JANIN AND THE MODERN MEDICAL RESEARCH IN THE LIGHT OF ISLAMIC FIQH

Fahd Anwar*

Abstract

The developing human inside the womb of the mother is termed medically as "embryo" till eighth week of development and afterwards it is termed as "fetus". The Arabic word Janin includes both the embryo and the fetus. Vast research is being done on the janin related to its development, its status and its use for curative purpose.

The procedures like Artificial Insemination, Surrogacy, Induced abortion, Human Cloning should be seen from Islamic point of view to understand the Will of Allah(SWT). These procedures have been discussed by the contemporary jurists in the light of the guidelines provided by shari'ah. The present work also provides the historical views on janin. It will be seen theat the Holy Qura'n invites the readers to look upon their creation and development in order to understand the greatness of Allah Almighty.

Embryo, Fetus and Janin

Before proceeding to our discussion on the modern discoveries related to janin in the perspective of Islamic fiqh, we shall look upon the definition of embryo, the fetus and the concept of the beginning of life in the developing human. Keeth Moore and Persuade define embryo as:

^{*} M.phil, Islamic Studies, Allama Iqbal Open University, Islamabad, Pakistan.

"This term refers to the developing human during its early stage of development. The embryonic period extends to the end of the eighth week, by which time the beginnings of all major structures are present" (1).

According to this definition the developing human inside the womb of the mother upto the end of the eighth week is called "embryo". In other words, it can be defined as:

"In humans, the developing organism from fourth day after fertilization to the end of the eighth week" (2).

It is to be kept in mind that the developmental process of the human being is divided in weeks. This division is according to the formation of various structures. During the embryonic period i.e. first eight weeks although the beginnings of all major structures are present but only the heart & circulation are functioning⁽³⁾.

Difference between embryo and fetus

Sometimes the word embryo and fetus are used in place of each other.

However there is a difference between them, although both are the terms applied to the developing human inside the womb of the mother. Embryo is the developing human in the first eight weeks of development while the fetus refers to the developing human after the embryonic period upto the birth of the baby Moore & Persaud write:

"After the embryonic period (eight weeks), the developing human is called a fetus. During the fetal period (ninth week to birth), differentiation and growth of the tissues and organs formed during the embryonic period occur".

According to Dorland's medical dictionary, fetus is defined as:

"The developing young in the uterus, specifically the unicorn offspring in the postembryonic period in man from seven to eight weeks after fertilization until birth" (5).

In our work, we shall focus primarily on the issue of the fetal use for the research purposes. This will also include the issue of stem-cell research, its ethics and how the divine Islamic law guides us in the solution of the modern medical issues related to the embryo. In the end we shall also discuss the Islamic view of preconception gender selection.

The other topics related to the medical research upon embryo have been discussed sufficiently by other researchers, therefore, we shall just briefly provide here an overview of them:

Artificial Insemination (AI)

Artificial insemination is a procedure in which the male sperm is artificially transferred to the womb of the woman. Sometimes the male and female eggs are artificially fertilized in a Petri-dish outside the womb of the mother. The resulting embryo undergoes its initial stages in the petri-dish or test tube and is called as 'test-tube baby'. This resulting Zygote is then transferred into the womb of the mother until the developmental stages are completed and a full-term baby is born. The issue of 'Artificial Insemination' has been discussed by many Islamic jurists individually and collectively. Muftī Dr. Abd al Wāhid summarizes the procedure of test-tube implantation in four steps:

- i- Taking the semen of the husband
- ii- Taking the ovum of the wife
- iii- Fertilizing the male-sperm with the female ovum
- iv- Inseminating the fertilized egg in to the womb of the wife.

He permits these steps for the treatment of insterility. Therefore, if for the reasons, a couple adopts this method to have the children, it will be permissible. He emphasizes that the method of test-tube is permissible only when the semen of husband and wife are mixed and the resulting zygote has been grown in the womb of wife. All of the other ways are impermissible. It is very important that the privacy

(satr) of a lady should be maintained and a female doctor must handle the procedures related to a lady.

