



Common BHRTs and Delivery Systems

Bi-Estrogen (Bi-Est)

- Contains 2 estrogens: Estradiol (E2) 20%-30% and Estriol (E3) 70%-80%
- It is unnecessary to provide estrone as a part because of the existing interactivity of estradiol and estrone and the fact that most estrone is produced as a woman gets older
- Bi-Est is taken just as one would take tri-est and is *always balanced with progesterone*

Tri-Estrogen (Tri-Est)

- A combination formula of the 3 types of estrogen - Estrone (E1), Estradiol (E2), and Estriol (E3) in a 1:1.8 ratio (this ratio represents the average amounts of circulating estrogen in a 35 year old woman)
- This balances estradiol and estrone, the estrogens with the more powerful and stimulating effects, with the weaker but more potentially protective estriol
- It is attempting to get the benefits of all three estrogens while minimizing possible cancer risks
- Even though Tri-Est is safer than estradiol alone, standard protocol is to take it with progesterone, for balance and for even more fibrocystic growth/cancer protection

Delivery Systems

Oral	⇒	Capsules: sustained release capsules and oil-filled
Sublingual	⇒	Troche or liquids
Topical	⇒	Cream or gels
Vaginal	⇒	Suppositories or creams

- Creams are more widely used in the U.S.
- When using a lotion to deliver hormones through the skin, your body fat acts as a storage depot for time release of the hormones into your blood stream.
- Hormone levels do not peak or fall to the degree that they would with pill use, they stay steady throughout the day and night
- Apply to fatty parts of the body where the product can be easily absorbed over a period of time: lower abdomen, lower back, thighs, buttocks, etc.
- Typical dose is 1.25mL to 2.5 mL twice a day

Androgens

- Offered as part primary therapy, or commonly,
- Adjunct therapy for libidinal/energy issues
- In 0.5-2% for topical administration
- Often short-term therapy
- May be given as DHEA 5mg PO QD
- 0.8gm 14 day trial dose/3.5 gm 1st month