**Deciphering Infertility Terminology and Abbreviations**

***Recurrent Pregnancy Loss/RPL -***

A term referring to a condition where a woman has had three or more miscarriages without a live birth. Most women will be recommended for RPL evaluation after a second miscarriage.

***Missed AB –***

An abortion where the fetus dies in the uterus but there is no bleeding or cramping. A D&C or medical management will be needed to remove the fetal remains and prevent complications.

***ACTH-***
A hormone produced by the pituitary gland to stimulate the adrenal glands. Excessive levels may lead to fertility problems.

***Adhesion-***
Scar tissue occurring in the abdominal cavity, fallopian tubes, or inside the uterus. Adhesions can interfere with transport of the egg and implantation of the embryo in the uterus.

***Adrenal Androgens-***
Male hormones produced by the adrenal gland which, when found in excess, may lead to fertility problems in both men and women. Excess androgens in the woman may lead to the formation of male secondary sex characteristics and the suppression of LH and FSH production by the pituitary gland. Elevated levels of androgens may be found in women with polycystic ovaries, or with a tumor in the pituitary gland, adrenal gland, or ovary. May also be associated with excess prolactin levels.

***Amenorrhea-***
Refers to the absence of a period.

***Androgens-***
Male sex hormones.

***Andrologist-***A scientist who specializes in the study of male reproduction and performs laboratory evaluations of male fertility. May hold a Ph.D. degree instead of a M.D. Usually affiliated with a fertility treatment center that performs in vitro fertilization.

***Aneuploidy-***Refers to a condition in which an abnormal number of chromosomes are found. There may be missing or extra chromosomes present.

***Anovulation-***A condition in which a woman does not release mature eggs on a regular basis for fertilization. Menses may still occur.

***Antiperm Antibodie-***
Antibodies are produced by the immune system to fight off foreign substances, like bacteria. Antisperm antibodies attach themselves to sperm and inhibit movement and their ability to fertilize.

***Artificial Insemination (AI) or Intrauterine Insemination (IUI)-***A procedure in which sperm are introduced into a woman's uterus through clinical means instead of through sexual intercourse to increase the likelihood that sperm will reach and fertilize an egg. Artificial insemination, also called "intrauterine insemination" (IUI).

***Asherman's Syndrome:***A condition where the uterine walls adhere to one another. Usually caused by uterine inflammation from prior uterine surgery, infection, or retained placenta.

***Assisted Hatching (AH)-***An in vitro procedure in which the zona pellucida (a protective outer shell) of an embryo (usually at eight-cell stage or a blastocyst) is perforated creating a small hole by chemical, mechanical, or laser-assisted methods to assist separation of the blastocyst from the zona pellucida.

***Assisted Reproductive Technology (ART)-***Medical treatments aimed at helping couples with fertility obstacles conceive and give birth to healthy children. In vitro fertilization, intracytoplasmic sperm injection, and assisted hatching are examples of fertility treatments used to help couples begin successful pregnancies.

***Asthenozoospermia-***Low sperm motility.

***Azoopermia-***The absence of sperm in the seminal fluid, usually caused by a blockage or an impairment of sperm production.

***Basal Body Temperature (BBT)-***
The body temperature of a woman, immediately upon awakening, before any activity. When the temperature is recorded daily on a graph, a jump in temperature (about 0.5oF) may be evidence of ovulation. A drop in temperature may be evidence of the onset of menses or a miscarriage.

***Beta hCG Test (BhCG)-***
A blood test to determine pregnancy, it gives a positive reading if human chorionic gonadotropin (hCG) is present.

***Bicornuate Uterus-***
A congenital malformation of the uterus where the upper portion (horn) is duplicated.

***Blastocyst (Blast)-***
An embryo with a fluid-filled blastocele cavity (usually developing by five or six days after fertilization).

***Blighted Ovum (egg)-***A fertilized egg that implants in the uterus, but does not develop further and dies.

***Cancellation-***
Stimulated cycles stopped following initiation of medication and prior to egg retrieval or IUI if there is an inadequate response to medication.