The issue was also discussed by the council of the Islamic Fiqh Academy (Majlis Majma' al fiqh al islāmī) in its seventh and eighth seminar held in 1404 hijri and 1405 hijri respectively. The majlis discussed the different methods of artificial insemination and afterwards recommended the following

- 1- Artificial insemination is a permissible treatment for a married infertile woman and her husband.
- 2- The first method (in which the semen of a married man is injected in the womb of his wife for in vivo fertilization) is permissible keeping the above mentioned conditions⁽⁶⁾, after establishing that the woman really needs this method for pregnancy.
- 3- Third method (in which the sperm and ova of the husband and his wife are fertilized in a test-tube, afterwards it is injected in the same wife donating ova) is permissible in itself from the religious point of view. However because of the other suspicious issues, it is not allowed at all, therefore, this method should be opted under the circumstances of high need and with the conditions mentioned.
- 4- The academy decides that the lineage of the newborn will be established from the donor married couples in the above mentioned permissible methods. The heritage and others rights are, under the lineage. Therefore, the heritage and other ruling will persist between the child and the man and wife to whom the lineage is related.

The academy prohibited all the other methods of artificial insemination because in these methods either the sperm and ovum are not of the married couple or the volunteer pregnant women (surrogate mother) is a stranger to the married couple whom sperm and ovum are taken. Because of the many more ethical issues related to AI (Artificial Insemination), the academy advised that even the

permissible methods of AI should be used in case of extreme need. If adopted should be performed with extreme care and total protection of mixing of different semen plus the fertilized constituents⁽⁷⁾.

Surrogacy

Sometimes an infertile couple makes an agreement with another woman to carry a child. Such a woman is called 'a surrogate mother' and the procedure is called as 'surrogacy'. The surrogacy can be of various forms.

- 1- Sometimes as in fibroids uterus 'hysterectomy' is done in which the uterus of the woman is removed. This woman cannot bear a child but she can donate the ova (eggs). Therefore, her eggs are fertilized with the sperms of her husband and the resulting embryo is then placed in another healthy woman. Before this surrogate mother is impregnated, a contract is signed between the couple and this lady (surrogate) that the later will hand over the baby to the donor couple. This way of surrogacy is impermissible as it creates problems in determining the mother of a newborn child and many other issues.
- 2- Another form of surrogacy is when a woman is infertile (because of a problem in the uterus or an inability to produce eggs), and another woman donates the eggs. These eggs are then fertilized with the sperms of the husband and then injected in the womb of the donor woman. The child thus born is handed over to the couple. This procedure involves the mixing of sperms and eggs of a man and a woman without marriage. It is obvious that such a way of artificial fertilization is not permissible.
- 3- Another form similar to the above mentioned is impressible. This is when the resulting embryo is not inseminated in the donor woman but another woman.

4- Surrogacy will be impressible legally in a case where a woman avoids the pregnancy because of the associated complications, inconveniencies or the disfigurement.

There is another form of surrogacy in which a man having two wives uses one of his wives as a surrogate mother and other as a donor. This form was allowed in the early session of Majma' al Fiqh al Islāmī but later declared as impressible⁽⁸⁾.

Abortion

Abortion is being used now a day to avoid the child-birth widely. The legal status of the abortion differs depending upon the age of the fetus. Most of the scholars particularly the hanafi and shāf $\bar{\imath}$, keep the opinion that the life of the developing embryo starts after the completion of one hundred and twenty days. This is the time when an angel blows the spirit $(r\bar{u}h)$ in the fetus and thus it attains the status of a living being. We shall discuss this in the beginning of life in detail in the coming pages. These scholars thus consider any attempt to abort the fetus after $hhar\bar{a}m$ undred and twenty days, totally impermissible (). Mufti Dr. Abd al Wāhid writes:

"When one hundred and twenty days are passed of pregnancy, the spirit is breathed in the fetus. Therefore abortion is absolutely impressible ($har\bar{a}m$) after this duration, and the one who does this will be considered a murderer.

Before this duration, this act is disliked $(makr\bar{u}h)$ if done without any considerable excuse, although the one who does this will not be taken as a murderer. If there is a legally considerable excuse the abortion is permissible before this duration. Some of the examples of legally considerable excuses are as follows:

i- When the breast-milk of a lady finishes after the pregnancy and the father of the child is unable to heir a lady for feeding the child. Consequently, there is a fear of death of the child who was on breast-feeding in the absence of alternate basic sources.

- ii- When pregnancy has started but the lady is unable to bear it because of the other illnesses.
- iii- When there is a strong probability of the child with incomplete structure ⁽⁹⁾.

The Islamic Fiqh Council in its twelfth seminar discussed the issue of aborting an embryo having incomplete structure. The council issued the following resolution based upon the opinion of the majority of members:

"If the fetus is of one hundred and twenty (120) days, its abortion is not permissible, although medically he is being diagnosed to have developed incompletely, However, if the report of the committee of the reliable expert doctors is proving that the survival of the fetus is really dangerous to the life of the mother, the abortion of the fetus is permissible whether he is complete or incomplete, to avoid the greater harm.

