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# **The Practice of Sex Selection In Asian Region**

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# THE PRACTICE OF SEX SELECTION IN ASIAN REGION

## ABSTRACT:

The practice of sex selection has been increasingly popular and arguably in demand amongst modern day parents across the world, particularly in the Asian region, namely in China and India. While there is an argument of parent autonomy and their rights to choose and have the option to control and design their family structure, in other words, to have how many boys or girls, the topic of ‘designer babies’ is still considered highly contentious as well as controversial. The term initially originated from a setting in which advanced reproductive technology nowadays allow parents and doctors to ‘play god’-screening embryos for genetic disorders in order to select the best viable healthy embryos. Such practice, at first glance, seems to be justifiable as many view that the technology enables parents to avoid having severely disabled children and other serious genetic disorders or diseases to pass on to their new born babies. Yet, with the slippery slope and a fine line drawn between what is justifiable and perhaps an acceptable practice to perform and what is a definite strong ‘NO’, people have become increasingly misguided and ill-steered into a rather dark and mischievous corner of the practice of sex selection.

## WHY IS SEX SELECTION A PRESSING CONCERN AND DEMANDS SIGNIFICANT ATTENTION?

In essence, sex selection refers to the practice of choosing and having the ability to take preferences, regarding the sex of babies. In principal, the process of sex selection can be prior to pregnancy through the use of progressive advanced assisted conception technology. Several options are available for parents who attempt to determine and design the sex of their babies. This includes IVF (In Vitro Fertilisation), IUI (Intrauterine Insemination), Sperm spinning for gender selection<sup>1</sup>, and last but not least, tentatively the most successful and effective procedure of PGD (Pre Implantation Genetic Diagnosis). On the other hand, parents could also attempt to have the desired sex of their children by opting for the use of prenatal sex selective abortion i.e. after the child has been successfully conceived. Selective abortion is banned in most parts of the world yet the actual practice is still often enough carried out below the authorities’ radar.

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<sup>1</sup> Sperm separation is believed to simply increase the chances of an X-bearing or Y-bearing sperm fertilising the egg. There are two methods utilised for sperm separation. The first approach employs a washing technique. This can arguably separates the sperm between X and Y by how quickly the sperms swim. This approach is commonly known as the Ericsson Albumin Method, or Sperm Spinning’. Sperm spinning, depending on the exact and skilled technique used, have a potential of 50-80% success rate of having the specified gender. The second popular technique is developed by MicroSort. MicroSort uses a patented experimental procedure which helps separate the sperms basing on weight. It is reported that sorting for X resulted in an average of 88% X-bearing (female) sperm in the enriched specimen, and 93% of the babies have been female, and that sorting for Y resulted in an average of 74% Y-bearing (male) sperm in the enriched specimen and 82% of the babies have been male. See Khatamee M.A., ‘A controlled Study for Gender Selection Using Swim Up Separation’, Gynecologic and Obstetric Investigation Vol. 48, No.1, 1999, pp. 7-13.

It is reported by demographers that on average 105 boys are born for every 100 girls. The ratio is regarded as a natural sex ratio at birth. This can slightly vary in certain conditions and from one geographic region to the next, still, the general natural sex ratio at birth hovers around 105 boys to 100 girls.<sup>2</sup> Nevertheless, with the common practice of sex selection, especially in two dominant nations of the world, namely China and India, there has been an emerging phenomenon of an alarmingly skewed sex ratio at birth. That is to say, in China and India, it is strongly apparent that the majority of parents indeed place their preference for a boy over a girl. The current sex ratio at birth represents approximately 120 boys to 100 girls and in certain regions the number skyrockets to almost 126-128 boys to 100 girls.<sup>3</sup>

