And Baby Makes Four: Gestational Surrogacy in India and the Female Reproductive System

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Part I – The Proposition

Savitha, a 29 year old mother of two, works long hours intermittently in a garment factory in Bangalore, India, the town to which her parents immigrated when she was a small child. Savitha's husband was an auto rickshaw driver (Figure 1) until a bad accident left him unable to work. Savitha works an average of 16 hours per day in the factory, a forty-minute one-way commute, and makes \$50.00 per month. When she returns home at the end of the day she does laundry, cooks, cleans and takes care of her children and husband. Her dream is to start a small "chaat shop" (Indian street food) near her home so she can be closer to her family during the day, earn more money and escape the sweatshop conditions of the factory.

On her way to work one morning, Savitha was approached by a clinic recruiter, a man who finds and hires egg donors and gestational surrogates. Savitha was familiar with these recruiters, or "egg brokers" as they are sometimes called; they are middle-men that act as agents for fertility clinics. Her friend, Anandi, who no longer worked at the factory, encouraged Savitha to become a surrogate. Anandi made enough money through surrogacy work to pay-off her husband's auto rickshaw loan. Savitha was skeptical but the seeming ease of the work was enticing and the hard days working far from home had taken a toll. She decided to talk to the recruiter. Initially, the recruiter tried to convince Savitha to become a gestational surrogate. "You are young, you already have children. Another pregnancy



Figure 1. Auto rickshaw commonly used in India.

will not be a burden to your body and you will earn many years of salary in nine months." Savitha was not ready for surrogacy and decided to donate eggs instead. She would not earn as much money but she also would not have to be quarantined in a dormitory away from her family for nine months. When informed by her friends about the hormone injections and the potential long-term negative effects of egg donation, she shrugged, "My first priority is caring for my family. I think it will be worth it."

Ouestion

1. College students, male and female, are solicited for sperm and egg donations through ads in newspapers and online. Have you seen any ads for donors? Do you know anyone who has been a sperm or egg donor? What was his/her experience?

The Fertility Industry

Like workers in sweatshops around the world, women working in garment factories in Bangalore are underpaid and overworked. Volatile markets and global financial crises have led to unsteady work in garment factories while cuts in food, education and medical subsidies increased the cost of living. In Bangalore and other cities, the factory assembly line is the main conduit to the fertility industry. It is typical for women to move from garment work to selling their eggs and finally acting as gestational surrogates for infertile, mostly foreign couples.

Question

2. What factors motivate women to become egg donors in India? How might these factors be different for women in the United States?

Egg Donation

The ultimate goal of egg donation is to collect many mature eggs at one time. This is contrary to the female body's natural ovarian cycle during which only one (sometimes two) eggs mature and are ovulated monthly. Egg or follicle development and ovulation are processes dependent on a suite of hormones that participate in regulatory feedback loops involving the hypothalamus, pituitary and ovaries. To harvest multiple eggs at a prescribed time, egg development must proceed without ovulation. So egg donors undergo hormone treatments (usually for 8–14 days) that both stimulate follicle development and prevent ovulation. The donor undergoes regular ultrasound imaging (Figure 2) and blood hormone level tests to monitor development of the eggs. When eggs are prime for harvesting, the woman will be administered an injection of hCG (human chorionic gonadotropin) to induce ovulation. Eggs are harvested using trans-vaginal aspiration,



Figure 2. Ultrasound is used to visualize the mature follicles. The large dark spaces are maturing follicles.

a procedure that uses an ultrasound probe with a long, thin aspiration needle attached, inserted into the vagina (Figure 3). The probe is used to visualize the ovary and follicles while the needle penetrates the vaginal wall, reaches the ovary and applies suction to remove mature eggs.

Approximately 30% of women who donate eggs experience ovarian hyperstimulation syndrome (OHSS), the greatest risk associated with egg donation. OHSS is manifested as painfully swollen ovaries and abdominal fluid accumulation. About 2% of the OHSS cases exhibit intra-abdominal bleeding or, sometimes, ovarian torsion and require hospitalization(Bodri et al., 2008; American Society for Reproductive Medicine, 2015). Very little is known about long-term effects of egg donation but some researchers surmise a connection with different types of cancer (Schneider, 2008).

Review what you learned previously about hormonal control of the female reproductive system (Figure 4) with specific attention to positive and negative feedback loops, then answer the following questions.

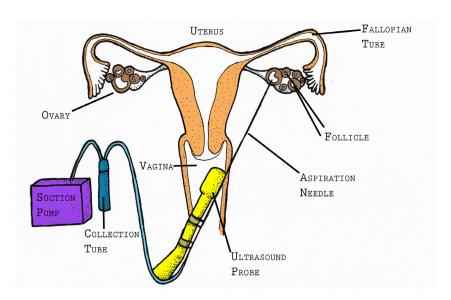


Figure 3. The process of egg extraction following maturation of several follicles (longitudinal section). (Based on figures from the ART Patient Guide.)