If pregnancy has crossed hundred and twenty days and the report of the expert reliable doctors' committee along with the experimental sources and equipments prove that the baby is so incompletely formed that he cannot be cured and if born his life will be a burden and ailing for him and his family, he can be aborted if the parents demand to do so. The council advises the doctors and the parents to keep the fear of Allah and must take care" (10).

Human Cloning

Human cloning is a procedure which involves the production of genetic double of a cell or an organism. Briefly the cloning involves the removal of the nucleus of a human cell (somatic cell) other then the productive cells (eggs or sperms). The nucleus is the constituent of a cell that contains the coding material i.e. DNA. The nucleus is then inserted into the egg-cell from which nucleus has been removed. An electrical charge is then applied to the egg. The egg starts to de-vide and re-divide which is now considered to have been fertilized. The egg is then inserted into the surrogate mother

where it grows and a baby thus born is identical to the adult whose somatic cell was used for the insertion of nucleus into the egg.

Human cloning is still theoretical in contrast to animal cloning which has been claimed to be succeeded through the birth of dolly, a sheep. The possible achievement of cloning has raised many ethical issues e.g.:

- The status of the clone which is a photocopy of the original one. Whether the clone keeps its own status or it will be just a double of an existing entity.
- A possible harm of adopting human cloning as a method of reproduction is that people will start avoiding the natural way of reproduction and this will imbalance the society as a whole.
- Some Muslim scholars have strongly rejected the human cloning because it will lead to the mixing of lineage. The relations which have been given a place by the religion will be minimized. Look for example a case in which a clone is produced from a married person having children. The clone which is produced is on the one hand will be the brother of the children while on the other hand he is not a child of their father but a photocopy of him.
- Human cloning is also feared because of its possible misuse for economical benefits. People and companies may take huge amount of money to produce an identical coy of a person without the consent of the person. Or a person can be threatened to have a clone.

1-Cloning is Contrary to Allah's Ordained Way

Allah Almighty has expressed the creation to be a mixture of male and female genetic material and not to be a duplication of one another. Moreover, in natural procreation there is significant selection of the fertilized egg, which is undermined in cloning.

2- Individuality

God intended human beings to be physically, intellectually, and spiritually different. Cloning will make human copies of one mother.

3- Legal Status

A clone lacks its legal definition e.g. would be be considered a twin brother or the son of a man whose somatic cell was used.

4- Human Dignity

Cloning is degradation to human dignity.

5- Potential Harms

For example clones have a shorter life-span, significant increase in genetic disease, and an imbalance of sex ratio etc.

6- Potential benefits

There are also some potential benefits of cloning. Animal or Plant cloning may be useful using cloning techniques to generate human tissues or organs. Therapeutic cloning may be used to obtain a nerve graft or an organ through the stem-cells. This organ can then be used as a replacement organ in transplant procedures⁽¹¹⁾.

Human cloning has also been declared impressible (*ḥarām*) on the basis of change in the creation of Allah (*taghyīr fī khalqillah*). This is because:

'The production of children through cloning prevents applying many of the sharī ah rules such as the rules of the marriage, kinship, alimony, fatherhood, Son ship, inheritance, custody, Muharim and 'asbat (forbidden degrees of consanguinity) in addition to many other shar i rules. The affinity would get mixed and would be lost. This goes against the natural way that Allah has created people, in terms of reproduction, This is an evil process and it would change the structure of society. Therefore human cloning is Haram from Islamic perceptive and it is not allowed.

Allah Almighty said quoting the cursed shaytan.

﴿وَلَا مُرَنَّهُمُ فَلَيُغَيَّرُنَّ خَلُقَ اللَّهِ ﴾ (12)

"I will command them to change the creation of Allah".

The Islamic Fiqh Academy Jedda (Majma al fiqh al islāmī) discussed the issue of human cloning. The academy on the basis of the studies presented, the discussions held thereon and the principles of shari'ah decided the following:

- 1- It is prohibited to clone human being, such as in the abovementioned two cases or by another method that results in the multiplication of human species.
- 2- In case of violation of Shari'ah's prescriptions underlined in the first paragraph, consequences of such acts should be brought to the notice of Academy so as to clarify shari'a rules thereon.
- 3- All cases implying the intervention of a third party in the procreation process is prohibited, whether a uterus, an ovule, a spermatozoid or a body cell for cloning.
- 4- It is permitted by shari'ah to use cloning techniques and genetic engineering in the field of microbiology, botany and zoology, in order to serve general interest and prevent inconvenience.
- 5- The Council Invites the Islamic countries to adopt laws and rules in order to close all direct and indirect avenues from local or foreign institutions research institutes and foreign experts so as to prevent them from using Islamic counties as experimentation fields for the propagation of cloning.
- 6- The council of the Academy and the Islamic Organization for medical sciences shall jointly ensure the follow up of the issue of cloning and of any discovery in this field, will establish the terminology of cloning and organize seminars and meetings in view to popularize Shari'ah rules on the subject.
- 7- The council calls for the establishment of specialized committees including experts and Figh scholars, in order to

set up the rules of ethics to be observed in the field of research in biology in Islamic countries⁽¹³⁾.