*'It is often said that women make up a majority of the world's population. They do not.'*<sup>4</sup> This notion given by Amartya Sen truly reflects the current concerning situation where such a perception has manifested itself in the form of the 'Missing Girls' incident in India and the 'Floating men' phenomenon in China. In China, not particularly surprisingly due to its long-lived cultural and social norms of preference for a son, there has been a soaring concern on the situation so-called 'Floating men', 'Bare Branches' or 'Surplus Males'. It is often observed by many scholars that China's One-Child' policy has resulted in an array of unique demographic events and transitions, including an event of unnaturally skewed sex ratio at birth, which is reported to be lingering around almost 126-128 boys to 100 girls in certain regions of the country. At present, millions of 'extra' boys have been born and already it is estimated that over 41 million bachelors will not have women to marry. If nothing is done to change this trend, it is noted that by 2020 there will be 55 million 'excess' men in China.<sup>5</sup>

In India, possibly a competing counterpart of China when it comes to sex selection and the persisting preference for sons that is entrenched in its culture, by most estimates, there are tens of millions of women missing in India due to the devaluing of female life beginning in the womb. Sex-selective abortion and female infanticide have led to highly distorted sex ratios at birth. In various parts of the nation, for instance, 126 boys are born for every 100 girls. This, as a consequence, triggers a shortage of women, which in turn leads to trafficking, mail order brides or bride selling and the usual suspect of prostitution. Women in India therefore are faced with a pounding crisis, where, according to most recent national population survey figures, there are roughly 37 million more men than women.<sup>6</sup>

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<sup>2</sup> Bakalar N, 'Sex Ratio Seen to Vary by Latitude', New York Times, April 20, 2009. Available at [http://www.nytimes.com/2009/04/21/health/21sex.html?\\_r=0](http://www.nytimes.com/2009/04/21/health/21sex.html?_r=0) (Last visited on February, 25<sup>th</sup> 2014).

<sup>3</sup> Guilmoto C.Z., 'Skewed Sex Ratios at Birth and Future Marriage Squeeze in China and India', Demography (DOI) Issue 49, Publication of Population Association of America, 2011, pp. 77-100.

<sup>4</sup> Sen A, 'More Than 100 Million Women Are Missing', New York Review of Books, December 20, 1990. Available at <http://www.nybooks.com/articles/archives/1990/dec/20/more-than-100-million-women-are-missing/?pagination=false> (Last visited on February, 22<sup>nd</sup> 2014).

<sup>5</sup> Dudley L. Poston Jr., Eugenia Conde, and Bethany DeSalvo, 'China's Unbalanced Sex Ratio at Birth, Millions of Excess Bachelors and Societal Implications,' Vulnerable Children and Youth Studies 6, No. 4, 2011, pp. 314-320.

<sup>6</sup> Smith C., 'the missing girls of India', Washington Times, September 16<sup>th</sup>, 2013. Available at <http://www.washingtontimes.com/news/2013/sep/16/smith-the-missing-girls-of-india/?page=all> (Last visited on February, 24<sup>th</sup> 2014).

The unnerving scenario unfolding both in China and India inevitably results in more and more violence against women throughout the regions. In India, for example, the evidence is apparent and significantly highlighted in the case of the 2012 worldwide infamous gang rape in New Delhi where a 23-year-old girl was raped on a bus by allegedly 6 men, which eventually resulted in the girl's tragic death. Many perceive the incident as a correlating reflection of the skewed sex ratio between men and women. Violence seems to be aggravated in the regions where there is higher number of men than women.

*'Certainly the situation is, if anything, worse in both India and China than it was 10 years ago, Certainly violent crime against women increases as the deficit of women increases. This will constrain the life chances of females far into the future'.<sup>7</sup>*

It is reported that violent crimes in India have risen by nearly 19 percent from 2007 to 2011, while the kidnapping of women (much of which is related to forced marriage) escalated about 74 percent in that time. That's a distinct increase from the five years before 2007, when violent crime actually dropped by 2.8 percent, and the kidnapping of women increased by 41 percent.<sup>8</sup>

