Publication Date: 13 May 2023
DOI: 10.24946/IJPLS/20231305
International Journal of Prenatal & Life Sciences, ISSN: 2945-011X, DOI: 10.24946/IJPLS

ETHICS OF HEALTHY LIFE SUSTAINABILITY

Author: Aspasia Kalafati
Affiliation: Athens Administrative Court of Appeal, Greece
Correspondence: asmiktas@gmail.com

ABSTRACT

Advances in biological sciences have led to the emergence of a specialized field called biolaw, which deals with the legal aspects of technology in this domain. A significant issue in biolaw revolves around determining the legal status of embryos and their relationship to pregnant women. This question is intertwined with the beginning of human life and the protection of the unborn. Furthermore, advancements in genetics, such as DNA decoding and mapping of the human genome, alongside developments in Medically Assisted Reproduction, have shifted legal focus to the legal status and protection of reproductive material and fertilized eggs. The European Court of Human Rights also considers these matters in relation to the European Convention. These deliberations involve balancing the rights of fathers, the value and protection of embryos, women's freedom and autonomy in motherhood choices, access to contraception and abortion, as well as public interests in preserving the health of pregnant women during situations where conflicts arise between the lives of the woman and the embryo.

Based on the above, this work seeks to present some of the fundamental common aspects of biolaw from a legal standpoint, always relating to the embryo or fetus: a) The right to life and how it relates to human dignity, b) the question of conception and how it relates to pregnancy, the observed conflicts of rights, the right to reproduction and prenatal diagnosis, but also death, and c) the right to health.

All the above will be described as simply as possible using jurisprudential examples from cases heard by the European Court of Human Rights (E.C.H.R).

Finally, certain ethical problems about current technologies (synthetic life? mouse embryogenesis? Vaccine trials with pregnant women?) and red lines in the context of bioethics will be raised.

KEYWORDS
Ethics, biolaw, rights, Human Rights, Jurisprudence, Embryo, Foetus, Conception, Reproduction, Reproductive technology, Life beginning, Life termination.

INTRODUCTION

The rapid advancement of technology in the biological sciences has resulted in the formation of specialized laws and jurisprudence: the birth of a new discipline of law known as "Biolaw"[1].

---

[1] Τάκης Κ. Βιδάλης "Βιοδίκαιο. Πρώτος Τόμος:Το Πρόσωπο", εκδ. Σάκκουλας 2007, σελ. 6-7. The subject of Bio-Law

Biolaw is characterized by the high degree of internationalization of its legislation as a result of the biological sciences' development conditions. This effectively means that the variations between national legislation (such as those in the Greek legal order) and the biolaw of the other European countries are negligible.

Based on the foregoing, this work attempts to present some of the basic common elements of biolaw, always related to the embryo[2] from a legal standpoint: a) the right to life and how it is related to human dignity, b) the issue of the beginning of life and how it is related to pregnancy, the conflicts of rights observed (abortion), the right to reproduction and prenatal diagnosis, but also death, and c) the right to health.

All of the foregoing will be described as simply as possible using jurisprudential examples from cases heard by the European Court of Human Rights (E.C.H.R)[3].

Finally, some concerns-ethical dilemmas related to modern technologies (synthetic life? mouse embryogenesis? experimental vaccines in pregnant women?) and red lines, in the context of bioethics, will be raised.

I. THE RIGHT TO LIFE – THE PRINCIPLE OF HUMAN DIGNITY or VALUE(WORTH) – BIOLOGICAL AUTONOMY

In the legal world, the concepts "Right to Life", "Human Value or Dignity" and "Biological Autonomy" are concepts that differ in content, but are connected because, in many circumstances, one serves as a requirement or complement to the finding of the other.

They will be presented very simply for the sake of this work, as the relevant list of foreign and Greek bibliography and articles is huge[4], proportional of course to the importance of the above concepts.

1. THE RIGHT TO LIFE

The right to life is inherent in man.

I am not in a position to know what is going on in every nation on earth, but in the so-called "civilized" Western nations with written constitutions, it is expressly protected by a provision (for instance, see Article 5 Paragraph 2 of the Greek Constitution of 1975).[5]

The STATE OF LIFE (human life) is safeguarded. The biological and medical sciences, whose

---

can be defined as the legal management of the phenomenon of life, which includes the set of legal rules for the regulation of any kind of intervention in the biological constitution of species. The operations concern either the obtaining of information (various applications of genetics to determine characteristics in the DNA of humans, animals, plants or microorganisms, the management of medical data for various purposes, e.g. Research) or the change of the essential constitution (issues of conservation e.g. transplants, or termination of life e.g. abortion, euthanasia, genome modification, regulation of the commercial exploitation of biological material and biological data, patents in biological applications).

[2] The term "fetus" (nasciturus in Latin) or "embryo" (embryo in English or embryon in French) derives its origin from the ancient Greek language, from εν + βρύω, which means to be inside and grow, it has not in all languages the same meaning, in fact in some it is identified with the fertilized egg (fertilized egg in English or oeuf fécondé in French)

[3] https://www.echr.coe.int/Pages/home.aspx?p=home (or Court of Strasbourg, because of its location). It was established in 1959 and adjudicates appeals by citizens against member states, for violations of individual rights, as these have been established based on the Eur.Conv.

[4] The bibliography and articles listed here, correspond to a very small, indicatively selected part of the foreign and Greek one, which was studied by the writer for the needs of this paper.