Historical Views on Human Embryology

Before discussing the modern medical research on the developing human, we briefly present here the historical views on human embryology:

A Hindu scripture:

Garbha Upanishad a scripture of Hindus describes ancient ideas concerning the embryo as:

From the conjugation of blood and semen the embryo comes in to existence. During the period favorable for conception, after the sexual-intercourse it becomes a Kalama (one day old embryo). After remaining seven nights, it becomes a viscid. After a fortnight, it becomes a spherical mass. After a month, it becomes a firm mass. After two months, the head is formed. After three months, the limb regions appear.

Greek Scholars And The Study Of Developing Human

Greek scholars and philosophers made many contributions in the field of embryology. Hippocrate (460-377 BC) who is considered the father of medicine recommended.

Take twenty or more eggs and let them be incubated by two or more hens. Then each day from the second to that of hatching, remove an egg. Break it and examine it. You will find exactly as I say, for the nature of the bird can be likened to that of man.

Aristotle promoted the idea that the embryo developed from a formless mass, which he described as a, "less fully concreted seed with a nutritive soil and all bodily parts", this embryo, he thought arose from menstrual blood after activation by male semen.

Claudine garcon described the development and nutrition of fetus and the structures that we now call the allantoids, amnion and placenta⁽¹⁴⁾.

The Qur'an and the Developing Human

The Holy Qur'an invites the readers to have a glance upon their creation, formation and development. Allah Almighty has created the man from nothing.

There has come upon man a period of time in which he was nothing worth mentioning. We have created man from a mixed sperm-drop to put him to a test; then We made him able to hear, able to see.

The first thing required for the creation of man is semen. The Holy Quran remembers it as '*Nutfah*' (drop of semen) as in the verse mentioned above and may other verses, for example:

From the drop of semen ,He created (16).

The Holy Qur'an remembers this drop of semen as mixed $(Amsh\bar{a}j)$. $Amsh\bar{a}j$ means a mixture. It is accepted in the modern medical sciences that the semen or Nutfah is composed of:

- 1. Sperms i.e. the male germ cells.
- 2. The secretions from the following.
 - a- Vas-Deferens
 - b- Seminal-Vesicles
 - c- Prostate
 - d- Urethral Gland
 - e- Bulb o urethral Glands (17).

After the fertilization of male and female germ-cells the resulting structure (zygote) is placed in the womb of mother which then undergoes through many stages. The Qur'an tells that the developing human undergoes through various stages:

"O mankind, if you are in doubt about Resurrection, then (recall that) We created you from dust, then from a drop of semen, then from a clot ,then from a piece of

flesh, either shaped or unsnapped so that We manifest (our power) to you. We retain in the wombs whatever We will to a specified term" (18).

The following verse of Surah- Al-Mu'minun also enlightens the stages of development. The translation is given here

Then We turned the sperm-drop into a clot, then We turned the clot a fetus lump, then We turned the fetus-lump into bones, then We clothed the bones with flesh thereafter We developed into another creature. So, glorious is Allah, the Best of the Creators.

There are other verses in the Qur'ān relevant to the embryology but presently we confine ourselves to these mentioned above.

Shari'ah Guidelines for the Research upon Human Subjects

The research involving the human beings is different from that involving the materials. It is neither the matter of mathematical numbering that is arranged as wished to have the required result nor is it the agriculture based in which seeds and plants are dealt. Rather it involves the man, the crown of creature. So the researches must be very much precautious not to make any harm to the subject under research. It is also accepted worldwide that sanctity and dignity of a person should not be affected. We shall see what are the guidelines provided by shari'ah for the research involving human subjects. Following maxims taken from Al-Majalla elucidate the shari'ah guidelines in the context of treatment & research involving human subjects:

- 1- Neither harm nor reciprocation of harm (لاضرر و لا ضرار) i.e.one should neither suffer any harm nor should impose harm to others. This implies that a person should not endanger his health or life. Also a physician or a researcher should not do any harm to his patient.
- 2- Harm is to be removed (الضرر يزال) This implies that if a person is really suffering from an ailment that is disturbing his daily activities and he is becoming dependant on others, then possible permissible means are used to cure his ailment.
- 3- Harm is to be removed as much as possible (21)(الضرر يدفع بقدر الإمكان). This stresses the removal of harm from the society and individual.
- 4- A special harm is tolerated in order to remove the common one (22)(يتحمل الضرر الخاص لدفع الضرر العام):This implies that sometimes a harm of a particular person may be tolerated if it provides benefit to a large group of people.

