CONCLUSION

Pregnancy in women with acromegaly is generally safe with tumoral and hormonal stability. Treatment interruption at pregnancy confirmation has proven to be safe. This case highlights the fact that medical therapy with octreotide LAR should be considered in a pregnant patient with significant headache. Short-acting somatostatin analogue can be initiated together with long-acting somatostatin analogue to get immediate effects.

PP-17

FUNCTIONING VAGAL PARAGANGLIOMA

https://doi.org/10.15605/jafes.036.S43

LA Lim[1] and Subashini Rajoo[2]

[1]*Department of Medicine and Endocrinology, Penang General Hospital, Penang, Malaysia*

[2]*Department of Medicine and Endocrinology, Hospital Kuala Lumpur, Wilayah Persekutuan, Malaysia*

INTRODUCTION

Paragangliomas (PGLs) are rare neuroendocrine tumors arising from sympathetic or parasympathetic paraganglia, which can be sporadic or familial. Sympathetic PGLs are almost always functional (clinically active) while parasympathetic PGLs are usually not. Parasympathetic PGLs usually arise in four distinct areas: carotid body, vagus, middle ear, and larynx. Herein, we report a case of functional vagal paraganglioma and discuss its management.

RESULTS

A 49-year-old female presented with a painless neck swelling, which was gradually increasing in size over the past 4 years. She sought medical advice after experiencing episodic headache along with palpitation and 10kg weight loss over a 2-month period. She had a noticeable right sided neck swelling, and labile blood pressure. Further evaluation revealed elevated 24 hour urine noradrenaline and an metaiodobenzylguanidine (MIBG)-avid right neck mass. Following a diagnosis of functioning neck paraganglioma, phenoxybenzamine and carvedilol were initiated two weeks prior to surgery. She underwent embolization followed a day later by surgical excision of the tumor with vagus nerve reconstruction. Intraoperatively, a short period of sodium nitroprusside infusion was required during manipulation of the tumor. Postoperatively, a brief period of inotropic support was required. Histologic examination of the excised mass revealed a paraganglioma with a low proliferative index (Ki 67 <5%). She was well and normotensive upon discharge.

CONCLUSION

Paraganglioma is a rare and curable cause of hypertension. Preoperative preparation with alpha-blocking with or without beta-blocking agents together with volume expansion are crucial before surgical resection. This case highlighted the importance of a multidisciplinary team involvement in every aspect of the patient's care in order to have an adequate decision-making process.

PP-18

BIOENHANCED TOCOTRIENOL-RICH VITAMIN E (TOCOVID) IMPROVES NERVE CONDUCTION VELOCITY IN PATIENTS WITH TYPE 2 DIABETES MELLITUS: PHASE II DOUBLE-BLIND, RANDOMIZED CONTROLLED CLINICAL TRIAL

https://doi.org/10.15605/jafes.036.S44

Pei Fen Chuar, Yeek Tat Ng, Sonia Chew Wen Phang, Yan Yi Koay, J-Ian Ho, Loon Shin Ho, Nevein Philip Botross Henien, Badariah Ahmad, Khalid Abdul Kadir

Jeffrey Cheah School of Medicine and Health Sciences, Monash University Malaysia, Selangor, Malaysia

INTRODUCTION

This study aims to investigate the effects of bioenhanced tocotrienol-rich vitamin E (Tocovid SuprabioTM) on nerve conduction parameters and serum biomarkers among patients with type 2 diabetes mellitus.

METHODOLOGY

Eighty-eight patients were randomized to receive 200 mg of tocotrienol-rich vitamin E (Tocovid) twice daily or matching placebo for 12 months. Nerve conduction parameters, vitamin E levels and serum biomarkers were measured at 2, 6 and 12 months.

RESULTS

After 12 months, patients in the Tocovid group showed highly significant improvement in conduction velocity (CV) of both median and sural sensory nerves compared to placebo. The between intervention group differences (treatment effect) in CV were 1.60 m/s (95% CI: 0.70, 2.40, p=0.007) for median nerve and 1.97 m/s (95% CI: 1.10, 3.45, p=0.036) for sural nerve. Significant improvement in CV was only observed up to six months in tibial motor nerve CV, 1.30 m/s (95% CI: 0.60, 2.20, p<0.001). There were no significant changes in transforming growth factor beta-1 (TGFÎ²-1) and vascular endothelial growth factor A (VEGF-A). After six months of washout, there were no significant differences from baseline between groups in all nerve conduction parameters of all three nerves.