***Cervical Mucus-***
Secretions produced by the cervix. The thickness of the mucus varies according to the phase of the menstrual cycle. In the days just before ovulation, the mucus becomes thin and watery and is easily penetrable by sperm.

***Cervical Stenosis-***
A blockage of the cervical canal from a congenital defect or from complications of surgical procedures.

***Cervix-***The lower section and opening of the uterus that protrudes into the vagina. Sperm pass through the cervix into the uterus following intercourse. It dilates during labor to allow the passage of the infant.

***Cervix, Incompetent-***
A weakened cervix, which opens up prematurely during pregnancy and can cause the loss of the fetus. A cervical cerclage is a procedure in which a stitch or two is put around the cervix to prevent its opening until removed when the pregnancy is to term.

***Chromosome-***
The structures in the cell that carry the genetic material (genes); the genetic messengers of inheritance. The human has forty-six chromosomes, twenty-three coming from the egg and twenty-three coming from the sperm.

***Clinical Pregnancy-***
Ultrasound evidence of pregnancy with at least a gestational sac visualized in the uterus.

***Clomiphene Citrate (Clomid)-***A fertility drug which causes a woman's body to mature more egg-containing follicles during an ovulation cycle than it normally would. It comes in tablet form and is usually taken for five days starting cycle days 3 to 5.

***Congenital Adrenal Hyperplasia-***
A congenital condition characterized by elevated androgens which suppress the pituitary gland and interfere with spermatogenesis or ovulation. Women may have ambiguous genitalia from the excess production of male hormone and develop hirsutism.

***Controlled Ovarian Hyperstimulation (COH)-***
Medical treatment to induce the development of multiple ovarian follicles to obtain multiple oocytes at follicular aspiration.

***Corpus Luteum-***
Remnant of a follicle after ovulation. It releases progesterone, a hormone that prepares the uterine lining for embryo implantation.

***Cryopreservation (Cryo)-***
A procedure used to preserve, by freezing, and store embryos, eggs, or sperm.

***D&C (Dilation and Curettage)-***A procedure used to dilate the cervical canal and pass suction catheter or metal instruments to scrape out the lining and contents of the uterus.

***Donor Insemination (D-IUI)-***Artificial insemination with donor sperm. A fresh donor semen specimen or a thawed frozen specimen is passed through the cervix and released into the uterine cavity using a catheter.

***Doxycycline-***A tetracycline derivative; an antibiotic that inhibits many of the microorganisms infecting the reproductive tract. Often used for treating ureaplasma infections. Many physicians find routine treatment with this antibiotic more cost-effective than performing multiple cultures on both the husband and wife looking for infection.

***Ectopic Pregnancy/ Tubal Pregnancy-***
A pregnancy in which the embryo implants outside the uterine cavity; usually in the fallopian tube, the ovary, or the abdominal cavity. May require surgical intervention and/or methotrexate therapy.
***Egg Donor (ED)-***A woman who provides eggs or "ova" to another woman who has no eggs, or whose eggs are not viable. Donated eggs will be fertilized and implanted in the uterus of the infertile woman.

***Egg Retrieval (RET)-***
An attempt is made to obtain eggs from the ovary using ultrasound guided transvaginal aspiration.

***Embryo-***
The earliest stages of development; the undifferentiated beginnings of a baby, from the point of conception to the eighth week of pregnancy.

***Embryo Transfer (ET)-***
Embryos either fresh or previously cryopreserved- (FET) are passed thru the cervix into the upper uterine cavity with a catheter usually under ultrasound guidance.

***Embryologists-***
Scientists trained in advanced laboratory techniques, who prepare and provide the necessary conditions for the fertilization of eggs. They also facilitate the growth, development, maturation, and preservation of embryos, eggs, and sperm.

***Endometrial Biopsy-***
A procedure during which a sample of the uterine lining is collected for microscopic analysis. The biopsy results will confirm ovulation and the proper preparation of the endometrium by estrogen and progesterone stimulation or evaluate for infection or other abnormal endometrial conditions.

