



## **Gestational Surrogacy Zouves Fertility Center**

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### **What is surrogacy?**

There are two types of surrogacy. The first, Classical Surrogacy, involves the insemination of a surrogate with the sperm of the father-to-be. The surrogate contributes her genes to the make-up of the child, carries the baby to term, and then gives up the child for adoption to the Intended Parents at birth. At **Zouves Fertility Center**, we only perform Gestational Surrogacy, where the woman who carries the child does not contribute her gametes to the equation. The eggs are obtained from the genetic mother and the sperm from the genetic father. The resulting embryos are incubated in the uterus of a surrogate who undergoes prior hormonal preparation. At birth, the surrogate gives the child back to the Intended Parents. Depending upon the State where the birth takes place, there may be issues of custody and the Intended Parents might have to undertake formal adoption procedures to acquire legal custody of the child. In some states, the name of the Intended Parents rather than the surrogate (the birth mother) will appear on the birth certificate. However, regardless of legalities, in Gestational Surrogacy, given that the eggs are not supplied by the surrogate, there can be no real debate as to who the rightful parents are.

Here, in broad outline, is the sequence of events that takes place with Gestational Surrogacy as conducted through Zouves Fertility Center.

- The Intended Parents undergo a thorough clinical, psychological, and laboratory assessment. The purpose is to exclude sexually transmitted diseases that might be carried to the surrogate at the time of embryo transfer. Such infections include but are not limited to HIV, HTLV, hepatitis B, hepatitis C, cytomegalic virus inclusion disease, gonorrhea, chlamydia, and syphilis.

In addition, if there is any suggestion by family history on either side that genetic diseases such as Tay Sachs, hemophilia, muscular dystrophy, cystic fibrosis, or mental retardation might be transmitted to the offspring, the couple will require genetic screening prior to undergoing IVF and prenatal genetic testing during early pregnancy.

- The Intended Parents are counseled regarding procedural aspects relating to the IVF cycle of treatment and discussions are held regarding issues such as selective pregnancy reduction (where a multiple gestation of greater than twins occurs), termination of pregnancy, birth defects, tubal (ectopic) pregnancy, miscarriage, and the physical and emotional impact of treatment. In addition, the legal aspects of custody following gestational surrogacy are addressed.
- Following recruitment of a surrogate (from an agency, from family members, or through personal solicitation), she is carefully evaluated physically and psychologically. This is especially important in cases where a relatively young surrogate or a family member is recruited. In such cases, it is important to ensure that the surrogate has not been subjected to any pressure or coercion.

- The surrogate is treated like any other patient undergoing treatment at ZFC because first and foremost, they are patients and secondly, they are doing a very special job for the Intended Parents. It is important to inform the surrogate that she has equal right of access to medical staff and that her concerns will be addressed promptly and efficiently at all times. Issues such as the risk of spontaneous miscarriage, multiple pregnancy, the risk of birth defects, the risk of pregnancy complications, and the potential need for prenatal genetic testing through chorionic villus sampling or amniocenteses and blood test (such as in cases where the genetic mother is over 35 years of age and at greater risk of producing an embryo with trisomy disorders), are discussed.
- All legal issues pertaining to custody and the rights of the Intended Parents and the surrogate are discussed in detail and appropriate contractual agreements/consent forms are completed following full disclosure. We recommend that the surrogate and Intended Parents get separate legal counsel to avoid the conflict of interest that would arise were the same attorney to counsel both parties. Advance payment is made for all services so as to protect medical and administrative staff having to confront couples with a bill in cases where a cycle of treatment fails to result in a healthy pregnancy.
- At Zouves Fertility Center, the prelude to the cycle of treatment is initiated by placing both the surrogate and the egg provider (who is to receive fertility agents and undergo an egg retrieval) on birth control pills in order to synchronize their cycles. Remember, the surrogate's uterus must be ready to receive fresh embryos at exactly the right time (3 days after the eggs are harvested from the egg provider). In cases where the genetic mother does not have a uterus, an attempt is made to pinpoint the onset of the ovulation cycle by having her use a temperature chart or home ovulation kit for a few months in advance of undergoing ovarian stimulation with fertility agents, and so, to synchronize the cycles.
- Both the egg provider and the surrogate begin receiving daily injections of gonadotropin releasing hormone agonist, Lupron (Tapp Pharmaceuticals) once both have been on birth control pills for at least ten days. Lupron is continued until the surrogate and the egg provider are down regulated and both women have low blood estrogen levels. Thereupon, the surrogate starts taking estrogen (by twice weekly injections to which vaginal estradiol suppositories may be added) to build the lining of her uterus while the egg provider receives injections of fertility hormones (gonadotropins). The egg provider then undergoes serial blood tests to determine whether her blood estrogen level is rising optimally and vaginal ultrasound examinations to evaluate whether she has developed a sufficient number of mature ovarian follicles (fluid-filled spaces in the ovaries that produce estrogen and contain the eggs) have developed in her ovary(ies). The surrogate in turn undergoes serial blood tests to determine whether she has high enough blood estrogen levels. She also undergoes serial vaginal ultrasound examinations to measure the thickness of her uterine lining. As soon as the follicles are mature, and the surrogate's uterus is optimally prepared, the egg provider receives an injection of human chorionic gonadotropin (hCG) which completes maturation of her egg(s). Approximately 36 hours later, the egg provider is given intravenous sedation and an egg retrieval procedure is performed, at which time the physician directs a needle into each ovary, emptying each follicle, using ultrasound and a vaginal probe. The procedure is almost always completely painless. The surrogate then receives progesterone injections daily (in addition to estrogen).
- The eggs are fertilized with designated sperm (usually partner's) in the laboratory and two or three days later a pre-agreed upon number of embryos (usually between 2 and 6 depending upon the egg provider's age) are transferred into the uterus of the surrogate.