#### **WHY DO THEY DO IT? : JUSTIFYING SEX SELECTION AND REASONS WHY THE PRACTICE HAS BEEN ON THE RISE**

It is rather essential to try understanding the phenomenon of choosing a baby boy over a baby girl in order for us to fully grasp the magnitude of the existing situation. One of the reasons on top of the list would be cultural context and social norms and values. From first glance, discrimination against girls often boils down to patriarchal values derived from tradition, that is to say, the notion that only a son can carry on the family name and continue the family line. This is mostly true in China as the tradition, especially one descended from Confucian system, dictates that only a son could continue with the family legacy and take on the family business. Hence, for a girl born into a Chinese family, she would be likely deemed as worthless and a burden to the family.<sup>9</sup> In India, a baby girl is perceived to constitute a source of impoverishment due to the long-practiced dowry system where the family of the bride has to pay a considerable amount of money to the groom's family during the wedding ceremony. Accordingly, in a dowry practising system such as the one existing in India, having a boy instead of a girl is considered to present a family with significant economic gains.<sup>10</sup> In Thailand, even though there is no strong and apparent evidence vis-à-vis choosing a boy over a girl, traditional sayings comparing a baby girl to a public toilet could certainly send out a message of what and how women were used to

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<sup>7</sup> Remarks made by the author of *'A Surplus of Men a Deficit of Peace'* Valerie M. Hudson during an email interview with Anjani Trivedi and Heather Timmons, reporters from the New York Times Available at <http://india.blogs.nytimes.com/2013/01/16/indias-man-problem/> (Last visited on February, 27<sup>th</sup> 2014).

<sup>8</sup> Trivedi A. and Timmons H., *'India's Man Problem'*, India Ink January, 16<sup>th</sup> 2013. Available at <http://india.blogs.nytimes.com/2013/01/16/indias-man-problem/> (Last visited on February, 27<sup>th</sup> 2014).

<sup>9</sup> Filmer D, Friedmaan J. and Schady N., *'Development, modernization and childbearing: The role of family sex composition'*, World Bank Economic Review Volume 23 No. 3, 2009, pp. 371-398.

<sup>10</sup> Bhat P.N.M. and Halli S.S., *'Demography of brideprice and dowry. Causes and consequences of the Indian marriage squeeze'*, Population Studies Volume 53 No. 2 July 1999, pp. 129-149.

or perhaps still be regarded, valued, and treated within particular parts of the Thai community.

Apart from the above reason of tradition, social norms and values, another justification for parents to opt for sex selection is arguably family (re)-balancing. Parents could argue that, based on the idea of 'autonomy', they can design and structure their own family how they wish and deem please. Therefore, in a household where there are already enough girls, parents may decide to give birth to a son in order to rebalance the family structure. As such, in families which assisted conception can be resorted to, parents may undergo PGD tests or other advance medical techniques mentioned previously to help ensure they will get a baby of the sex they want. However, for those less unfortunate, prenatal sex selection, i.e. sex selective abortion, or even female infanticide would be employed in order to achieve the desired, yet wicked and unethical, results.

Other justifications put forward by parents who wish to alternate to sex selection practices include reasons on the grounds of religion. For example, in Buddhism it is believed that only a boy can become ordained which will, as a result, procure the parents with fast way 'tickets' to heaven. Ironically, it is highly paradoxical for parents to use religious beliefs of attaining nirvana as a defence against performing an immoral act of sex selective abortion, let alone the unspeakable post-natal sex selection of female infanticide.