***Endometriosis-***
The presence of endometrial tissue (the uterine lining) in areas outside of the uterus such as the tubes, ovaries, and peritoneal cavity. This condition often causes infertility and painful menstruation.

***Endometrium-***
The tissue lining the uterus. This tissue responds to the cyclic production of ovarian hormones and permits implantation of the placenta during pregnancy. Its upper layers are shed with menstruation.

***Epididymis-***
A coiled, tubular organ attached to and lying on the testicle. Within this organ the developing sperm complete their maturation and develop their swimming capabilities. The matured sperm leave the epididymis through the vas deferens.

***Estradiol Level (E2 Level)-***
The amount of estradiol, a form of estrogen, in the blood.

***Estrogens-***
A group of female hormones responsible for the development of secondary sexual characteristics during puberty. Estrogen also plays an important role in stimulating the endometrium. Estrogen is produced mainly by the ovaries, from the onset of puberty until menopause.

***Fallopian Tube-***
A pair of tubes that conduct eggs from an ovary to the uterus. Natural fertilization takes place as an egg travels through a fallopian tube.

***Fertilization-***
The combining of the genetic material carried by sperm and egg to create an embryo. Normally occurs inside the fallopian tube (in vivo) but may also occur in a petri dish (in vitro).

***Fetus-***
A term used to refer to a baby during the period of gestation between eight weeks and term.

***Fibroid (Myoma or Leiomyoma)-***
A benign tumor of the uterine muscle and connective tissue.

***Follicles-***
Fluid-filled sacs in the ovary which contain the eggs released at ovulation.
Each month an egg develops inside the ovary in a fluid-filled pocket called a follicle.

***Follicle Stimulating Hormone (FSH)-***
A pituitary hormone that stimulates spermatogenesis and follicular development. In the man FSH stimulates the Sertoli cells in the testicles and supports sperm production. In the woman FSH stimulates the growth of the ovarian follicle. Elevated FSH levels are indicative of gonadal failure in both men and woman.

***Follicular Phase-***
The pre-ovulatory portion of a woman's cycle during which a follicle grows and high levels of estrogen cause the lining of the uterus to proliferate. Normally takes between 12 and 14 days.

***Gametes-***
Sex cells that contain half of a person's genetic information. Male gametes are called sperm; female gametes are celled eggs or ova.

***Gestational Carrier (GC)-***
A woman in whom a pregnancy resulted from fertilization with third-party sperm and oocytes. She carries the pregnancy with the intention or agreement that the offspring will be parented by one or both of the persons that produced the gametes. The older term surrogate originally meant that the egg donor and the woman carrying the pregnancy were the same person (no longer used)

***Gestational Sac-***
A fluid-filled structure containing an embryo that develops early in pregnancy usually within the uterus.

***Gonadotropins-***
Potent fertility drugs that provide the patient with FSH and LH, or FSH alone.

***Gonadotropin Release Hormone (GnRH)-***
A hormone that controls the synthesis and release of the pituitary hormones, follicle stimulating hormone (FSH) and luteinizing hormone (LH). GnRH is produced by the hypothalamus.

***Gonadotropin Release Hormone Agonists (GnRH Agonists)-***
Fertility drugs used to prevent the pituitary gland from releasing FSH and LH hormones. FSH and LH aid in normal ovulation, but may interfere with assisted reproductive treatments.

***Gonadotropin Release Hormone Antagonists (GnRH Antagonists)-***Fertility drugs that like GnHR agonists, suppress ovulation. GnRH antagonists are effective at immediate preventing LH release.

***Hirsutism-***
The overabundance of body hair found in women with excess androgens.

***Hormone-***
A chemical substance produced by one organ in the body that regulates the activity of another organ.

***Host Uterus/ Gestational Carrier (GC)-***Also called a "gestational mother." A couple's embryo is transferred to another woman who carries the pregnancy to term and returns the baby to the genetic parents immediately after birth.