[5] Article 5 paragraf 5 of the 1975 Constitution of Greece "All those who are in the Greek Territory enjoy the absolute protection of their life, honor and freedom, without distinction of nationality, race, language and religious or political beliefs. Exceptions are allowed in the cases provided for by international law. It is forbidden to extradite a foreigner who is prosecuted for his action in favor of freedom".

views on the beginning[6] and end of life[7] occasionally diverge, have adopted this idea.

According to the individual's right to life, every nation is obligated to uphold and safeguard every person's life[8]. The right is absolute and defensive (status negativus). It also means that any notion that a life is "unworthy of living" because of its physical or mental condition is rejected, and that it is incompatible with any state eugenics policy, cloning, or state-run or directed euthanasia. The latter means that exceptions based on nationality, race, language, and religious or political beliefs are not only excluded.

But what happens when a situation emerges where the safety of two different groups of people collides? This is where the idea of respecting the "value of the human being" enters the picture[9], and it is exactly that idea that forbids government interference in favor of one group over another.[10]

I will however draw attention to the fact that in the late 18th and early 19th centuries, the Constitutions of the time did not view protecting human life from governmental harm as important. The many international treaties and declarations made care to advocate it because it wasn't until the second half of the 20th century, following the atrocities committed primarily by the Hitler dictatorship, that this necessity became necessary. As a result, it is expressly protected in article 2 paragraph one of the European Convention[11], as well as article 3 of the Universal Declaration of Human Rights of 1948[12], in article 6 par. 1 of the UN International Covenant on Individuals and civil rights of1966[13] and in article 2 par. 1 of the Charter of Fundamental Rights of the European Union[14].

Are government interventions the only thing now endangering the protection of life? Or is it now also under danger from various types of intrusions from supranational (or global) formations?[15]

---

[6] see below in more detail, Subchapter The Biological Autonomy and Chapter The Beginning of Life.

[7] The question of the existence of "life" or "full life" after "brain death" is a question about which there does not yet seem to be scientific clarity.

[8] see indicative decision of E.C.H.R. of 14-9-2010 (murder of a journalist of Turkish nationality and Armenian origin) case Dink v. Turkey

[9] See the following Subchapter the Principle of Human Value (Worth) or Dignity

[10] Important is the decision of 15-2-2006 of the German Federal Constitutional Court, [decision BverfGE 115,118 https://www.servat.unibe.ch/dfr/bv115118.html (in Greek) and https://www.servat.unibe.ch/dfr/bv115118.html (in German)], which ruled unconstitutional a law authorizing the armed forces to shoot down a passenger plane hijacked by terrorists and turned into a bomb, as in the case of "9/11" in America, to protect an unlimited number of persons on earth. According to the Court, the state's constitutional obligation to protect the lives of potential victims of a terrorist act recedes behind the obligation to respect the human value of the passengers of the aircraft, since "the state, by unilaterally disposing of the lives of the passengers of the aircraft, denies them the value which belongs to man as such", see and Giovanna Borradori "Philosophy in a Time of Terror: Dialogues with Jurgen Habermas and Jacques Derrida", University of Chicago Press, 2003, where J. Habermas observes that respect for the value of every human being prohibits the state from disposing of the life of any person simply as a means to another end, even to save the lives of many other persons.

[11] Article 2 par. 1 of the Euro.Conv. "Everyone's right to life shall be protected by law. No one shall be deprived of his life intentionally save in the execution of a sentence of a court following his conviction of a crime for which this penalty is provided by law".

[12] Everyone has the right to life, liberty and the security of person.

[13] Every human being has the inherent right to life. This right shall be protected by law. No one shall be arbitrarily deprived of his life.

[14] Everyone has the right to life.

[15] The protection from them is a cutting-edge issue, which, however, is beyond the scope of this article. However, I would like to recall the famous Iceland Experiment and all the bioethical issues that arose based on it. The above experiment was conducted on the population of Iceland by the company Decode Genetics, without the necessary consent (informed consent), after the passing of a relevant law, where personal health

2. THE PRINCIPLE OF HUMAN DIGNITY or VALUE (WORTH)[16]

The value of life as a whole phenomenon (common origin of life for all species, as demonstrated at the molecular level by the discovery of DNA's structure and the comparison of different species' genomes, and its recognition as a phenomenon of the natural world, which has a superior value and must enjoy special protection) has only a passing relationship to the principle of human value, as the latter is the only status recognized[17] in contemporary law. As a result, the fundamental tenet of human rights legislation, the notion of human dignity, can be regarded as the gold standard of biolaw.

In the laws of the States, there are differences in both the legal definition and the enshrinement of human dignity. In some, it is a deduced theoretical or jurisprudential theory that serves as a general guiding principle. In others, it is an explicit reference in the list of fundamental rights.

At the level of international law[18], maintaining human dignity has now been reduced to a FUNDAMENTAL PRINCIPLE and is the cornerstone of the 1997 Convention on Bioethics[19]. The dual dimension of dignity, which places equal emphasis on protecting both the individual and the human species, has as a consequence the primary position of man[20].

In the Europ. Conv. the term "human dignity" does not exist, however the E.C.H.R. with its jurisprudence, mainly regarding the interpretation of Article 3 of the Europ.Conv.[21], declares that "The essence of the ECHR is the respect for human dignity and human freedom"[22] and that the principle of human dignity is an autonomous European concept, not subject to limitations or deviations[23].