- The embryo(s) are transferred to the surrogate's uterus in a painless procedure known as embryo transfer (ET). A thin catheter (containing the embryos to be transferred) is introduced via the vagina through the cervix into the uterus. The surrogate rests for about two hours and is then discharged.
- The surrogate continues taking estrogen and progesterone (by injection/vaginal suppositories) for about ten days, and thereupon two blood pregnancy tests are performed two days apart. If the blood hCG level increases appropriately, the surrogate continues her hormone injections for about two additional weeks, whereupon an ultrasound examination is done to confirm the existence of one or more viable gestations and to make sure that the pregnancy has implanted in the surrogate's uterus and not in one of the fallopian tubes (the latter is referred to as an ectopic pregnancy and may be life-endangering). After normal pregnancy has been confirmed by ultrasound, hormone injections/suppositories are continued for approximately one more month and are then stopped.

At this point, the surrogate is referred to an obstetrician or, when indicated, to a perinatologist (a high-risk pregnancy specialist). If a pregnancy reduction is required it is usually performed prior to the end of the 12<sup>th</sup> week of gestation. If the initial blood pregnancy tests are negative, treatment with estrogen and progesterone is discontinued and the surrogate can expect to menstruate within 4 – 10 days.

In the event that a viable pregnancy is confirmed by ultrasound with detection of fetal cardiac activity (usually by the sixth week), the likelihood that pregnancy will precede to term is greater than 90%. Once the pregnancy has progressed beyond the 12<sup>th</sup> week, there is less than a 5% chance of a subsequent loss.

#### **PLEASE NOTE:**

At Zouves Fertility Center, we currently report about a 50% birth rate with gestational surrogacy and IVF egg donation every time embryos are transferred, provided the egg provider is under 35 years of age and the recipient has a healthy uterus. This rate decreases slightly between ages 35 and 40 and then declines rapidly thereafter.

While birth rates following conventional IVF and gestational surrogacy both decline progressively with increasing age of the egg provider, success rates remain higher with gestational surrogacy than with conventional IVF for any given age of the egg provider. This is largely due to fact that administration of exogenous estrogen better prepares the uterine lining for implantation than that which occurs following ovarian stimulation with fertility drugs.

It is also worthy of mention that there is no reported increase in the incidence of spontaneous miscarriage or birth defects as a direct result of IVF Surrogacy.

#### **A FINAL WORD OF ENCOURAGEMENT:**

Dr. Zouves and his team have helped bring over 1000 IVF babies into the world. Sometimes the struggle with infertility seems unfair. Other times it will seem impossible. Maybe the words of a former patient will help during those times: "I want you to know that if I had to undergo each injection, each tear, every dollar spent, the miscarriages, the problems with adoptions, and the failed pregnancy tests all over again ... I would. I absolutely would ... because if we hadn't gone through all that we wouldn't have Nicholas ... we might have someone else, but no one could be as wonderful as our Nicholas."