***Human Chorionic Gonadotropin (HCG)-***
The hormone produced in early pregnancy which keeps the corpus luteum producing progesterone. Also used via injection to trigger ovulation after some fertility treatments, and used in men to stimulate testosterone production.

***Hypothalamus-***
A part of the brain, the hormonal regulation center, located adjacent to and above the pituitary gland. In both the man and the woman this tissue secretes GnRH.

***Hysterosalpingogram (HSG)-***
An x-ray procedure used to determine whether the fallopian tubes are open and of normal caliber. The physician injects dye into the uterus through the cervix. The dye passes through the tubes if they are open. An HSG can also reveal information such as the configuration of the uterus, irregularities, and the presence of fibroids.

***Hysteroscopy (HK)-***
A surgical procedure in which a telescope-like device is inserted through the cervix to view the inside of the uterus. This procedure is sometimes performed in conjunction with a laparoscopy.

***Implantation (Embryo)-***
The embedding of the embryo into tissue so it can establish contact with the mother's blood supply for nourishment. Implantation usually occurs in the lining of the uterus; however, in an ectopic pregnancy it may occur elsewhere in the body.

***Infertility-***
The inability to conceive or to achieve pregnancy over a considerable period of time (typically, after one year for a female who is under the age of 35 or after six months for a female over the age of 35 or with prior pregnancies) despite determined attempts by intercourse without the use of contraception.

***Intracytoplasmic Sperm Injection (ICSI)-***
A laboratory procedure in which a single sperm is directly inserted into an oocyte (egg cell).

***In Vitro Fertilization (IVF)-***
A procedure in which one or more eggs, each removed from a mature follicle, is fertilized by a sperm outside the human body.

***Karyotyping-***A test performed to analyze chromosomes for the presence of genetic defects.

***Laparoscopy (LS)-***
Any procedure using a laparoscope, a slender tool with an attached camera that enables a physician to see the inside of the body. Infertility specialists perform laparoscopy to view a woman's reproductive organs. Laparoscopy can be used for diagnostic purposes or to perform surgical functions such as removing damaged tissue (adhesions or endometriosis), fibroids, and ovarian cysts.

***LH Surge-***
A spontaneous release of large amounts of luteinizing hormone (LH) during a woman's menstrual cycle. This normally results in the release of a mature egg from a follicle (ovulation).

***Lupron-***
A hormonal medication that can create a pseudo-menopause. A chemical similar to GnRH, it first stimulates the female hormones, then suppresses a woman’s secretion of FSH and LH. Lupron may improve the response to stimulation, as well as preventing premature ovulation, decreasing the risk of a cancelled cycle. It may also be used to treat fibroids or endometriosis.

***Lupron “Down Regulation”-***
A treatment with Lupron that takes advantage of the suppression of natural hormone (LH and FSH) secretions. Used before injection of gonadotropins to stimulate follicular development.

***Luteal Phase-***
The days of a menstrual cycle following ovulation and ending with menses. Usually lasting between 12 and 14 days.

***Luteinizing Hormone (LH)-***
A hormone that causes the ovary to produce estrogen and to release a mature egg (ovulation). In the male, LH stimulates testosterone production. The anterior pituitary secretes LH.

***Micromanipulation-***
Procedure in which an egg or an embryo is manipulated under the microscope including ICSI, Assisted Hatching, and embryo biopsy for PGD.

***Microsurgical Epididymal Sperm Aspiration (MESA)-***
A procedure in which spermatozoa are obtained from the epididymis by either aspiration or surgical excision.

***Miscarriage-***
Loss of a clinical pregnancy prior to 20 weeks gestation.

***Motility-***
The percentage of all moving sperm in a semen sample. Normally, 50% or more sperm in a sample move rapidly.

***Multiple Gestation/Pregnancy-***The conception of two or more gestational sacs or fetuses in the same woman at the same time, whether or not they result in live births.