3. BIOLOGICAL AUTONOMY

The law recognizes "man" (the human being) and the "natural person" as having the right to life and the dignity of human beings. But who is the "man" who has the right to be

---

data was widely used. Its goal was to identify, at the gene level, diseases that are not genetically inherited, but are common in families. In addition, it is worth noting that in 2001 the aforementioned company had entered the Stock Exchange with the value of its shares at half a billion dollars, in addition to the famous agreement concluded with Hoffman La Roche for an additional 200,000,000 dollars. The issue of vaccination against Covid-19, with experimental vaccines, is an issue that will certainly concern the judicial authorities in the near future.

[16] The terms human dignity and and human value or worth have philosophically different conceptualnuances. However, legally they are practically unambiguous concepts.

[17] Article 2 par. 1 of the Greek Constitution of 1975 "Respecting and protecting the value of the human being is the primary obligation of the State".

[18] see article 1 of the Charter of Fundamental Rights of the EU "Human dignity is inviolable. It must be respected and protected", yet in Israel its protection concerns the living and the dead alike.

[19] Article 1 verse 1 of the Convention of Oviedo «Parties to this Convention shall protect the dignity and identity of all human beings and guarantee everyone, without discrimination, respect for their integrity and other rights and fundamental freedoms with regard to the application of biology and medicine».

[20] Article 2 of the Convention of Oviedo «The interests and welfare of the human being shall prevail over the sole interest of society or science».

[21] Article 3 of Europ.Conv. «No one shall be subjected to torture or to inhuman or degrading treatment orpunishment».

[22] See Case 2346/02, Pretty v. United Kingdom, Judgment 29-4-2002, σκέψη 62, https://hudoc.echr.coe.int/fre#{%22itemid%22:[%22002-5380%22]}

[23] See indiatively Affaire "du sang contaminé" Vallee v. France της 26-4-1994, Ribitsch v. Austria της 4-12-1995, Mouisel v. France της 14-11-2002, Glass v. United Kingdom της 9-3-2004.

protected both internationally and nationally and to have his life and dignity respected?

The law considers the baby as a "natural person" when it is taken away from its mother. This effectively means that it separates itself from every other creature of the natural world, alive or inanimate, and becomes a subject of law, a subject of rights and obligations. Due to AUTONOMY, or the enjoyment of *a space of freedom of existence and action, in which any interventions by third parties are excluded*, the individual is in a superior position in law.

In biolaw we talk about BIOLOGICAL AUTONOMY and as such we mean the abilityof the person to control the data and functions of his organism as such (as a biological being). Physical limitations aside, control of the body belongs to the realm of our uncoerced self-determination. Biological autonomy is delimited by the "beginning" and "end" of the natural person.

II. THE RIGHT TO REPRODUCTION – INITIATION OF LIFE - CONFLICTS OF RIGHTS DURING PREGNANCY - ASSISTED REPRODUCTION - PRE-IMPLANTATION DIAGNOSIS - WRONGFUL LIFE

In the legal world, one of the issues that continue to be a "thorn" is the question of thelegal nature of the embryo and its relationship to the pregnant mother. This issue is directlyrelated to the time of the beginning of human life, that is, to the "beginning" of the natural person, which delimits its biological autonomy and, further, to the protection of unborn life.

Initially, the legal world dealt with this issue on the occasion of cases of termination of pregnancy, in which cases the embryo was contrasted with the born living person, but alsowith the pregnant woman's right to reproduction (which will be prioritiwed in the presentation) and her biological autonomy. However, the progress of the science of genetics, the decoding of DNA in 1950 and the mapping of the human genome in June 2000, alongside the rapid development of Medically Assisted Reproduction (MART) have shifted the field of legal interest to the question of legal nature of "mere reproductive material" and "fertilized ovum" and their legal protection.

In addition to the national regulations of each legal order, the approach of the aboveissues by the E.CH.H.R., in the light of the Europ.Convv., is of interest[24].

All the above issues will concern this work.

1. THE RIGHT TO REPRODUCTION

It consists in the freedom of everyone to have sexual intercourse with or without the intention of procreation, in the freedom of everyone to decide whether to become a parent or not. It is a "natural" right, which does not need the Law to exist and in which only minimal and absolutely necessary restrictions[25] are justified that the legislator could regulate through his intervention and are linked to human reproduction itself, the protectionof the life or health of parents, children or third parties (e.g. in case of incest or rape).

This right was transferred from the realm of "nature" to the realm of "biological autonomy" particularly since the 1960s, when birth control via contraceptive pills and abortion in settings conducive to preserving the woman's health became technically possible (negative freedom of reproduction), and later, in the 1970s, when in vitro fertilization and the transfer of the embryo into the female womb became technically feasible (assisted reproduction; positive freedom of reproduction). The aforementioned potential was presented to provide medical support for couples who have a significant chance of passing on certain hereditary/ genetic

---

[24] See article 2 (protection of life) footnote 12 hereof και article 8 (Right to respect for private and family life) of the Europ.Conv. : "1. Everyone has the right to respect for his private and family life, his home and his correspondence. 2. There shall be no interference by a public authority with the exercise of this right except such as is in accordance with the law and is necessary in a democratic society in the interests of national security, public safety or the economic well-being of the country, for the prevention of disorder or crime, for the protection of health or morals, or for the protection of the rights and freedoms of others".