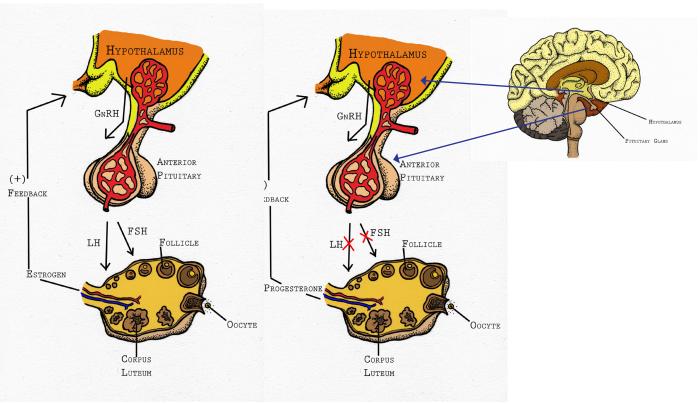


Figure 4. Review of the positive (left) and negative (right) feedback loops that include the hypothalamus in the brain, pituitary and ovary.

Questions

- 3. To prevent ovulation, drugs called either GnRH agonists (e.g., leuprolide, nafarelin acetate) or antagonists (e.g., ganirelix, cetrorelix acetate) are used. These prevent ovulation by preventing a particular hormone from being released. Which hormone is stopped from being released?
- 4. What hormones are used to stimulate the ovaries to produce lots of eggs at one time?
- 5. Normally, where and when are the hormones (that are used to stimulate ovaries to produce eggs) produced and what do they do in a normal female reproductive cycle?
- 6. After drugs to stimulate egg production are administered, blood levels of estrogen are monitored closely. What does an increase in estrogen indicate and why is this important in egg stimulation?

Savitha's Donation

At first, Savitha was sick, had abdominal pain, some bleeding and wide mood swings but she saw a doctor at the clinic regularly and felt much better after the second week of medication. When it was time for the egg extraction, Savitha donated a total of 10 mature eggs. Although she had heard stories of women who donated up to 50 eggs and had complications that resulted in infertility, she donated, recovered and returned to her normal routine within a couple of days without incident. Savitha was not considered a "premium" donor and earned only \$161.10 for her egg donation. Premium donors, explained the recruiter, have a record of fertility from previous donations and have lighter skin color because that is what the market demands (Rudrappa, 2010). The recruiter made \$100.00 acting as Savitha's agent.

Part II — The Surrogate

Savitha knew that she would never make enough money to start her shop by donating eggs. Now that she had a successful record from her donation, she would easily be accepted as a surrogate mother. Savitha went back to her recruiter who promised her \$3,306.00 for her time as a gestational surrogate. With this much money, Savitha could start her shop.

Gestational Surrogacy in India

Recently, India has emerged as a world center for hiring gestational surrogates. In 2010, surrogacy was a \$445 million business and profits were predicted to reach \$2.3 billion in 2012 (Sarojini et al., 2011). Indian surrogate mothers (gestational surrogates who enter into contract pregnancies) may earn between \$2,800 and \$9,000 to carry a child to term and a recruiter or middle-man takes some percentage of the woman's total earnings, up to 50% in some cases. One clinic charges potential parents \$15,000 to \$20,000 for the entire process, from *in vitro* fertilization to delivery. This is far less expensive compared to the same work in the United States where surrogate mothers earn \$25,000 or more and, in the handful of American states that allow paid surrogacy, bringing a child to term costs between \$50,000 and \$100,000. This cost savings and relative ease of finding gestational surrogates in India has spurred a new industry of medical tourism. The Indian government even offers medical visas for foreigners visiting the country for medical procedures and medical travel has increased 20% per year. At one Indian clinic, 95% of clients (potential parents) were international—30% to 40% Americans, followed by Australians and Swedes. In 2010, the clinic, founded in 2007, delivered about 302 babies a year, averaging 15 to 20 new pregnancies a month. Often the success of such clinics is inflated and reporting is not regulated, so statistics may be difficult to compare.

Surrogate mothers typically are screened for physical and psychological health (one clinic rejects up to 1/3 of the women who apply). Women who become surrogates receive free medical care, food, and housing during their gestation period. They sign contracts that stipulate that they will take vitamins, refrain from sexual intercourse and, if necessary, be sustained with life support late in pregnancy to protect the fetus. They are housed together in dormitories and monitored by medical professionals, often in buildings equipped with security cameras for continuous surveillance. Babies are all delivered by caesarean section on a specific schedule set by parents-to-be, usually after 36–37 weeks of gestation. In many cases, Indian women engage in contract pregnancies several times during their reproductive years. Maternal morbidities (long-term, negative effects) associated with repeat cesarean section births range from chronic abdominal pain to decreased fertility and spontaneous abortion (miscarriage (Clark and Silver, 2011)). The hospital where surrogates deliver does not pay for any after-delivery complications.

Question

7. Why are surrogates screened for psychological health? What might be the psychological impacts, personal and social, associated with being a gestational surrogate?

Parents-to-Be?