In addition to the aforementioned grounds for performing sex selection, catalysts to such increasing trends include higher access to ultrasound technology as well as certain state legislations, the one child policy in China and the legalisation of abortion. With the diffusion of modern prenatal diagnosis technology, mainly amniocentesis and ultrasonography during the 1970s across Asian region, by the 1980s, thousands of hospitals and even private practicing clinics were already offering sex diagnosis services to any walk-in clients.<sup>11</sup> This coupled with abortion legalisation spreading across Asian – legalised in China since 1950s, in Vietnam since 1960s and in India since 1970s for instance – prenatal sex identification has always been the perfect and affordable solution for families that wish to choose the sex of their children.<sup>12</sup>

#### **SEX SELECTION AND THAILAND'S MEDICAL TOURISM: A DESTINATION FOR ASSISTED CONCEPTION AND SEX SELECTION**

Having in mind that sex ratio at birth in Thailand is considered relatively normal at approximately 105 boys to 100 girls<sup>13</sup>, and there has been no clear sign or any prominent facts of parent's preference of boys over girls, growing concerns have been brought into limelight regarding Thailand being one of the most popular and

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<sup>11</sup> Ramanamma A., and Bambawale U., 'The mania for sons: an analysis of social values in South Asia', *Social Sciences and Medicine* Volume 14, No.2, 1980, pp. 107-110.

<sup>12</sup> Chen, Yuyu, Li H. and Meng L., 'Prenatal Sex Selection and Missing Girls in China: Evidence from the Diffusion of Diagnostic Ultrasound', Tsinghua University Working Paper, Beijing 2011.

<sup>13</sup> Available at [http://www.quandl.com/WORLDBANK/THA\\_SP\\_POP\\_BRTH\\_MF-Thailand-Sex-ratio-at-birth-females-per-1-000-males](http://www.quandl.com/WORLDBANK/THA_SP_POP_BRTH_MF-Thailand-Sex-ratio-at-birth-females-per-1-000-males) (Last visited on February, 21<sup>st</sup> 2014).

commercial destinations in the Asian region for ‘tourists’ searching for assisted conception services, including the favourite option of sex selection practices.

From several interviews conducted at one of the most prestigious private and public hospitals in Bangkok with arguably one of the front-runners for assisted conception physicians, it has been revealed that there has been a rising trend for sex selection being requested by foreign clients who have flown their way in from hundreds and thousands of kilometres away. It is noted that out of the patients seeking treatment for assisted conception in Bangkok, Thailand, either with or without a specified preference sex of the baby, foreigners, especially the Chinese, Indian, and the Eastern European account for over 70-80% of the overall figure.

As mentioned earlier that nowadays more and more practices of PGD tests are being carried out as part of the package deal for assisted conception services, the physicians the author had interviewed expressed that over 80% of PGD practices are basically a disguised method of looking into the sex of the foetus before the implantation into the mother’s womb. In addition, they all share similar comments that such practices are usually performed regardless of the guideline requirements which stipulate that in order for physicians to commence a PGD analysis test, there must be apparent indications of medical concerns that might give rise to issues vis-à-vis the overall conditions or medical states of the viable foetus.<sup>14</sup>

#### **REGULATIONS AND LITIGATIONS: THE CASE OF THAILAND**

Laws and legal regulations on assisted reproductive technology services (ART) differ from country to country. In South and East Asia, the primary response initiated by state authorities was to criminalise sex selective abortions. This event happened in China, India, and South Korea during the 1990s. As for Thailand in particular, there has always been a cutthroat ban on abortion as a whole, which is of course subject to special circumstances as an exception. However, as the concern regarding sex selective abortion has emerged and gradually evolved, in 1997 the issue was brought to the legislature’s attention and specially tailored provisions regulating sex selection, either at the prenatal or post natal stage, were issued by the national medical association in the Regulation on Assisted Reproduction Technology Standards and Guidelines No.2 B.E. 2545 (as a supplementary addition to the 1997 Regulation No.1 issued five years prior to the 2004 Regulation). Specific concerns vis-à-vis sex selection have been represented under section 4(3) of the Regulation where it stipulates that Pre Implantation Genetic Diagnosis (PGD) test can only and solely be performed under the event that there is a strong suspicion involving the disability or genetically transmitted diseases of the foetuses. Also, it is highlighted that PGD, which is to be undergone so as to serve the purpose of identifying the sex of the foetus, is not allowed and strictly prohibited.<sup>15</sup>

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<sup>14</sup> Interviews with physicians from Vichaiyut Hospital and Chulalongkorn University Hospital during the month of December 2012. The identity of the physicians involved in these interviews have been asked to be masked due to concerns regarding medical ethics and hospitals’ confidentiality.