[25] See B.Μάλλιος, hereof ΔτΑ 2017 page 562.

diseases to their offspring[26] (structural chromosomal anomaly or monogenic disorders that are incurable at the time of diagnosis) based on family history or the delivery of children with the condition. Through selective embryo transfer, new opportunities for preventing genetic illnesses have been made possible by advancements in reproductive medicine.

In the Europ.Conv. text the right is protected by article 8[27]. In summary, the E.C.H.R. has ruled that the decision to have or not to have children falls under the right to privacy[28].

2. BEGINNING OF LIFE – TERMINATION OF PREGNACY - CONFLICTS OF RIGHTS DURING PREGNANCY

Every national legislator[29], is in a position to assess the competing rights pertaining to the poles of a) the pregnant woman and potential father and b) the pregnant woman and embryo when legislating on matters such as abortion. This weighting therefore pertains to the father's rights, the value of the embryo's life, the woman's rights to autonomy and freedom in deciding whether or not to become a mother (full or limited sexual freedom, availability of contraception or services abortion), as well as the public goals pertaining to protecting the pregnant woman's health during an abortion (particularly where the survival of the pregnant woman or the fetus is biologically at odds with it, or when the life of the embryo is at odds with the pregnant woman's health).

So, in general: A). It is "presumed" that the pregnant woman's position and will are superior to those of her partner when the embryo is inside the woman's body and is inextricably linked to it. Her biological autonomy is violated if the pregnancy is forcibly ended (involuntary termination). Contrarily, the deliberate ending of a pregnancy (abortion) is a component of the right to reproduction because it represents the pregnant woman's unfavorable freedom to procreate. B). But what happens to the embryo in this last instance? Does it have legal rights that are protected?

This question is intimately related to the BEGINNING-INITIATION OF HUMAN question from the perspective of biology and medicine.[30].

From the point of view of legal science, however, a crucial issue is the EXISTENCE OF THE SUBJECT/PERSON. Article 2 of Europ. Conv.[31] states that the existence of rights (such as this in life) is linked to a "person". When does the subject acquire hypostasis and become a person?

---

[26] Several well-known diseases, such as Mediterranean anaemia, are genetic diseases. If a gene is damaged the baby usually inherits it from both parents (in other words, if they have both copies of their gene damaged), the baby will get sick.

[27] See footnote 12 hereof.

[28] see below, Evans v. UK, paragraph 71 and A, B and C v. Ireland paragraph 71.

[29] The Greek legislator always protected the embryo (articles 1711 of the Civil Code and 304 of the Criminal Code). Law 1609/1986 allows abortion before the 12th week, for medical reasons up to the 24th week, if the pregnancy is the result of rape, seduction, incest or abuse up to the 19th week and at any time if thereis a risk to the life of the pregnant woman.

[30] The biological and medical sciences have proposed various time points, such as the time of conception or fertilization of the egg or its implantation in the uterus, the placement of the fertilized egg in the endometrial epithelium (nidation), the time point of initial line development (primitive streak), where it is argued that the embryo can feel pain or can develop subjective experiential capacity, the first autonomousmovements of the embryo, the development of its nervous system after the 50th day, its ability to survive after its separation from the womb.

[31] see footnote 12 hereof. On the contrary, the Charter of Fundamental Rights of the European Union, in its article 24 par. 2, where it reduces the supreme interest of children as of primary importance, in acts concerning them, is considered to cover the fetal age, because it does not specify the time point at which protection begins.

Respecting national laws, the E.C.H.R. has not taken a firm stance on the aforementioned subject. The majority of legal systems, including the Greek one, hold that *hypostasis begins only at birth*. Therefore, no right to the embryo's life is understood by legal science in these situations, which is opposed to the pregnant woman's right to end her pregnancy.

The "dignity-value" of the embryo, however, is something that is assumed. Although it develops into a person once it is born, it is not simply considered to be an "organ of the mother's body" when it is an embryo. It is deemed by law to be entitled to protection, using the objective premise of "human dignity-value-worth"[32]. The VIABILITY[33] of this also determines the degree of its protection by the legislator. As a result, its value is at its lowest point during fertilization and at its maximum position toward the end of pregnancy. It's comparable to having a tightrope with a spirit level at one end and two ends (pregnant and embryo). The balance tips in favor of the embryo as it develops and the pregnancy proceeds because as it gains value, the pregnant woman's ability to end the pregnancy declines in proportion.

The following are the E.C.H.R.'s relevant rulings:

OPEN DOOR and DUBLIN WELL WOMAN v. IRELAND (Application Nos 14234/88 and 14235/88) (1992)[34].

VO v. FRANCE (Application no. 5394/00)[35]

TYSIAC v. POLAND (Application no. 5410/03)[36]

A, B, C v. IRELAND (Application no. 25579/05)[37]

R. R. v. POLAND (Application no. 27617/04)[38]

P. and S. v. POLAND (Application no. 57375/08)[39]

OPEN DOOR and DUBLIN WELL WOMAN v. IRELAND

In 1991, Open Door Counselling Ltd and Dublin Well Woman Center Ltd (Irish non- profit organisations, which provided marriage, family planning, reproductive and health counselling), Bonnie Maher and Ann Downers, trained counsellors working in above Organizations and Mrs X and Mrs Maeve Geraghty, two female Irish citizens of childbearing age, jointly appealed to the E.C.H.R., with the goal of recognizing the opposition to the Europ. Conv. (article 10 par. 1)[40], of a ban imposed by the Supreme Court of Ireland on the dissemination of information related, even indirectly, to the provision of abortion services outside Irish territory [On 28.6.1985 the Organization "Society for the Protection of Unborn Child" sued the above companies, claiming that the services they provided were not compatible with article 40.3.3. of the Irish Constitution (8th Amendment), according to which "The State recognizes the right to life of the pregnant woman and having regard to the equal right of the mother to life, guarantees by its laws its respect, protection and assertion". In 1988, the High Court of Ireland prohibited them from providing any assistance to women, citizens of Ireland, who wished to travel abroad to have an

---

[32] The objective dimension of human dignity-value-worth offers the basis both at the international and at the constitutional level, for taking measures that limit the possibility of the loss of a life before birth, or otherwise, requires the existence of serious reasons for its loss.

