

## Progesterone – An Amazing Hormone

**Sheila Allison, MD**

Management of abnormal PAP smears and HPV is changing rapidly as new research information is available. This is often confusing for physicians and patients alike. I would like to explain and hopefully clarify this information.

Almost all abnormal PAP smears and cervical cancers are caused by the HPV virus. This means that cervical cancer is a sexually transmitted cancer. HPV stands for Human Papilloma Virus. This is a virus that is sexually transmitted and that about 80% of sexually active women are exposed to. The only way to absolutely avoid exposure is to never be sexually active or only have intercourse with someone who has not had intercourse with anyone else.

Because most women become sexually active in their late teens and early 20s, this is when most exposures occur. We do not have medication to eradicate viruses (when you have a cold, you treat the symptoms and wait for the virus to run its course). Most women will eliminate the virus if they have a healthy immune system and it is then of no consequence.

There are over 100 subtypes of the HPV virus. Most are what we call low-risk viruses. These are associated with genital warts and are rarely responsible for abnormal cells and cancer. Two of these subtypes are included in the vaccine that is now recommended prior to initiating sexual activity.

Few women who see me for hormone management will leave without a progesterone prescription. As a matter of fact, I have several patients who are not on any estrogen but are on progesterone exclusively. The importance of this hormone is not often recognized and I wanted to clarify the reasons it is essential to my practice of hormone management.

Regarding the normal menstrual cycle, estrogen predominates the first two weeks of a 28 day cycle, a dominant egg emerges and ovulation occurs after which time progesterone predominates. If fertilization does not occur, all hormones levels fall, the lining of the uterus is sloughed in the form of a menstrual period and the cycle repeats itself.

Important to note in the above cycle is that progesterone does not occur until ovulation and that the maintenance of its levels is important for the continuation of a successful pregnancy. This fact is key in infertility evaluations as the levels of progesterone are tested to determine ovulation and the ability to support a pregnancy.

At the time approaching menopause, known as perimenopause, cycles become unpredictable, primarily because ovulation becomes inconsistent. This inconsistency results not only in irregular bleeding but many other symptoms commonly occurring during this stage in a woman's life. Irritability, foggy thinking, poor quality of sleep, depression, breast tenderness, bloating and weight gain are complaints routinely heard in my office.

Many of these complaints are secondary to progesterone deficiency. Make note of some of the benefits of progesterone:

- Balances cell growth caused by estrogen in the breasts and uterus
- Protects against breast cysts
- Protects against uterine cancer
- Protects against breast cancer
- Stimulates bone growth
- Helps use fat stores for energy
- Natural anti-depressant
- Improves quality of sleep
- Decreased PMS symptoms
- Helps with proper thyroid function
- Improves libido
- Natural diuretic
- Essential for progression of normal pregnancy
- Normalizes blood clotting
- Normalizes blood sugar levels

Please make note that I am referring to natural not synthetic progesterone. Synthetic progesterone, known as progestins or gestagens, is what is in oral contraceptives as well as in many products developed for hormonal replacement therapy. These compounds have been altered molecularly and do not function in the human body the same way as natural progesterone. An example of the difference is the fact that these compounds may be harmful to a developing fetus if exposed whereas levels of progesterone are never higher than during pregnancy. It is essential for its continuation, exposing the fetus daily with no deleterious affects!

Progesterone and estrogen are manufactured together by the human body. That is because they support one another resulting in both hormones functioning more efficiently. For us to ignore this fact when considering hormone management results in imbalance and less than optimal results.

For reasons I have been unable to understand, progesterone is available without prescription. Consequently, many women are using over-the-counter progesterone products without supervision. In addition, because of its skin “plumping” abilities, progesterone is added to many antiaging products. (The FDA does not require that all ingredients be listed on a product if it is below a certain amount.)

As noted elsewhere in my website, hormone testing in my practice is primarily done using saliva. This enables me to verify hormonal imbalances and treat accordingly. The great majority of women self-medicating with progesterone cream test out of normal range. High progesterone levels are abnormal and indicate a hormone imbalance. Also, many of these women test out of range because of antiaging products. In any case, this is hormone imbalance of another kind resulting in suboptimal therapeutic results.

My point is that while no one loves progesterone and its usage possibilities more than I, management of dose and delivery system is at least as important as any other hormone. Many of the commercial products do not even have a dose amount on the package and patients come to me not knowing how much they are exposed to or what their levels are. Since progesterone is the precursor for testosterone, estrogen and cortisol, improper dosing can affect other hormones as well! Respect for this hormone matrix results in optimal balance.

The bottom line is that progesterone is essential for hormone balance. It is often the only hormone that a woman needs however it should be prescribed and monitored judiciously. Understanding the web of hormone synthesis and prescribing accordingly will ensure the best possible results.



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Dr. Allison believes the more women are educated about health issues, the more they can practice preventive health care. She has written articles on gynecology, menopause, sexual dysfunction, and other health issues for local newspapers.