

Cambridge University Press

0521424283 - When did I begin?: Conception of the Human Individual in History,
Philosophy and Science

Norman M. Ford

Excerpt

[More information](#)

1

Introduction

1 Interest in the beginning of the human individual: the purpose of this book

From time immemorial, people have been fascinated about the origin of the human race. Ancient myths abound. The *Genesis* story of Adam and Eve is known well enough. That is how the Bible represents the beginning of the human race through the direct creative intervention of God. If all we knew was that God created man and woman with the same human nature, we ourselves might not do much better than the author of *Genesis* when it came to depicting how this might have happened.

The theory of evolution presented a challenge to science as well as to the imagination when it was a question of explaining exactly how the first humans appeared on earth. A greater challenge was presented to philosophers and theologians when, without prejudice to their belief in the creation of the soul, they had to explain how, in pre-historic times, animal life could have been transformed into human life, a human being, a *Homo*. The term *hominization* was coined to refer to this process. The enormous leap beyond animal consciousness to typical human rational self-consciousness could only have occurred in virtue of the presence and functioning of a rational life-principle or soul. It is the soul that constitutes matter into a living human individual. Being animated by such a spiritual soul would have sufficed to change a form of animal life into a human being. Signs of this newly acquired, reflective self-awareness would have provided sufficient empirical evidence to convince any reasonable observer that the momentous change of *hominization* had occurred. A low degree of intelligence in the newly formed human being would have been irrelevant. Heated debates focused on how human individuals could derive from forms of animal life instead of being created instantly from the

Cambridge University Press

0521424283 - When did I begin?: Conception of the Human Individual in History,
Philosophy and Science

Norman M. Ford

Excerpt

[More information](#)

2 *Introduction*

slime of the earth. It seemed the discussions only concerned remote events that must have occurred millions of years ago.

We are confronted with a similar problem if we consider precisely when each one of us began as an individual, whenever that moment may have been. One thing is certain – each one of us did come into existence by becoming a human being from something else. There was a point in time when we did not exist, except perhaps as a twinkle in our parents' eyes. Equally certain, there was another point in time when each of us did begin to be, though we cannot remember the moment, nor were we conscious at the time. Human beginnings, our beginnings, remain something of a mystery but they never cease to lose their fascinating appeal. We are ever curious about them. In particular, we would all like to know when we began to be human individuals. Most of us dismiss this as an impossible question to answer with any plausibility beyond an educated guess. I believe the time is ripe to search anew for an answer to this baffling question. It would need to be an answer that is obtained in the light of the scientific evidence available today as well as one that is able to withstand the critical probes of historical, linguistic and philosophical analysis. It is my hope that this book will suggest a reasonable solution to the riddle of when each of us began.

There are sufficient theoretical reasons to warrant pursuing an answer to this fascinating question for its own sake. It would be quite erroneous to confuse an interest in knowing when a human being begins with little regard for the proper respect and protection due to the early human embryo. The desire to know the plain truth would justify any energies spent in researching the beginning of the human individual. It is no trivial pursuit to investigate when the subject of a new personal existence actually begins, endowed by the Creator, as believers hold, with a destiny for eternal life and happiness.

Following recent developments in contraceptive techniques and especially in the treatment of infertility by *in vitro* fertilization, the question of when the human individual begins has also become an important practical issue. This practical interest derives from the bearing the answer to this question has on many moral problems. This is clear, for example, if one considers the relationship between when the human individual begins and the prevention of conception in the treatment of victims of rape within hours or days after the crime. In regard to the use of the intra-uterine device (I.U.D.) or the 'morning after pill' as contraceptives, it is important to know when a human individual begins if one wishes to avoid the risk of terminating the lives of embryonic human

Cambridge University Press

0521424283 - When did I begin?: Conception of the Human Individual in History,
Philosophy and Science

Norman M. Ford

Excerpt

[More information](#)*The purpose of this book*

3

beings by performing acts with possible abortifacient effects. The same applies to the morality of some *in vitro* fertilization procedures, such as the deliberate discarding or freezing of human embryos and experimenting on them. These cases give rise to more significant moral objections if there is reason to believe that the early human embryo is already a human individual from the time of fertilization.