[33] Viability means the ability of the embryo to survive, even with the help of technical means.

[34] https://bioethics.gr/api/files/download/1646/Open%20Door%20Ireland%20-%20Full.pdf?attachment=false

[35] https://hudoc.echr.coe.int/eng#{%22itemid%22:[%22001-61887%22]}

[36] https://hudoc.echr.coe.int/eng#{%22itemid%22:[%22001-79812%22]}

[37] https://hudoc.echr.coe.int/eng#{%22itemid%22:[%22001-102332%22]}

[38] https://hudoc.echr.coe.int/fre#{%22itemid%22:[%22001-104911%22]}

[39] https://hudoc.echr.coe.int/fre#{%22itemid%22:[%22002-7226%22]}

[40] Article 10 par. 1 of the Europ. Conv. protects the freedom of expression, to hold opinions and to receive orimpart information or ideas, without interference by public authorities and regardless of frontiers.

abortion]. The E.C.H.R., having accepted that the order in question constituted a restriction on freedom of expression which, on the one hand, was deduced with a sufficient degree of clarity from the provisions of Irish law (including judicial decisions), on the other hand served the legitimate purpose of protecting the life of the embryo and the preservation of morals, considered that such a restriction was not necessary in a democratic society, because of its particularly wide scope (it targeted information relating to an activity not illegal under Irish law, thus travel of a woman abroad for the purpose of obtaining an abortion) and the duration of the order in question (which was extended in perpetuity, regardless of age, state of health or any other reasons, for which a woman sought advice to terminate her pregnancy).

Vo v. France

This case concerns Thi-Nho Vo, a Vietnamese woman. On 27-11-1991 the applicant was 5 months pregnant and was admitted to the Lyon General Hospital for scheduled medical examinations. On the same day, another woman, also Vietnamese, who had the same surname as the applicant (Thi Thanh Van Vo) was admitted to the same Hospital to have her vaginal diaphragm removed. The doctor who had undertaken to perform the operation called out in the waiting room "Mrs. Vo" and only the applicant responded. At their meeting, the doctor realized that the applicant did not understand the French language. However, he had in his hands the medical file of the other patient with the same surname and proceeded to remove the vaginal septum, without clinically examining the applicant. As a result, during the operation, irreparable damage was caused to the amniotic sac and thus the artificial termination of the pregnancy became imperative. After a lawsuit filed by the applicant and her husband against the doctor for negligent homicide, the latter was acquitted by the Supreme Court. The applicant appealed before the ECHR, where she argued that the refusal of the French authorities to consider as homicide the involuntary termination of the life of the embryo, she was carrying was contrary to Article 2 of the Europ. Conv., which obliges member states to provide for criminal penalties for such offenses. The ECHR decided that there was no violation of the right to life of the embryo, since: a) it found that there is no unanimity in the member states of the Council of Europe regarding the legal nature of the embryo, b) it referred to the differences that exist in the legislation of the member states, regarding the artificial termination of pregnancy, c) referred to the different ethical, philosophical, medical, religious and legal approaches to the issue of "initiation of life", d) decided that the issues related to the issue of the initiation of the right to life belong to margin of appreciation of the member states, e) pointed outthat from the legislation of the member states and the relevant international conventions there is a minimum protection limit for the embryo, its "potentiality", the expectation of its birth that impose its legal protection and f) in view of the fact that the life of the embryo is inextricably linked to the woman carrying it, it investigated whether the protection of the applicant was satisfactory and decided that the possibility of criminally convicting the doctor for negligent physical harm to her, to be disciplined and to be compensated by the hospital and the doctor, constitute sufficient protection for her.

TYSIAC v. POLAND

The applicant, born in 1971, had been dealing with a serious myopia problem since she was 6 years old. In 2000 she became pregnant, but she had already two more children (after caesarean delivery). In Poland, abortion is permitted (also) when the pregnancy endangers the life or health of the mother, which is certified by a doctor, specialized in the problem faced by the latter, who in case of doubt as to the diagnosis of a disease or her treatment, he can (on his own initiative or at the mother's request) ask for the opinion of another doctor; with a relevant specialty or convene a medical board. The applicant, concerned about the effect the pregnancy would have on her eyesight, requested a medical certificate to have an abortion. She was initially examined by three ophthalmologists, who ruled that due to changes in her retina, the pregnancy constituted a risk to her sight, but they did not issue a certificate for her termination (on the contrary, a

