikree FF, Midhet F, Sadruddin S, Berendes HW. Maternal mortality in different Pakistani sites: ratios, clinical causes and determinants. Acta Obstet Gynecol Scand 1997; 76: 637-45.
3. Begum S, Aziz-un-Nisa, Begum I. Analysis of maternal mortality in a tertiary care hospital to determine causes and preventable factors. J Ayub Med Coll Abottabad 2003;15:49–52.
4. Knight M, Peripartum hysterctomy in UK. Management and outcome associated with hemorrhage. BJOG 2007;114:1380-7.
5. Devi PKP, Singh NN, Singh TD. Emergency obstetric Hysterectomy (A study of 26 cases over a period of 5 years). J obstet Gynecol Ind 2004, 54:343-45.
6. Gupta U, Ganeesh K. Emergency hysterectomy in obstetrics: review of 15 years. J Obstet-Gynaecol (Asia-Oceania) 1994;20:1-5.
7. Onwuudiegwu U, Okonofua F. Emergency obstetric hysterectomy in a semi-urban hospital. Nig Med J 1993;2(2):54-7.
8. Udoma E, John M, Etuk S, Ekanem A. Mortality following emergency obstetric hysterectomy in Calabar, Nigeria. Nig J of Med Prac 2003; 66:52-5.
9. Guwa-Osagie D, Uguru V, Akinla O. Mortality and morbidity of emergency obstetric hysterectomy. J Obstet Gynaecol 1983; 4:94-6.
10. Choi SJ, Song SE, Jung KL, Oh SY, Kim JH, Roh CR. Antepartum risk factors associated with peripartum cesarean hysterectomy in women with placenta previa. Am J Perinatol 2008;25(1):37-41.
11. Ahmad SN, Mir IH, Emergency Peripartum Hysterectomy: Experience at Apex Hospital of Kashmir Valley. Internet J Gynecol Obstet 2007;8.
12. Barclay DL, Hawkins BL, Freuh DM. Elective Cesarean Hysterectomy. A five years comparison with cesarean section: Am J Obstet Gynecol 1976; 124:900-93.
13. Mahmood S, Ayaz A. Obstetrical hysterectomy. J Sur Pak 2005;10(3):20-3.
14. Noor S, Majid S, Ruby N. An audit of obstetrical hysterectomy. J Coll Physicians Surg Pak 2001; 11(10):642-5.
15. Bashir A, Ashraf R, Gul A, Tajamul A. Peripartum hysterectomy. Ann King Edward Coll. 2007;13: 111-2.
16. Najmi RS. Caesarean and postpartum hysterectomy - a study from lahore. J Coll Physicians Surg Pak 1994;4:120–5.

Address for Corresponding Author:
Dr. Muhammad Sajjad Masood
House No 80, Lane No 4,
Askaria Colony Sher Shah Road Multan
Telephone No: 03338400603
Email: drsajjad131@yahoo.com