Heated public debates have taken place around the world on the morality of these and similar procedures, precisely because of the respect due to the human embryo from conception. There would be quite a difference in degree of moral malice between deliberately terminating the life of a human being at the embryonic stage and deliberately destroying cells that are not yet a human being but are destined to become one in a matter of hours or days. These are not idle theoretical matters. Legislators framing laws to regulate new reproductive technologies cannot avoid facing the crucial question of when human individuals begin. They have been caught unprepared for these developments. It is inevitable that the law will lag somewhat behind society's needs since it cannot readily proceed in advance of public opinion. The problems are difficult but they will not blow away. We cannot bury our heads in the sand. The pressing challenge of enquiring into our human beginnings needs to be taken up urgently. I hope to make a contribution to this discussion in this book and enable questions arising from a consideration of the moral status of human embryos to be answered with a due sense of responsibility.

The principal purpose of this book is to try to determine when a human individual begins. If this proves to be too difficult, we might have to settle for a specific stage in the reproductive process before which it would be impossible to say with any plausibility that a human individual exists. We certainly do begin to exist as human individuals at some stage. After all, a birthday is celebrated in the firm belief that the one who was born years ago is the same one who is presently celebrating the happy event. This same individual would be a human being, a member of the species *Homo sapiens*, a human person. While the thread of life is continuous from one generation to the next, human individuals certainly do begin and cease to exist in our world of experience.

Morality and the law dictate what ought to be done or omitted in relation to a human individual, but they do not determine what constitutes a human individual. This is presupposed. We can readily identify a child and a dog. Our attitudes towards them differ because we recognize that the child is a personal being that is superior to the dog in nature and dignity. Our attitudes and feelings do not make the child human. On the

Cambridge University Press

0521424283 - When did I begin?: Conception of the Human Individual in History, Philosophy and Science

Norman M. Ford

Excerpt

[More information](#)

4 *Introduction*

contrary, we respond to the recognition of the child's human nature and personal dignity by our attitudes of respect and love. Indeed, our conscience reproves us when we fail to respond to the presence of a human individual with the appropriate attitudes of respect, care and love. I believe it is possible and proper to treat separately the question of the origin of the human individual without necessarily dealing with the related important legal and moral implications of the answer given.

2 **Moral status of the human embryo in government reports**

Public concern about the fate of early human embryos during *in vitro* fertilization procedures has prompted several Government inquiries, in view of their special status. The United Kingdom committee was chaired by Baroness Mary Warnock, a distinguished philosopher, whose name now identifies both the committee and its report. The *Report of the Committee of Inquiry into Human Fertilisation and Embryology* was presented to Parliament in July 1984. There was no unanimity expressed on the degree of respect due to the early human embryo. The different views of the members of the Warnock Committee reflected those of the community. However, the Committee agreed it was unable to discriminate adequately between the moral status of the human individual or person and what constitutes a human individual and when this takes place during the continuous developmental process. The Warnock Report clearly states:

Although the questions of when life or personhood begin appear to be questions of fact susceptible of straightforward answers, we hold that the answers to such questions in fact are complex amalgams of moral and factual judgements. Instead of trying to answer these questions directly, we have therefore gone straight to the question of *how it is right to treat the human embryo*. We have considered what status ought to be accorded to the human embryo, and the answer we give must necessarily be in terms of ethical or moral principles.¹

Three members of the Committee in an expression of dissent showed how superficial their concept of person was by denying that the question of the beginning of a person was one of fact:

'When does the human person come into existence?' This cannot be answered in a simple fashion either. The beginning of a person is not a question of fact but of decision made in the light of moral principles. The question must therefore be refined still further. It

Cambridge University Press

0521424283 - When did I begin?: Conception of the Human Individual in History, Philosophy and Science

Norman M. Ford

Excerpt

[More information](#)

The human embryo in government reports

5

thus becomes ‘At what stage of development should the status of a person be accorded to an embryo of the human species?’ Different people answer this question in different ways. Some say at fertilisation, others at implantation, yet others at a still later stage of development. Scientific observation and philosophical and theological reflection can illuminate the question but they cannot answer it.²

The Warnock Report did not recognize the human embryo as a human being or a person. However, it did go so far as to state categorically:

The status of the human embryo is a matter of fundamental principle which should be enshrined in legislation. *We recommend that the embryo of the human species should be afforded some protection in law.*³

In Australia the Victorian Government appointed Professor Louis Waller to chair *The Committee to Consider the Social, Ethical and Legal Issues Arising from In Vitro Fertilization*. Its final report was tabled in Parliament in August 1984 – *Report on the Disposition of Embryos Produced by In Vitro Fertilization*. It likewise failed to address itself to the questions of when an individual human being actually begins or the precise moral status of the early embryo. While it did not concede the human embryo is a human being or a person, the Waller Report did not regard the human embryo as an object or mere property:

The Committee does not regard the couple whose embryo is stored as owning or having dominion over that embryo. It considers that these concepts should not be imported into and have no place in a consideration of issues which focus on an individual and genetically unique human entity.⁴

The reference to ‘human entity’ does not indicate that the Waller Committee regards the product of fertilization as a human being. The choice of language is deliberately vague without any attempt being made to be philosophically precise.

The Waller Committee recommended that research on embryos be limited to excess embryos. The reasons given for this majority decision are as follows:

These members consider that formation of embryos solely for research or experimentation is not acceptable in Victoria today. From a moral perspective, it may be said that, regardless of the particular level of respect which different sections of the com-

Cambridge University Press

0521424283 - When did I begin?: Conception of the Human Individual in History, Philosophy and Science

Norman M. Ford

Excerpt

[More information](#)

6 *Introduction*

munity would accord an embryo, this individual and genetically unique human entity may not be formed *solely* and from the outset to be used as a means for any other human purpose, however laudable.⁵

In 1985 Senator Brian Harradine introduced a private member's Bill in the Australian Senate to prohibit destructive non-therapeutic experimentation on human embryos. After it had passed its second reading, the Senate appointed a seven-member Senate Select Committee to consider various aspects of the Harradine Bill in relation to experimentation on human embryos in the context of *in vitro* fertilization. Under the chairmanship of Senator Tate, the Committee was named the *Senate Select Committee on the Human Embryo Experimentation Bill 1985*. Its Report was presented to the Australian Senate on 8 October 1986 after having studied 270 submissions from all over Australia and heard evidence from a total of 64 witnesses. The Report and the nine published volumes of evidence heard by the Senate Committee demonstrate how seriously the Senate members took their task. Central to their deliberations and recommendations was the moral status of the early human embryo and the determination of when a human being begins.

The Senate Committee was well aware of the various international medical conventions that outline ethical guidelines for experimentation on human subjects, human beings or persons. In its own words:

...the Committee has not attempted to attribute the status of 'person' to the embryo in either its philosophical or legal senses. It does not intend to pronounce on this question...⁶

At the same time the Senate Committee believed that the ethical principles that apply to experimenting on human subjects are also relevant in the case of experimenting on human embryos for the simple reason that:

...the Committee was not persuaded that similar principles regulating destructive non-therapeutic experimentation should not apply to the embryo regarded as genetically new human life organised as a distinct entity oriented towards further development. No marker event advanced carried such weight that different principles should apply to distinguish the fertilised ovum from that which all would agree is a human subject.⁷

The Senate Committee considered various stages in the development of the embryo from fertilization onwards, but was unable to be satisfied that any particular one was decisive for establishing a point prior to which the

Cambridge University Press

0521424283 - When did I begin?: Conception of the Human Individual in History, Philosophy and Science

Norman M. Ford

Excerpt

[More information](#)

Problems of language

7

developing embryo could not be regarded as a human being. The Committee succinctly summed up its position as follows:

In this situation prudence dictates that, until the contrary is demonstrated 'beyond reasonable doubt' (to use an expression well known in our community), the embryo of the human species should be regarded as if it were a human subject for the purposes of biomedical ethics.⁸

The Committee immediately added another paragraph in which it admitted the possibility that this situation could change in the future:

The Committee is not precluding the possibility of such a marker event being so made out with the degree of certainty indicated, but it advises the Senate that no such compelling evidence is forthcoming at the time of preparing this Report.⁹

In the final analysis, the Senate Select Committee, even though unable to resolve the question of the personal status of the human embryo, preferred:

...to regard the embryo not as 'property belonging to', but as an entity enjoying the protection of a guardian. Under this model the property rights of gamete donors are exhausted on fertilisation when a genetically unique new human life organised as a distinct entity oriented towards further development comes into being. At that point guardianship arises....¹⁰

Government Committees of Inquiry into the social, legal and ethical issues arising from new human reproductive technologies are not necessarily the best qualified groups of persons to enquire into, and resolve, the philosophical question of the beginning of the human individual. This is why they failed to address the issue. It is more a theoretical philosophical problem than an ethical or legal one. Admittedly, scientific facts of embryology need to be presupposed. In the last analysis, however, the question is philosophical and can only be resolved fully by people with some acquaintance with philosophical concepts, reasoning and methods as well as the basic relevant facts of human embryology.

3 Problems of language

Peoples the world over have been speaking about conception and birth since the origin of human language. The word *conceive* in the various languages acquired its meaning hundreds and perhaps thousands of years

Cambridge University Press

0521424283 - When did I begin?: Conception of the Human Individual in History, Philosophy and Science

Norman M. Ford

Excerpt

[More information](#)8 *Introduction*

ago when very little human reproductive biology was known and when the processes of reproduction were shrouded in myth and mystery. The choice of the term was made on the basis of the knowledge available to indicate simply that a woman was pregnant and was soon to become a mother by giving birth to a child growing in her womb. This much could be known without any scientific knowledge of human reproduction. The term '*conceive*' acquired its original popular meaning in this way without any suggestion as to how or when a new life began, apart from being the consequence of sexual intercourse. Observational and common-sense criteria guided human perception in this sphere in various places and cultures. The language employed was sufficiently clear and precise to satisfy the ordinary requirements of communication to signify that a woman had succeeded in becoming pregnant and that a fetus or child had begun to exist and grow. This is the essence of what was meant by the ideas and the terms used to express the popular perceptions of conception and pregnancy.

The original meaning of the English word *conceive* refers to a woman receiving the seed in her womb and becoming pregnant by taking the fetus to herself. This is the essence of the active meaning of conception. The English word has the primary meaning of 'to take effectively, take to oneself, take in and hold'.¹¹ The word *conceive* comes from the Latin *concipere* whose general meaning is 'to take or lay hold of, to take to oneself, to take in, take, receive, etc.'¹² Its biological meaning is 'to take or receive (animal or vegetable) fecundation, to conceive, become pregnant'.¹³ The simple primitive insight expressed by *conception* is that of a female mammal holding on to the semen which in some mysterious way leads to the start of a new life and thereby enables her to bear offspring in her womb. The passive meaning of conception refers to the child or offspring being created or formed in the womb and thereby beginning to exist. In this latter sense the emphasis is on the origin of the child rather than the action of the mother.

The Greek term κυέω (*kueō*) means 'to bear in the womb, to be pregnant with, to be formed, to be big, to conceive'.¹⁴ κύημα (*kuēma*) is derived from this term and means 'that which is conceived, embryo, fetus'.¹⁵ Another Greek word used is συλλαμβάνω (*sullambanō*). Its basic meaning is similar to the Latin, namely, 'collect, gather together, lay hands on, seize, receive at the same time and, of females, conceive'.¹⁶ The ordinary Hebrew word for conceive or become pregnant is 'hārāh'.¹⁷ There is another word 'yāham' that is usually used in reference to cattle coming into oestrus and means 'to be hot, to conceive'. No doubt this

Cambridge University Press

0521424283 - When did I begin?: Conception of the Human Individual in History, Philosophy and Science

Norman M. Ford

Excerpt

[More information](#)

term refers to the sexual impulse of animals at the time of breeding – heat being taken as the cause of conception.¹⁸