***Ovarian Failure-***
The failure of the ovary to respond to FSH stimulation from the pituitary because of damage to or malformation of the ovary or greatly diminished follicular number either due to natural aging or premature loss of follicles. Diagnosed by elevated FSH in the blood, low AMH, amenorrhea.

***Ovarian Hyperstimulation Syndrome (OHSS)-***A possible side effect of medically induced ovulation, characterized by swollen, painful ovaries and, in some cases, the accumulation of fluid in the abdomen and chest with weight gain and electrolyte imbalances.

***Ovaries-***
Female sex organs that release mature eggs and produce the hormones estrogen and progesterone.

***Oligo-Ovulation-***
Irregular ovulation.

***Oligospermia-***
A condition in which the number of sperm in a semen sample is abnormally low.

***Oocyte-***
The egg cell produced in the ovaries. Also called the ovum or gamete.

***Ovulation-***
Release of a mature egg from a follicle at the surface of the ovary.

***Ovulation Induction (OI)-***
The therapeutic use of female hormones to stimulate egg development and release.

***Papanicolaou Smear (Pap Smear)-***
A screening test to evaluate the cells of the cervix to determine whether they are normal or cancerous.

***Pelvic Inflammatory Disease (PID)-***
An infection of the pelvic organs that causes severe illness, high fever, and extreme pain. PID

may lead to tubal blockage and pelvic adhesions.

***Percutaneous Epididymal Sperm Aspiration (PESA)-***
A procedure in which sperm are removed from the epididymis, a long coiled tube above each of the testes, through a needle.

***Pituitary Gland-***
The master gland; the gland that is stimulated by the hypothalamus and controls all hormonal functions. Located at the base of the brain just below the hypothalamus, this gland controls many major hormonal factories throughout the body including the gonads, the adrenal glands, and the thyroid gland.

***Polycstic Ovarian Syndrome (PCO, PCOS)-***
A condition found in women who don’t
ovulate regularly, characterized by excessive production of androgens (male sex hormones) and the presence of cysts in the ovaries. Though PCO can be without symptoms, some include obesity, acne, excessive hair growth, irregular menstrual periods, and infertility.

***Preimplantation Genetic Screening (PGS)-***
Screening of cells from preimplantation embryos requiring an embryo biopsy at the blastocyst stage removing 4-6 trophoblastic cells for the detection of genetic and/or chromosomal disorders before embryo transfer.

***Premature Ovarian Failure (POF)-***
The loss of ovarian function associated with high levels of gonadotropins and low levels of estrogen before age 35. The ovary may intermittently produce mature follicles.

***Progesterone (P4)-***
The hormone produced by the corpus luteum during the second half of a woman’s cycle. It prepares the lining of the uterus to accept implantation of a fertilized egg. It is released in pulses, so the amount in the bloodstream is not constant.

***Prolactin (PRL)-***
A hormone produced by the pituitary that plays an important role in preparing the breasts, during pregnancy, for nursing. An inappropriate elevation at times other than pregnancy may interfere with normal ovulation.

***Recipient (DER)-***
In an ART cycle, refers to the woman who receives an oocyte or an embryo from another woman.

***Reproductive Endocrinologist/ Infertility (REI)-***
A physician specializing in the practice of fertility. The American Board of Obstetrics and Gynecology certifies a subspecialty for OB-GYNs who receive extra three years of training known as a fellowship in reproductive endocrinology (the study of hormones) and infertility. All REI’s have previously completed a 4 year internship and residency in OBGYN and become board certified in OBGYN prior to being eligible to become an REI. A 4 year college degree and 4 year medical school degree (MD or DO) are required before the residency and fellowship.

***Rubella Titer-***A blood test that determines if the patient is immune to rubella (German measles), a viral disease that can cause severe birth defects. If a woman is not immune to rubella, she may be advised to have a rubella vaccination, wait one month before attempting pregnancy, and the retest for immunity.

***Secondary Infertility-***
The inability to conceive or carry a pregnancy after having conceived and carried one or more pregnancies.

