

UC SANTA BARBARA Student Health Service

Estrogen and Testosterone-Blocker Information

Estrogen and testosterone blockers are used to reduce testosterone-related features and induce estrogen-related features to make you feel more at ease in your body.

You must know what to expect from taking estrogen and testosterone-blockers including physical and emotional changes, side effects, and potential risks. The use of estrogen and testosterone blockers to treat gender dysphoria is not FDA-approved. Long-term medical effects and safety are not fully known and some potential risks are serious.

Each person responds differently to taking estrogen and testosterone-blockers and the amount of change varies from person to person. Estrogen is available in several forms including oral (pill), topical (patch), and injections. Spironolactone pills are the most common testosterone blocker used.

Estrogen and Testosterone Blocker-related effects

Estrogen and lower testosterone-related changes may include:	Expected onset	Expected maximum effect	Effect
Breast development	3-6 months	2-3 Years	Permanent
Smaller genitals (testes)	3-6 months	2-3 years	Permanent
Decreased scalp hair loss (balding)	1-3 months	1-2 years	Reversible
Decreased fertility	Variable	Variable	Possibly Permanent
Decreased muscle mass and strength	3-6 months	1-2 years	Reversible
Fat redistribution; possible weight gain or loss	3-6 months	2-5 years	Reversible
Mood changes	Variable	Variable	Reversible
Changes to sex drive, sexual interests, or sexual function	Variable	Variable	Reversible
Skin changes including softening and decreased oil	1-6 months	unknown	Reversible
Decrease growth of body & facial hair	3-6 months	1-2 years	Reversible

Benefits may include:

- decreased discomfort related to gender
- increased success in work, school, and relationships
- increased comfort in your body
- improved mental health

Potential Risks	Probability
Increased risk of blood clots, pulmonary embolism (blood clot in the lung), stroke or heart attack Gallstones	Likely increased risk
Changes in cholesterol may increase the risk for pancreatitis, heart attack or stroke Liver inflammation Nausea Headaches Harassment	Possible increased risk
Diabetes Heart and circulation problems (cardiovascular disease) Increased blood pressure Increased potassium which can lead to heart arrhythmias (irregular heartbeat) if using spironolactone Changes to kidney function, if using spironolactone Breast cancer Increased prolactin and the possibility of benign pituitary tumor	Possible increased risk if additional risk factors

Risks for some of these conditions may be affected by:

- Pre-existing physical or mental health conditions
- Cigarette smoking or other substance use
- Family history of health conditions
- Nutrition, exercise, stress

Fertility

Estrogen and testosterone blockers will likely decrease the amount of fluid ejaculated, but it is not an effective contraception. If you have sex with a person who can become pregnant, birth control is necessary. If you think that you may want to cause a pregnancy in the future, talk to your care provider about your options before you start estrogen and/or testosterone blockers.

Alternatives to estrogen and testosterone blockers

You can achieve some changes to your body by using cosmetic products. Another way to change your body is to have surgery. You can discuss other options that you would like to try with your clinician.

You can choose to stop taking estrogen and testosterone blockers at any time.