

Clinical Biochemistry Department Investigation of Menopausal Symptoms

PF-PIP-51

GUIDELINES FOR HORMONE MEASUREMENTS IN WOMEN WITH SECONDARY AMENORRHOEA AND/OR MENOPAUSAL SYMPTOMS

WOMEN OVER 45 YEARS

FSH/LH (or oestradiol) is not indicated if menopausal symptoms are present

The best indication for the need for HRT in these women is menopausal symptoms (a symptom scoring system may be used). FSH levels may fluctuate markedly during the menopausal transition and it would be inappropriate to rule out a trial of HRT on the basis of a random FSH falling within 'normal range'.

FSH/LH levels may be useful if equivocal menopausal symptoms (i.e. menstruation is fairly regular and vasomotor symptoms are absent)

With regular cycles, measure FSH in the follicular phase (days 1 to 7 of cycle)

FSH may be raised up to 25 U/L in the midcycle surge and may be suppressed in the luteal phase by progesterone.

With irregular cycles, measure FSH at the time of menses

WOMEN UNDER 45 YEARS

FSH/LH indicated unless on oestrogen containing oral contraceptive pill

Oral contraceptives containing an oestrogen will suppress FSH levels (up to 80% in postmenopausal women). The pill should be discontinued for 6-8 weeks before blood tests. The progesterone-only pill has much less suppressive effect on LH/FSH.

Prolactin and Thyroid Function Tests are indicated

Other causes of symptoms, especially in women with regular cycles should be considered

Total Testosterone indicated if hirsute

The principal reason for measuring testosterone is to rule out an adrenal/ovarian tumour. Testosterone levels may be normal in PCOS.

WOMEN UNDER 45 YEARS - HAD A HYSTERECTOMY WITH OVARIAN PRESERVATION

Monitor FSH levels annually

These women may be at greater risk of premature menopause and since they have lost an important biological marker of menopausal transition, it is recommended that FSH is monitored as a measure of ovarian failure.²

REFERENCES

Gow SM, Turner EI, Glasier A. The clinical biochemistry of the menopause and hormone replacement therapy. *Ann Clin Biochem* 1994; **31**: 509-528

Scottish Clinical Resource and Audit Group Consensus Statement. In: *Hormone replacement therapy - A critical review of current practice and the way ahead* 1993; The Scottish Office, Edinburgh: 7-25.