

Pregnancy with Uncontrolled Seizure and Multiple Congenital Anomalies: A Case Report (Multidimensional Nursing Care Report)

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Abstract

A 27 years old primigravidae of 20 weeks' gestation with previous history of seizure and on antiepileptic, diagnosed with uncontrolled seizure and multiple congenital anomaly of the fetus was planned for termination of pregnancy. After termination patient and family members were counselled to cope the situation as well as planning further pregnancy. Follow up was continued by collaboration of Neurology and Obstetrics and Gynaecology department.

Keywords: AED; WWE; monotherapy.

Introduction

Among several medical conditions in pregnancy epilepsy is one of the most important neurological conditions existing in a prevalence of 0.5-1% [1] all over the world. Women with epilepsy (WWE) on continuous management by antiepileptic drugs (AED) have 90% chance of having uneventful pregnancy with normal baby [1]. Several studies revealed that there is 5% chance of having baby with major malformations in WWE who are taking AEDs where the chances reduced to 2-3% in WWEs who are not taking AEDs [2]. This risk is further reducing in case of monotherapy with folic acid supplementation. In 50% cases there is no any changes in the occurrence of seizures whereas chances of reducing and worsening of seizures is 25% each [2].

Case Report

A 27 years old housewife primi-gravidae of

20 weeks' spontaneous gestation came to OPD with complaints of multiple episodes of generalized tonic clonic seizure (sometimes unresponsive staring) without any history of febrile seizures, CNS infections, head injury, status epilepticus, or skin lesions and consanguineous marriage or any hereditary disease in family. Patient is suffering from seizure disorder (MRI (brain) report a year ago: gliotic foci in right superior parietal lobule) since last 8 years and is on: Levetiracetam 1.5g BD, Zonisamide 100 mg BD, Lacosamide 200 mg BD, Carbamazepine 300 mg BD and Folic acid 5 mg OD orally. In spite of taking medicines she had several episodes of seizures during pregnancy. One day she had a fall facing down which hurts on her abdomen. Level II ultrasonography revealed multiple congenital anomalies in fetus. Her duration of marriage life is 8 months and did not uses any contraceptives.

She was on folic acid since preconception period till date. Iron and calcium supplementation were started at 12 weeks. She completed 2 doses of

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tetanus toxoid. Nausea and vomiting were the only minor ailments (self-limiting). No any significant weight gain noted during pregnancy. Haemoglobin 9 g/dl, RBS 78 mg/dl, ABO- B+^{ve} and VDRL- non-reactive (23/04/2018).

On general assessment vital signs and BMI were normal, but excessive sleepiness was present. Blackish discoloration noticed around left eye due to fall at home. Nutritional status was satisfactory and no signs of dehydration, uterus 18-20 weeks' size, fetal heart rate is not audible.

Termination of pregnancy was planned as USG report shows: lower limb abnormality (? Club foot), upper limb abnormality (?club hand/ contractures), NFT grossly increased, subcutaneous edema seen in fetal head and neck and absent kidney. For MTP tab. Misoprostol 200 mg given orally on 28/08/18 followed by continuous infusion of inj. Oxytocin 20 I.U in 500 ml of NS 6-8 drops/ min followed by dilatation and curettage. On 29/08/18 conceptus was expelled out completely with the placenta and membranes. Tab Taxim- O BD was started prophylactically for 10 days and followed up in Neurology department.

Nursing care Considerations

Since the mother was with multiple problems and needs related to pregnancy and other issues, it was critical for the nursing team to decide upon about nursing care consideration. The main goal of the team was to bring out mother and family members out of the agony related to the outcomes of pregnancy and related health issues. Based on the Roy's adaptation theory, we tried to address the need of mother in daily care and bringing the psychological balance. Relatives are thoroughly counselled about the risk of having of malformed fetus in subsequent pregnancy and the importance of karyotyping of this fetus for future planning of pregnancy. But they refused to do karyotyping and also to take the fetus with them. Team tried to exemplify the other mothers with similar issues and reality orientation techniques. In addition, mother and family was addressed with holistic approach and comprehensive care. At the time of discharge, it was happy moment for the team of nurses to see the mother smiling and leaving the ward.

Discussion

According to Indian guidelines on epilepsy AEDs must be continued in pregnancy and screening should be advised for fetal malformations

(serum alpha fetoprotein at 16 weeks, detailed ultrasound scanning by an experienced radiologist at 18 weeks). If preterm labor is threatened in women taking enzyme-inducing AEDs, 48 mg betamethasone (double the normal dose) should be given over 48 hours [2]. Women who used AEDs chose to terminate pregnancy more often than women who did not use. But studies showed that proportion of induced abortions because of fetal abnormalities was almost equal in the exposed and unexposed group (0.5% and 0.3%) [3]. Borthen and Co-workers in a hospital based retrospective study in Norway, 2006 found that the mothers with active epilepsy commonly had preterm birth. In contrary pregnancy complications were not increased in the group with epilepsy and no AED treatment [4]. Several studies have revealed that seizures may have an effect on the heart of the fetus during pregnancy and delivery, and it is found that seizures could also affect the size of the baby. Recent studies indicated that seizures in pregnancy may be of importance for cognition. Status epilepticus is rare, but there are occasional reports of foetal deaths and malformations after SE in AED-treated women. Animal studies stipulated that there can be specific sequelae of seizures on neurodevelopment. Whether pregnant WWE have increased mortality is not clear. As seizures at delivery are rare, and epilepsy is not, per se an indication for caesarean section. Careful planning may decrease the risk of seizures during pregnancy [5].

Conclusion

From this case it can be concluded that there is a relationship between intake of antiepileptic by the mother and fetal malformation. To prevent this type of cases a proper health education regarding pregnancy planning and risk assessment is necessary. Also, close monitoring is required throughout the pregnancy.

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