***Semen-***The fluid portion of the ejaculate consisting of secretions from the seminal vesicles, prostate gland, and several other glands in the male reproductive tract. The semen provides nourishment and protection for the sperm and a medium in which the sperm can travel to the woman's vagina. Semen may also refer to the entire ejaculate, including the sperm.

***Semen Analysis (SA)-***
A microscopic examination of freshly ejaculated semen to evaluate the number of sperm (count), the percentage of moving sperm (motility), and the size and shape of the sperm (morphology).

***Sonohysterogram (Sono)-***

An ultrasound in which water is inserted into the uterus to visualize the uterine cavity and help diagnose any abnormalities such as polyps, fibroids or congenital defects.

***Sonogram (Ultrasound)/ Follicle Scan-***. A transvaginal ultrasound used to detect and count follicle growth (and disappearance) in many fertility treatments. Also used to detect and monitor pregnancy.

***Sperm-***
Male sex cells, or gametes. Sperm, medically referred to as spermatozoa, are mobile haploid cells that fertilize eggs. Sperm cells provide the genetic information that determines an embryo's sex.

***Stimulation-***
Administration of hormones that induce development of multiple ovarian follicles.

***Superovulation-***
Stimulation of multiple ovulation with fertility drugs; also known as controlled ovarian hyperstimulation (COH).

***Testicular Sperm Aspiration (TESA)-***
A procedure in which spermatozoa are obtained directly from the testicle by either aspiration or surgical excision of testicular tissue.

***Testicular Sperm Extraction (TESE)-***
A sperm aspiration method in which a small section of tissue from one or both of the testicles is removed through one or more short incisions in the scrotum. Sperm are extracted from the tissue by an embryologist and used, through ICSI, to fertilize a woman's eggs. TESE may work for a man who does not have mature sperm in his epididymis.

***Testicles-***
The two male sexual glands contained in the scrotum. They produce the male hormone testosterone and produce the male reproductive cells, the sperm.

***Testicular Biopsy-***
A small excision of testicular tissue to determine the ability of the cells to produce normal sperm.

***Testosterone-***
The male hormone responsible for the formation of secondary sex characteristics and for supporting the sex drive. Testosterone is also necessary for spermatogenesis.

***Thyroid Gland-***
The endocrine gland in the front of the neck that produces thyroid hormones to regulate the body's metabolism.

***Thyroid Stimulating Hormone (TSH)-***

A [hormone](http://www.medicinenet.comhttp/www.medicinenet.com/high_blood_pressure_hypertension/article.htm3) produced by the [pituitary gland](http://www.medicinenet.com/script/main/art.asp?articlekey=4915) at the base of the brain in response to signals from the [hypothalamus](http://www.medicinenet.com/script/main/art.asp?articlekey=3866) gland in the brain. TSH promotes the growth of the [thyroid gland](http://www.medicinenet.com/script/main/art.asp?articlekey=5778) in the neck and stimulates it to produce more [thyroid hormones](http://www.medicinenet.com/script/main/art.asp?articlekey=5780).

***Transvaginal Ultrasound (TV-US)-***
Technique used to view the follicles, fetus, and other soft tissues by projecting sound waves through a probe inserted into the vagina. A baseline ultrasound shows the ovaries in their
normal state. A follicular ultrasound shows egg follicle maturation. A pregnancy ultrasound shows if a pregnancy is in the uterus or in a fallopian tube (an ectopic pregnancy). Ultrasound pictures can be used to measure growth.

***Urethra-***
The tube that allows urine to pass between the bladder and the outside of the body. In the man this tube also carries semen from the area of the prostate to the outside.

***Uterus-***
The hollow muscular structure that carries and protects a growing fetus. The uterus, often referred to as the womb, is connected to the vagina by the cervix.

***Vagina-***
The canal leading from the cervix to the outside of the woman's body; the birth passage.

***Varicocele-***
A collection of varicose veins in the scrotum which may be associated with poor sperm quality.

***Zygote-***
A fertilized egg or embryo, in the early stages of development.