general practitioner issued a statement that her state of health, with two previous caesarean deliveries and severe pathological changes to the retina, she was prohibited from any physical exertion, given that she was already in charge of raising two minor children. In April 2000, the applicant, in her 2nd month of pregnancy, visited an ophthalmologist, who found her myopia had skyrocketed to 24 dioptres and she turned to the gynaecology clinic of the Warsaw Hospital to request termination of her pregnancy. After being examined by a gynaecologist (for less than five minutes), she was advised to undergoa caesarean delivery, assuring her that with this method, she could give birth to as many children as possible wanted and refused to grant her a medical certificate for an abortion. The applicant gave birth in November 2000. On 2.1.2001, her vision deteriorated dramatically, she was advised to learn Braille, by competent Health Committees she was classified as severely disabled and incapable of self-care and on 11.1.2001 a decision was issued by the Welfare Services of Warsaw, in which she was unable to exercise custody of her children due to her disability. The Polish courts, in which she requested the conviction of the gynaecologist who refused to certify the termination of her pregnancy, filed the case, on the grounds that, based on relevant expert reports, there was no causal link between, on the one hand, the pregnancy and the delivery, on the other hand the loss of her sight. So, she requested from the E.C.H.R. to recognize that the handling of her case by the Polish authorities constituted degrading treatment, prohibited by Article 3 of the Europ. Conv. and violated her right to respect for private and family life, as enshrined in Article 8 of the Europ. Conv.

The E.C.H.R. considered that, a) although the possibility of inhuman or degrading treatment of the applicant could not be excluded, her case was preferable to be examined from the point of view of Article 8 of the Europ. Conv, b) recognizing Polish law exceptions in the general prohibition of abortions, the E.C.H.R. could not rule on whether the Europ. Conv. recognizes the right to abortion, c) the legislation on the termination of pregnancy affects the right to privacy of the mother, since the life of the pregnant woman isinextricably intertwined with the embryo, d) the right to privacy has a defensive dimension in principle, prohibiting any arbitrary intervention of the states in the sphere of the private life and personal autonomy of the individual, however in this case, there was a violation of it in its positive dimension, since this right also results in positive obligations for the State, which consist, basically, in the adoption of the appropriate procedures for its defence, especially in the case of abortions, for the protection, among other things, of the physical integrity of pregnant women and e) the Europ. Conv. does not guarantee rights that are merely theoretical or false, but realistic and effective and for the full content of Article 8 thereof, although it does not refer to specific procedural guarantees, it is important that a fair framework is protected from article 8, for those who have interests to make relevant decisions.

With these thoughts, the E.C.H.R. ruled that Poland had not complied with the positive obligations it had under Article 8 of the Europ. Conv., since, in the disputed case, it had not established the appropriate framework for the mother so as to perform her choice for an abortion, since the Polish law did not provide for timely procedures for the removal of any disagreement between the mother and the doctor, who refused to grant her medical certification, about the necessity of an abortion that she wished (in view of her reasonable fears about the deterioration of her eyesight and that the Polish courts found that there was no causal connection between her loss of sight and her pregnancy). Judge Borrego dissented and argued that with the above decision, the ECHR substituted itself in the place of the national parliaments, perceiving its role rather as a charitable organization. He summarized his opinion as follows: "Every human being is born free, with equal dignity and equal rights. Today the Court ruled that a man was born in violation of the European Convention on Human Rights. According to the relevant reasoning, there is a child in Poland, about six years old today, whose right to be born alive defies the Convention. I never thought the Convention would go this far and I find this development terrifying".

A, B, C v. IRELAND

The case concerns three women who, based on Irish law (which prohibits abortion except when the pregnancy poses a threat to the mother's life), were forced to terminate their pregnancies in the United Kingdom.

In particular, A, a depressed, unemployed, single, penniless Irish woman with four children, whom she has lost custody of, due to alcoholism, discovers her unwanted pregnancy and is forced to take out a high-interest loan in order to secretly travel to the UK to terminate her pregnancy. On her return, she was bleeding profusely, but was afraid to seek help.

B, also Irish, unable to support herself and a child, borrows money secretly from her parents and is led to the same choice. On her return, she developed thrombophilia and went to a clinic in Doublin.

C, a Lithuanian resident of Ireland, is having her abortion in the UK, fearing that her life and the child's life will be at risk, because she has cancer. Although she could have an abortion with pills because she was a foreigner, she waited 8 weeks and had to undergo surgery. On her return she experienced prolonged bleeding and infection and received inadequate medical care. She is unable to obtain answers to the question of the risk to her health and to carry out the abortion in her country of residence, despite the fact that Irish law allows at the level of declaration abortion, in case of danger to the mother's life.

The E.C.H.R. rejected the request of A and B, initially accepting that the restriction or prohibition of abortion can be considered as an interference with the right to private life, however, it does not recognize it as a right, in the context of Article 8 Europ. Conv., due to the need to weigh between the initially equal rights of the mother and the child, which are inextricably linked and due to the wide discretion that states have in moral matters, such as abortion. For C, it considered that the right of the above article was violated, since due to her illness, the possibility that the pregnancy led to metastasis could not be ruled out, but she was not given relevant medical information.

