

Semen Cryopreservation

Women's Endocrine Clinic
ART/Andrology Laboratory

(608) 265-0300

The ART/Andrology Lab will analyze, freeze and store semen specimens for all patients requiring this service. The following information may be helpful to both patients and healthcare providers.

Patients will need to see a Reproductive Endocrinologist for a consult prior to the first semen cryopreservation. The information covered in the consult includes: alternatives to cryopreservation, the process for cryopreserving semen, and the most effective use of limited cryopreserved sperm.

This initial consult and first freeze appointment can be made by calling (608) 265-0300 and selecting the option to speak with the nurse (option 2).

Semen should be collected in a sterile specimen collection container. The container must be labeled with patient name, medical record number, birth date and time and date of collection. It is recommended that there be a minimum of 48 hours, and a maximum of 7 days, of abstinence before collecting the specimen. The lab should receive the semen within 30 minutes of collection to avoid compromising the integrity of the specimen. The specimen can be collected at the Women's Endocrine Clinic on H4/6 or may be collected at a place where the patient feels most comfortable. If collected outside the hospital, extremes in temperature should be avoided by keeping the specimen as close to the body temperature as possible (i.e. inside clothing). The patient must be registered with UW Hospital prior to receipt of the first specimen.

A semen analysis will be performed prior to freezing the first specimen. A test thaw will be performed the next day. The patient will be called with the results of the test thaw and a plan for further cryopreservation set. The ART/Andrology Laboratory will then store the frozen semen for up to 3 years at which time arrangements for long-term storage at a commercial cryobank will need to be made by the patient. The ART/Andrology Lab has information on commercial cryobanks if needed.

Semen Cryopreservation Costs:

Physician consult	\$300
Infectious disease testing	\$800-\$1,000
Semen cryopreservation	\$365 per ejaculate (storage not included).
Test thaw	\$80 (automatically performed on 1 st semen freeze unless otherwise specified by the ordering physician)
Semen storage fee	\$25/month (\$300/year)
Sample charge:	
	Semen cryopreservation \$365
	Test thaw \$ 80
	12 months storage <u>\$300</u>
	<u>\$745</u>

Patients may store semen at UWHC for up to three (3) years. Thereafter the semen will be destroyed unless other arrangements have been made.

These charges are estimates only as of 12/04 and are subject to change

3/25/2005

Cryopreserved Semen

When counseling your patients about semen collection and preservation for use after chemotherapy, there are some points that may be useful. The following information will help provide a better understanding of the process of cryopreservation, and the chances for conception and successful pregnancy.

Using frozen semen from a donor (specifically recruited donors are chosen for superior semen quality), the chance of a pregnancy is about 12% per cycle. Most healthy men do not have donor quality semen. Men who are ill often have more compromised semen than healthy men. During cryopreservation of semen, all specimens are damaged and their quality is reduced when they are thawed for use.

Because of frozen/thawed semen having diminished fertility capacity, a greater number of insemination cycles are usually necessary to attain pregnancy. For this reason, it is better to have a greater number of semen samples obtained and preserved. If time permits, a minimum of five ejaculates is suggested. Depending on the volume and quality of the sample, two to four insemination aliquots can be obtained from each ejaculate. A specimen can be produced every other day prior to chemotherapy. The sooner the idea of cryopreservation is presented to the patient, the more chances there are for collection prior to beginning chemotherapy or radiation therapy.

With semen of very poor quality, or when there is time for storage of only a limited number of specimens, the patient should be counseled that his best chances for achieving pregnancy will be through In Vitro Fertilization with Intracytoplasmic Sperm Injection. This involves giving the female partner fertility drugs to stimulate multiple egg production. These eggs are fertilized by injecting a single sperm into each egg, followed by transfer of the resultant embryos. Fertilization rates are 75-80%, and pregnancy rates are 20-50%. The cost of the procedure is approximately \$17,000 per attempt. However, when quantity and quality of sperm are an issue, this method offers results that are superior to artificial insemination.

UWHC does not have a long-term storage facility for semen. UWHC will freeze specimens for patients facing chemotherapy. Specimens will only be kept for 3 years. At the end of 3 years, or at any time before that, the patient must have his specimen shipped to a long-term storage facility.

You may obtain further information about cryopreservation by calling the Women's Endocrine Clinic at 265-0300.

Fertility Options for Women Following Chemotherapy

In counseling young women facing chemotherapy, there are some points to include. At the present time it is not possible to freeze ovarian tissue well enough for it to be functional when thawed.

Embryos can be frozen and used for future attempts at pregnancy, but eggs cannot. However, to do one cycle of ovarian stimulation to produce multiple eggs in one cycle requires about 4 weeks time. If the woman does not have a partner, an anonymous sperm donor would need to be selected and the donor sperm used to fertilize the egg. The resulting embryos would be frozen. This option requires considerable time and planning.

Women whose ovaries are iatrogenically destroyed can be informed that, at present, their best option for future pregnancy is to use an egg donor (known or anonymous). Her partner's sperm, or sperm from a donor, can be used to fertilize the donor egg. This is a frequently used Assisted Reproductive Technology procedure with a pregnancy rate of about 50%. It does involve the absence of the woman's genetic component in the embryos, but does allow her to carry a pregnancy. If a hysterectomy has been performed as part of the therapy, a third party can be used to carry the pregnancy.

We hope that this information will be helpful to you and your patients. Please do not hesitate to call the Women's Endocrine Clinic at (608) 265-0300 if you would like further information about these issues.

UWHC Andrology and IVF Laboratory

Fee schedule for cryopreservation and storage of semen
(Note: Prices effective July 1, 2004 and are subject to change without notice)

Patient Semen:

Consult with physician \$ 300

Sexually transmitted disease screens (blood) \$1,000

Semen cryopreservation = \$365.00 per ejaculate (storage not included)

Test thaw = \$80.00 (automatically performed on 1st semen freeze unless otherwise specified by the ordering physician)

Semen storage fee = \$25.00/month (\$300.00/ year)
(billed monthly, starting on the 1st of the month following cryopreservation)

Sample Charge:	Semen Cryopreservation	\$365.00
	Test Thaw	\$ 80.00
	12 months storage	<u>\$300.00</u>
		\$745.00

Patients may store semen at UWHC for up to three (3) years. Thereafter the semen will be destroyed unless other arrangements have been made.

The above prices are estimates only as for December 2004.