Debra and Marco of Illinois want to have a child but struggle with infertility. Although Marco had his vasectomy reversed successfully, Debra was recently diagnosed with uterus didelphys, a condition in which there is a "double uterus" that often prevents carrying a pregnancy to term. Additionally, Debra had polycystic ovary syndrome, a condition in which changes in the hypothalamus, pituitary gland and ovaries prevents ovulation. This is the most common cause of female infertility (Mayo Clinic). The couple decided to seek an egg donor and hire a gestational surrogate (two different women) in India to carry their child. Marco, 47, made one sperm donation and an egg donor was hired via a recruiter and the Indian fertility clinic. Because Marco had few and relatively less mobile sperm than normal, they used intracytoplasmic sperm injection (ICSI), a type of *in vitro* fertilization (IVF), to ensure fertilization. In this process, fertilization occurs when a single sperm nucleus is directly injected into an egg held in place under a microscope. This was done with three eggs, two of which divided to a blastocyst stage before implantation into the gestational surrogate. The cost was about \$25,000 and the parents-to-be were given a choice of birthdates for their child.

In the United States, a surrogate and her clients must establish a relationship before coming to a fertility clinic, but Debra had not met the woman who would carry her child. Debra caught a glimpse of her once at the clinic in India just after embryos fertilized with Marco's sperm were implanted in the woman's uterus. The clinic director preferred that the gestational surrogate not meet with the parents-to-be. The director stated to Debra, "The clinic wants to keep a separation. This is what your job is: you are the mother. She's the vessel."

Questions

- 8. What hormone is administered to the surrogate to prepare the uterine lining for embryo implantation?
- 9. What motives typically guide the decision to use a gestational surrogate in a country other than your home country (assume the United States)?

Savitha's Surrogacy

After undergoing routine screening examinations, Savitha was admitted into the gestational surrogacy program at a clinic in Bangalore. She said goodbye to her family and began a nine month residence in a dormitory with 18 other pregnant women, most younger than herself. At 36 weeks into her pregnancy, she delivered a healthy girl by C-section. Although there were no complications during her pregnancy, Savitha did suffer some post-delivery complications that were not covered by her contract with the fertility clinic. In the end, after paying medical costs and the recruiter (who took 50%), and providing obligatory gifts to her caregivers, Savitha brought home only \$1,653.00. This was enough to secure a loan for supplies to start selling chaat out of her home but not sufficient to establish a business that would support her family. Even after the entire ordeal, Savitha says that she would do this again, "Garments? You wear a shirt a few months and you throw it away. But I make you a baby? You keep that for life. I have made something so much bigger than anything I could ever make in the factory."

Ethical dimensions

Many countries do not allow gestational surrogacy for pay for many different reasons while some countries, like India, have a burgeoning, unregulated market. Arguments for and against gestational surrogacy consider complex questions like the following: Is it ethical that marginalized, sometimes illiterate women are paid to carry and birth children for typically wealthy, often white, infertile couples? Is there some obligation of this global, for-profit medical market to care for the health of gestational surrogates over a longer term? Are the rights of the women who participate in contract pregnancies in an international market being violated?

Ouestions

- 10. Think critically about the case of Savitha, Debra and Marcos and answer the following questions to probe the ethical dimensions of the fertility industry.
 - a. In terms of the industry, who are the stakeholders? List *all* stakeholders.
 - b. What are their interests?
 - c. Are all of the stakeholders involved in the decision making? Which stakeholders are making decisions and which are not?

- d. What are the foreseeable consequences (possibly remote or hidden) of surrogacy (for all involved)?
- e. What are the alternatives to gestational surrogacy for infertile couples?
- f. Are the alternatives reasonable for most couples?
- g. Who benefits in the fertility industry? List *all* who benefit. (These are the people "upstream" who make choices.)
- h. Who risks or pays the costs? (These are the people "downstream" experiencing the consequences of those upstream.)
- i. Given the risks you listed above, are the consequences of "the worst case scenario" acceptable or tolerable?
- j. Some countries allow surrogacy for pay (e.g., India, Thailand, and Mexico) and have few regulations around fertility practices. Some countries permit surrogacy but not for pay and still other countries have outlawed surrogacy entirely (e.g., France, Germany and Italy). Although the system in India is not perfect, would you agree that all countries should permit surrogacy for pay?
- k. The willingness to accept the consequences of a decision or to expect a practice to be universal are tightly related to whether or not international surrogacy for pay is ethical. Given your answers to the questions above, how would you describe the surrogacy industry in India in terms of its ethical dimensions? Defend your answer with evidence from this case study.
- 11. Is women's "reproductive labor" the same as other types of labor, for example, factory work? Consider the background information on gestational surrogates and the burgeoning fertility industry in India. Some scholars consider surrogacy as "wombs for rent" and argue that the fertility industry is like any other market in our global economy and surrogacy like any other product. Other scholars disagree with this and view the fertility industry as a powerful institution that is exploiting primarily poor women of color in countries where the market can be used to undergird policies that justify gender stereotypes. What is your opinion about the surrogacy market being the same as any other market? Explain your reasoning.

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