R. R. v. POLAND και P. and S. v. POLAND

R.R., born in 1973, married, became pregnant in 2001 with her third child. On 23.1.2002 and 20.2.2002, she underwent ultrasound examinations, the results of which showed that the possibility that the fetus suffered from some form of malformation could not be excluded. The applicant visited the local hospital in her town. She underwent another ultrasound, with the same diagnosis. In view of this, she was advised to undergo a genetic test (amniocentesis and karyotype). Subsequently, the applicant requested a referral from her family doctor, to carry out the examinations in question at a public hospital. The hospital doctor, however, refused, because, in his opinion, there was no legal reason for an abortion in her case. In early March 2002, the applicant and her husbandvisited the local hospital and demanded the termination of her pregnancy. The doctor on duty refused, because the ultrasound results were not sufficient, in his opinion, to diagnose fetal malformation. From then on, a race began for the applicant to undergo a genetic test, since the doctors refused to give her a relevant referral, each time coming up with various excuses. Finally, on 26.3.2002, during the 23rd week of her pregnancy, theapplicant visited, at the urging of a private clinic doctor, the emergency department of a public hospital, falsely claiming that she was about to miscarry in order to be admitted for genetic tests. On the same day, indeed, she underwent an amniocentesis. She was told she would have to wait for two weeks to get the results. In the meantime, the applicantrepeatedly visited the hospital in her town, asking to have an abortion, but the doctors refused. On 9.4.2002, she finally received the diagnosis from genetic tests, which confirmed that the fetus had Turner Syndrome (a genetic disorder that only affects girls). Based on this, the applicant again requested an abortion, but the doctors at the city hospital refused, as it was now too late, because the embryo could live outside the womb. On 11.7.2002 the applicant gave birth to a girl, who suffered from Turner Syndrome. Lawsuits she filed

against the doctors of the aforementioned hospital were partiallyaccepted by the Polish courts and a meager compensation was awarded in her favor.

P., aged 14 in 2008, was raped in April of the same year by a peer, by whom she became pregnant. The fact was confirmed on 20.5.2008 by a competent Prosecutor. Subsequently, P. and her mother S. (second applicant) sought a hospital, for the former to undergo an abortion. This became possible only on 17.6.2008. In the meantime, their case had become national news in Polish media and social media. R. received messages on her mobile phone from strangers urging her not to have an abortion. The doctors of thehospital in her town had put her in contact, against her will and without her mother'sconsent, with a priest of the Catholic Church, while they, together with her school teachers,filed a lawsuit against her parents, asking that her guardianship was taken away from them, on the grounds that they were inflicting psychological violence on her, in order to have an abortion. The action was accepted at first instance and the first applicant was forcibly removed from her mother and transferred on 5.6.2008 to a juvenile detention center, where she remained locked in a room, unable to communicate with anyone, as her mobile phone had been taken away her. On 6.6.2008 she started bleeding and was taken to the hospital. Finally, her parents regained her custody on 14.6.2008, after R. had previously been examined alone, without the presence of a family lawyer, by an investigator, a prosecutor and a psychologist for three hours.

According to Polish law, abortion is not illegal when, inter alia, a) prenatal tests and other medical findings show that there is a high risk that the embryo will suffer from serious and irreversible damage or from a life-threatening incurable disease. In that case, the termination of the pregnancy takes place up to the point where the embryo can survive outside the womb, after a medical opinion and b) the pregnancy is the result of a criminal act, in which case the termination of the pregnancy takes place up to the 12th week of pregnancy, after a public prosecutor's certificate for the criminal act.

In both above cases, the E.C.H.R. considered that there has been a violation ofboth Article 3 of the Europ. Conv., on the prohibition of inhuman and degrading treatment, and Article 8, on the protection of the right to private life, under its positive version. The latter, because Poland has not established the appropriate framework, within which people who want to perform their rights, recognized by national law (choice for an abortion, in this case) will be able to exercise them effectively.

From the overview of the above jurisprudence, the conclusions that could be drawn are:

- It is noteworthy that the E.C.H.R. in the case of Vo v. France, where the question was directly raised, whether the embryo is the direct victim of the case (its mother was the indirect one), in paragraph 80 of the decision answers that there is no violation of Article 2 of the Europ. Conv., as for there to be an indirect victim (the applicant) must be a direct one, while the fetus «*the unborn child is not regarded as a "person" directly protected by Article 2 of the Convention and that if the unborn do have a "right" to "life", it is implicitly limited by the mother's rights and interests»,* while in paragraph 85 of its decision, E.C.H.R. shows doubt again, by stating that this issue (of whether the embryo is a person) is neither desirable nor possible at this stage to be clarified «*Having regard to the foregoing, the Court is convinced that it is neither desirable, nor even possible as matters stand, to answer in the abstract the question whether the unborn child is a person for the purposes of Article 2 of the Convention».* On the contrary, in paragraph 227 of the decision for case A, B, C v. Ireland *«The Court concludes that the impugned restriction therefore pursued the legitimate aim of the protection of morals of which the protection in Ireland of the right to life of the unborn was one aspect»* complicates its reasoning, by referring to the embryo's right to life, without referring to Article 2 and its subtext.[41]
- Therefore, the E.C.H.R. until today, has not taken a position on the legal nature of the

[41] The issue of the missed opportunity to clarify the question of the legal nature of the foetus is raised by Judge Pinto, in the Parrillo case (bellow) at paragraph 31 thereof.

embryo, that is, whether the embryo is a "person"[42], in view of the different moral, philosophical, medical, religious, and legal approaches of the states that have incorporated the text of the Europ. Conv. in their legal system (lack of consensus). In fact, it accepts that when the right to life initiates, it is within the margin of appreciation enjoyed by member states. However, with its above decisions, adopting findings from national legislation and international treaties, it offers a minimum of protection to the embryo, which derives from the expectation of its birth and from the fact that its life and existence depends on the pregnant woman, but whose pregnancy and termination do not belong exclusively to her private life.