The Chinese use a Cantonese expression pronounced ‘why young’ which means ‘to nurture in the womb’ to convey the notion of conception. It is interesting to note that the character for ‘womb’ is a composite one denoting a ‘child that is starting or growing’.¹⁹ The Japanese expression ‘haramu’ is a traditional one that refers to the state or condition of being pregnant and means ‘to be swollen with child’.²⁰ There is another more technical Japanese expression ‘jutai’ whose meaning is ‘to receive a child in the womb’.²¹ The ancient Vietnamese term for conception is ‘cố mang’ which means ‘to be pregnant’, where ‘mang’ means ‘fetus in the womb’.²² There is another common Vietnamese expression ‘mang thai’; ‘to conceive, to be pregnant with child’,²³ where ‘mang’ means ‘carry or bear’ and ‘thai’ means ‘fetus in the womb’. A more literary expression is ‘thu thai’ which means ‘to conceive, to become pregnant’, ‘to receive and flourish with a baby in the womb’.²⁴ It is interesting to note that in China, Japan and Vietnam, a child was traditionally considered to be one year old on the day of birth. Consideration of the Chinese year apart, one reason for this custom could possibly be to give recognition to the time spent in one’s mother’s womb from conception to birth.

The word *embryo* in English is a corruption of the Latin *embryon*, itself an ancient English word also believed to be derived from the Greek ἐν ‘in’ + βρύειν ‘to swell, to grow’.²⁵ In this sense embryo would have meant ‘the one swelling or growing inside’. The Greek word ἔμβρυον primarily means ‘the young one’ and its second meaning is embryo or fetus.²⁶ The original sense of ἔμβρυον is to be found in its root term βρώ meaning ‘swell or teem with’, ‘to be full of’, ‘abound, grow luxuriantly’, ‘burst forth with’.²⁷ The original perception amongst the Greeks referred to ‘the young one swelling or growing in the womb’. It is helpful to bear in mind this original derivation of the term *embryo* from the pre-cellular theory times when it is presently applied to the first cells from which the mature mammal develops. For the Greeks the embryo results from conception and refers to what is conceived and is beginning to swell or grow as a young one in the womb. They entirely lacked the modern notion of ‘fertilization’.

This brief survey shows that when the various linguistic expressions for conception in the active sense were formed, there was no concern for indicating exactly how or when a human individual came into existence after the act of sexual intercourse, other than to signify that the woman had begun to be pregnant. A pregnancy that is recognized after the first

Cambridge University Press

0521424283 - When did I begin?: Conception of the Human Individual in History,
Philosophy and Science

Norman M. Ford

Excerpt

[More information](#)10 *Introduction*

missed menses, which is the usual clinical sign that a woman may be pregnant, is called a 'clinical pregnancy'. Subsequently this may be confirmed by a medical examination. Traditionally this would have been the first hint to a woman that she may be pregnant. By this time implantation would have normally been completed, two weeks after fertilization. Nowadays a pregnancy may be recognized after implantation has begun but before the first missed menses. This is known as a 'biochemical pregnancy' since it can only be diagnosed by the presence of a hormone called chorionic gonadotrophin (CG) found in the blood or urine some 6–9 days after fertilization. This human chorionic gonadotrophin (hCG) is secreted by the trophoblastic cells of the conceptus as implantation is beginning. A positive result of the test may be mistaken if the trophoblast develops without an inner cell mass or subsequent embryo and fetus.

When conception is used passively, it refers to the beginning of the human being's existence without indicating the precise moment when that occurs in terms of any biological process or event. It is not hard to see how in common estimation the timing of the occurrence of conception in the active and passive meanings could easily be identified. In this way one could say: 'When my mother conceived *me* she was in Melbourne.' Yet if pressed by objections, one would hardly concede that the mere linguistic use of this proposition would commit one philosophically to the identification in time of the two senses of conception. Nevertheless, we must admit that cultural attitudes and common traditional beliefs have been powerfully influenced by our ordinary pre-scientific perceptions and linguistic usage in regard to human conception.

Over the last hundred years or so, the process of fertilization has become to be identified with conception in the view of most people. Hence fertilization, almost universally, has acquired the cultural heritage and status of conception itself, particularly in its passive sense. The problem remains because many do not believe this should be so, especially among scientists and philosophers. They wish to challenge the legitimacy of such an easy and almost semantic inheritance of the status of a human individual by mere ordinary linguistic usage.

Linguistic forms depend on common usage, which in turn depends on our ordinary needs for communicating information to one another. Until recently there was little need to distinguish in practical life between the beginning of fertilization and the end of the process. Ordinary language has no word to refer to such intermediate states of being. Now it is crucial to give a legal definition of the meaning of 'embryo' with reference to the