5- Greater harm is removal by the lesser one (23) (الضرر الأشد يزال بالضرر الأخف)

Many a times a surgeon comes across a situation in which he has to decide whether the affected part should be removed or saved. In these circumstances he will see what imposes a greater harm to the patient either removal or saving the organ. Similarly, an obstetrician must has to choose between the abortion at the initial stage of pregnancy when the fetus is suffering from an anomaly or the continuation of pregnancy.

- 6- Necessities allow the unpermitted (24)(الضرورات تبيح المخطورات) This implies that to save a life, those things which are not allowed to be utilized can be utilized according to the need. An example is the use of pork and wine for the one who has nothing to eat & drink and is endangered to die.
- 7- Necessitates are estimated by the extent thereof (الضرورات تقدر بقدرها) This implies that one should restrict himself up to the extent of need.
- 8- Latitude should be afforded in the case of difficulty (26) (الأمر إذا ضاق إتسع). This implies that when the masses of people are suffering from a difficulty in a particular problem, they will be given relaxation from shari'ah. A necessary condition in such a case is that the relaxation given does not violate any other textual injunction.
- 9- Difficulty begets case (27)(المشقة تجلب التيسير). This implies that when a person or a society or a group of people in large are facing a health-problem and the solution apparently seems against shari'ah. Then the jurists and scholars will aid in their solution keeping in view the primary sources of shari'ah and the secondary sources. They will also see the customs and consider the severity of the need of that group of people. A textual example is of tayummum(تيمر).

References

- 1- Moore and Persaud, The Developing Human, p.3.
- 2- Dorland's Medical Dictionary, p.290.
- 3- Moore and Persaud, The Developing Human, p.3.
- 4- Ibid.
- 5- Dorland's Medical Dictionary, p.327.
- 6- There conditions are summarized as below:

The privacy (satar) of a muslim woman should be kept and the women should not be exposed in the presence stranger.

Cure of an ailment or treatment of an unnatural worrisome physical condition is a lawful purpose for which a women can expose her body upto the extent of need.

The exposure should be done in the following order depending upon the availability: a muslim female doctor, a non-muslim female doctor, a male muslim doctor, a non-muslim male doctor.

The presence of the husband or another female is necessary during treatment. See: Paichīda Masāil Ka Shar'i hal, Idāra al Qur'ān, P.164, 1422 AH.

- 7- Shaikh Habib b. al-Khaujah, The Resolutions and Recommendations of Islamic Fiqh Academy, Resolution No 16(4-3). Also see. Asr hāzir Kay Paichīda Masāil ed. Molana Mujāhid al Islām Qasmī, pp.165, 166.
- 8- Ibid.
- 9- Abd al Wāhid, Mufti, Dr. Marīdh wa Ma'ālij Kay Islāmī Ahkām, p. 229.
- 10- Paichīdah Masāil Kā Hal, ed. Mujāhid al Islām Qasmī, Molānā. p. 245.
- 11- Hassam E.Fadel, The Islamic View Point On New Assisted Reproductive Technology in Fordham Urban Law Journal, Volume 30, Issue1 Page: The Berkelay Electronic Press, 2002.
- 12- Surah Al-Nisa, 4:119.
- 13- Resolutions and Recommendations, pp. 211-212, Islamic Development Bank, Jeddah, 1421H(2000).
- 14- Keeth. L. Moore &T.N.Persaud, p. 9,10.
- 15- Surah Al Dahr, 76:1,2.
- 16- Surah 'Abas, 80:19.
- 17- Gull, Rājah Shahzād, Concise physiology,
- 18- Al Haj, 22:5, Al-M'ominun, 23:15.
- 19- Al-Majallah, Maxim: 19.
- 20- Ibid, Maxim: 20.
- 21- Ibid, Maxim: 31.
- 22- Ibid, Maxim: 26.
- 23- Ibid, Maxim: 27.

24- Ibid, Maxim: 21. 25- Ibid, Maxim: 22. 26- Ibid, Maxim: 18. 27- Ibid, Maxim: 17.