

Poster Number: EP 296 Name: Dr Vinayak Ranbhare, Dr Prema Kania Title: Pump Up the Progesterone? Can progesterone use increase the meningioma growth in pregnancy





INTRODUCTION

Introduction-Meningiomas comprise 18% of primary intracranial tumours and are twice as common in females. Pregnancy can reveal an undiagnosed intracranial tumour.

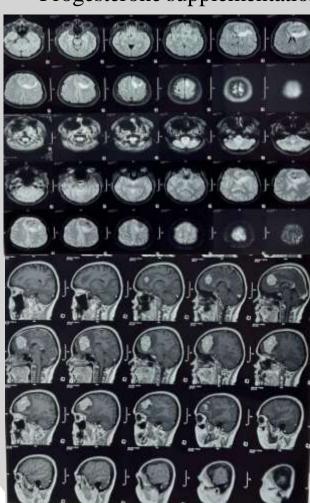
Meningiomas, though benign, are influenced by progesterone and steroids, potentially increasing growth and symptomatic burden. This case illustrates the possible link and increased suspicion of a meningioma in women with history of prolonged progesterone exposure.

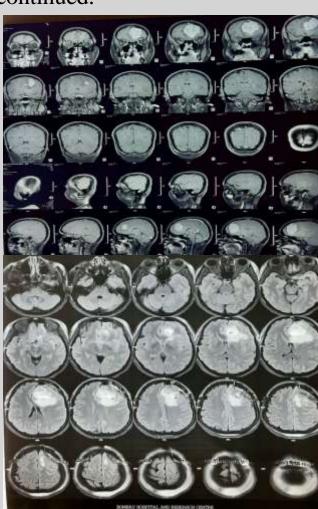
CASE DESCRIPTION

- A 36-year-old G2P1L1 with prior LSCS presented at 14+4 weeks gestation with recurrent GTCS episodes (5–8 minutes each).
- Patient had a history of headaches for a few days followed by three episodes of GTCS at 14 weeks of gestation.
- Following this, the patient was shifted to the hospital and managed in the ICU with anticonvulsants. After stabilization, an MRI was done.
- First conception via IVF and caesarean was done for fetal distress. Current pregnancy is spontaneous conception.
- Pateint was on DMPA contraceptives for 2 years and also antenatal progesterone was given in both pregnancies.
- After stabilization patient was started on levetiracetam. Mannitol and dexamethasone.
- Shifted to our hospital for further management. Patient had no repeat seizures.
- MRI and Ultrasonography were done and the patient co-managed with neurosurgery.

MANAGEMENT

- MRI revealed a 5.7×4.5 cm SOL in the left frontal cortex, causing lateral ventricle effacement.
- USG s/o single live fetus 14.4 wks EFW 100 gm, FHR 130/min. Placenta along left lateral wall screening doppler shows high PI.
- The patient was started on progesterone support.
- The patient underwent meningioma excision with progesterone support and achieved favourable neurological and obstetric recovery.
- Tocolytics were started post-surgery.
- Progesterone supplementation continued.





DISCUSSION

- Meningiomas are more common in women than in men, particularly in middle-aged women. women between the ages of 35 and 54 years have a higher chance of developing meningioma.
- Clinical evidence suggests that sex steroids play a role in the growth of meningiomas; these include the clear female predominance (female/male ratio 2:1), and the reported rapid growth during pregnancy.
- Rapid growth is also seen in women who receive oral contraceptives or hormone replacement therapy.
- The progesterone receptor (PR) expression is found in variable and often very high-rate meningiomas whereas the estrogen receptor (ER) expression is lower than 10% and often undetectable.
- While surgical resection of meningioma during pregnancy may be associated with increased maternal and fetal mortalities the overall neurosurgical, obstetrical and neonatological outcomes, as well as many clinical characteristics, are similar to patients undergoing resection postpartum.
- The mother's health and well-being should always be paramount in guiding management

CONCLUSION

Mother's health and well-being should always be paramount in guiding management surgical management needed for worsening maternal condition.

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