<sup>15</sup> Regulation on Assisted Reproduction Technology Standards and Guidelines B.E. 2540, National Medical Association Order 1997, The Kingdom of Thailand.

Notwithstanding the fact that hospitals, both private and public, and fertility clinics in Thailand, especially in Bangkok, have astonishingly flourished over the past decade, legislations or regulations in use so as to tackle and curb such controversial activities, as mentioned above, are shockingly inadequate and evidently weak to enforce, let alone to implement onto this particular industry. This is because the laws and regulations that have been issued for the purposes of regulating ART (Assisted Reproductive Technology) industry are, notably, lacking in liability clauses and legally binding provisions. That is to say, the text simply dictates and prescribes the terms and conditions ART physicians are deemed to abide by but nowhere in the regulations specify the criminal liability imposed on those who do not comply with the rules and stated provisions.

Until now, notably, there is no sign of any improvement or amendments regarding the laws governing such practices. This could be due to the fact that a large number of commercial entities are depending on this type of services. In other words, it could be said that Thailand has a relatively large scale of medical tourism and therefore it could be harmful to the business should there be any strict regulations imposed upon such medical practices.<sup>16</sup>

Currently, it is evident that there is still no established legal action taken against the practice of such ‘problematic’ fertility treatment with respect to the use of assisted conception whether it concerns sex selection or PGD related undesirable results generating from such range of medical treatments. It could be the case, as suggested by one of the physicians interviewed by the author, that the concerning and involving parties are mostly foreigners and therefore taking the case (if there is any) to court in Thailand can be quite a challenge and undeniably present the potential claimants with complications and difficulties.

## **CONCLUDING REMARKS**

The author’s concern towards the situation in Thailand primarily focuses not on the matter of skewed sex ratio, which is not such a pressing problem in the country, but on the fact that throughout the industry of medical tourism, specifically in the area of assisted conception, there are surprisingly limited efforts and initiatives taken up to regulate reproductive treatment. More importantly, based on the perceptions of those who are involved with such practices, it is viewed, regardless of the implication of medical ethics or morality, that only a minimum standard should be enforced upon these area of practices because too much enforcement or greater regulation could potentially lead to a loss in revenue. To say the least, it is expressed by some ART doctors that stronger regulations over the medical assisted conception industry will directly lead to a potential decrease in revenue attained by those fertility facilities. It should be deeply troubling to society at large that such a perception towards the matter prevails and persists within this medical profession.

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<sup>16</sup> See India as an example – this is where medical tourism industry is significantly large and any laws passed to limited the practices of such industry would be countered by the people benefiting from this business practice. Such conflict of interests presented in this unfortunate scenario involves relevant parties and stakeholders from both individual and national level.

In addition, leaving the phenomenon of the world's skewed sex ratio aside (or perhaps China and India to be specific), potential incidents that could be facing Thailand are the issue of exploitation and public safety arising from little regulations put in place for safeguarding and monitoring the practice of sex selection. According to the statistics and figures reported, more and more foreigners are travelling into Thailand in search for sex selection fertility treatment.<sup>17</sup> Should Thailand still not attempt harder to adopt or pass any laws to effectively enforce and produce a concrete definite effect onto the assisted conception industry, Thailand could be in grievous danger of turning into a notorious hub and internationally recognised destination for the unspeakable practice of sex selection.

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<sup>17</sup> A new study found around 120 couples attended a single IVF unit in Thailand over an 18-month period, to avoid Australia's regulatory ban on social sex selection. See also, '*Couples travelling overseas for gender selection*', Assisted Conception, The West Australian July, 20<sup>th</sup> 2013. Available at <http://health.thewest.com.au/news/798/couples-travelling-overseas-for-gender-selection> (last visited on February, 28<sup>th</sup> 2014.)