CONCLUSION
Tocovid at 200 mg twice a day significantly improved median and sural sensory nerve CV at 12 months but improvement in tibial motor nerve CV was only observed up to six months. All improvements diminished after six months of washout.

PP-19

ANDROGEN PRODUCING TUMOUR: UTILISING OVARIAN AND ADRENAL VENOUS SAMPLING

https://doi.org/10.15605/jafes.036.S45

Nur Aini Ew,[1,2] Goh Kg,[1] Azraai B N[1]
[1]*Department on Medicine, Hospital Putrajaya, Malaysia*
[2]*Endocrine Unit, Department of Internal Medicine, Faculty of Medicine, Universiti Teknologi MARA (UiTM), Malaysia*

INTRODUCTION
Androgen-secreting tumour (AST) is rare, with a prevalence of 0.2% among women with hirsutism. Ovarian and adrenal venous sampling (OAVS) is useful in localising the tumour but has low success rate. We reported a case of ovarian AST with successful cannulation of all 4 veins.

RESULTS
A 26-year-old woman presented with secondary amenorrhoea, hirsutism and voice deepening for 5 years. She did not have Cushing syndrome, or manifestations related to hyperprolactinemia or congenital adrenal hyperplasia. Her family history was unremarkable. On examination, blood pressure was 112/75 mmHg, heart rate 82/min, weight 73 kg, and BMI 25.8 kg/m^2. She has a feminine body habitus with Ferriman-Gallwey score of 17. She has no clitoromegaly. Serum testosterone was 14x the upper limit of normal at 28.87 nmol/L. The following serum hormonal tests were all within normal: TSH 1.194 mU/L, fT4 12.0 pmol/L (7-14.4), prolactin 310 µU/mL, LH 5.8 mU/mL, FSH 6.8 mU/mL, oestradiol 247 pmol/L, Dehydroepiandrostenedione-sulphate (DHEAS) 5.9 µmol/L. Free androgen index was 48 (4x ULN for female). AST of the ovary was suspected. MRI of the adrenal glands and pelvis revealed a heterogeneous enhancement of the left ovary, slightly larger than the right, and normal adrenal glands. All 4 veins were successfully cannulated during OAVS. The increased testosterone secretion was lateralised to the left ovary, consistent with the MRI, with lateralization ratio of 7.9 and 4.4.

DISCUSSION
A very high testosterone level should raise suspicion of AST. Testosterone >3 nmol/L has a sensitivity of 100% and specificity of 53% in detecting AST. Some reported values >5.2 nmol/L with convincing history. DHEAS level of >18.9 mmol/L strongly suggests adrenal origin. OAVS is useful in cases of small ovarian AST that could not be excluded from biochemical and imaging studies. However, it is a difficult and highly demanding procedure. A central-to-peripheral oestradiol ratio of >2 confirms successful ovarian vein catheterisation. An ovarian vein testosterone gradient of >1.44 confirms lateralization (1).

CONCLUSION
A very high serum testosterone should raise suspicion of AST. OAVS, although difficult, is useful in localising the tumour.

PP-20

PRIMARY HYPOPHYSITIS WITH HYPOPITUITARISM IMPROVING WITH HIGH DOSE STEROIDS

https://doi.org/10.15605/jafes.036.S46

Xin-Yi Ooi,[1] LL Lim,[2] QH Lim,[2] SR DB Vethakkan,[2] J Ratnasingam,[2] L Ibrahim,[2] SS Paramasivam[2]
[1]*Endocrine Unit, Medical Department Hospital Kuala Lumpur, Wilayah Persekutuan, Malaysia*
[2]*Endocrine Unit, Medical Department University Malaya Medical Centre, Malaysia*

INTRODUCTION
A 39-year-old female presented with an 8-month history of severe headaches, amenorrhea for 6 months, increased thirst and weight loss. She consulted a neurologist for migraine and was subsequently referred to an endocrinologist when her MRI showed a pituitary lesion. There was no visual impairment.

RESULTS
Investigations on admission:
Free T4 11.7 pmol/L (11.5-22.7)
TSH 0.11 mIU/L (0.55-4.78)
IGF-1 267 ng/ml (63.4-223)
ACTH <5 pg/ml
AM cortisol <14 nmol/L
LH <0.1IU/L(0.5-16.9)
FSH 2.8IU/L (1.5-9.1)
Estradiol 75 pmol/L (205-786)
Prolactin 511 mIU/L (59-619)