- The E.C.H.R. connects the issue of the protection of the embryo and the abortion in an unbreakable whole, with the result that the ambiguity regarding one (the starting point, that is, of human life) leads to a negative response to the other. In the absence, after all, of one secured by Europ. Conv. right to abortion, the E.C.H.R. recognizes, alternatively, the right to the appropriate procedure for the exercise/perform of the corresponding rights established in the national legislation, with the consequence that it is argued that the procedure, in this case, is the vehicle of the substance, a pretence, that is, a way of declaring the right to abortion, through the "italics street". At the same time, it does not recognize legitimacy in its protection right to the life of the embryo when the national law does not recognize such a right[43].

3. ASSISTED REPRODUCTION - CONFLICT OF RIGHTS

By the term "Assisted Reproduction" (A.R.) we mean both the older techniques, such as that of "artificial insemination", but mainly, the technique of "in vitro fertilization" (IVF) and the transfer of the embryo into the uterus (embryo transfer), for it to develop and be born. This second method is linked to the possibility of reproductive development in a phase outside the human body (in vitro) and in a second phase inside the human body (in vivo)[44].

In the European area, each country has set up a legislative framework regarding assisted human reproduction and pre-implantation genetic diagnosis. However, this legislation is not homogenous[45], nor does the Europ. Conv. contain an article that explicitly refers to the above

[42] On the contrary, the US Supreme Court, in 1973, with its landmark decision Roe v. Wade has decided that a woman has the right to an abortion and this because the embryo is NOT a person. However, it considers that the embryo is protected as a potential life. It uses the term of the viability of the embryo, concluding that the right to abortion, which derives from the right to privacy (right to personal privacy) is not unlimited, limited by the viability of the embryo. The Court ruled by a vote of 7 to 2 that the state's – unreasonably restrictive – regulation of abortion is unconstitutional. Specifically, the Court ruled that the laws of the state of Texas – perhaps the most conservative state in the US – that criminalize abortion, violate women's constitutionally guaranteed right to privacy, which is covered by the 14th Amendment to the Constitution. According to it, no state can deprive its citizen of the fundamental right to life, liberty and property, without due process of law. In particular, Justice Brennan's opinion in Eisenstadt v. Baird, 405 U.S. 438 (1972), which preceded Roe v. Wade, is to this day the foundation of privacy rights in the American legal order "...if the right to privacy means anything, it is the right of the individual, married or single, to be free from unwanted governmental intrusion into matters so fundamentally affecting a person as the decision whether to bear or beget a child".

This steady up to 2022 jurisprudence, was recently overturned in Thomas Dobbs and other vs Jachson Women's Health Organisation, see decision https://www.supremecourt.gov/opinions/21pdf/19-1392_6j37.pdf, see 3 justice minorities https://www.supremecourt.gov/search.aspx?filename=/docket/docketfiles/html/public/19-1392.html

[43] See below case Evans v. the United Kingdom.

[44] The legislative framework of A.R. in Greece is regulated by Law 3089/2002. The control procedures of A.R. Units are regulated by Law 3305/2005.

[45] https://ivi-fertility.com/blog/regulations-legislation-assisted-reproduction-europe/

Back in 2015, over 157,000 children in Europe were born because of assisted reproduction technology techniques. Now in the early 2020s, we can be confident that the figure is even higher. Nevertheless, the lack

issues[46]. This, however, did not prevent E.C.H.R. to include this right in the protection of article 8 of Europ. Conv.[47] (on protection of private and family life).

The decisions that are important are:

DICKSON v. THE UNITED KINGDOM (application private and 62/04)[48]

EVANS v. THE UNITED KINGDOM (Application no. 6339/05)[49]

S.H. And Others v. AUSTRIA (Application no. 57013/00)[50]

Dickson v. United Kingdom

K. (b. 1972) and L. (b. 1958) Dickson met and married in 1999, while they were in prison. The former served a 15-year sentence from 1994 (released 2009), the latter was released in 2001. In 2002, they asked to be allowed to become parents by the method of artificial reproduction (K. had no children, L. had 3), citing the duration of their relationship, the date of release of the first and the age of the second, according to the time of his release from prison. The request was rejected by the British authorities, on the grounds that there were no guarantees for the safe care of the child to be born. The E.C.H.R. decided that the mother alone is sufficient to take care of the child, until the father's release from prison, after considering that there was a violation of the fair balance between public interest and the protection of a minimum limit of K's reproductive autonomy.

---

of a Europe-wide monitoring agency means that we cannot quantify the figure exactly.The fact is that there is no Europe-wide regulatory agency for fertility treatment. **Legislation in Assisted Reproduction** may change in every country. However, the European Society of Human Reproduction and Embryology (ESHRE) is making significant strides to collate information through an interactive map covering 47 countries. Currently, each country has its own legislative framework relating to who can access fertility treatment, which treatments are available, whether sperm and egg donation are permitted, and if so, whetheranonymity is guaranteed or outlawed.

[46] However, in the European area, although it has not yet been ratified by several countries, these issues are regulated, setting out a framework of general principles, by the "Convention of Oviedo" (see related footnote 2 hereof) of 1997, in articles 12, 13 , 14 and 18 thereof (see below footnotes 54, 71, 54 and 56 hereof). Also relevant is Directive 2004/23/EC "on setting standards of quality and safety for the donation, procurement, testing, processing, preservation, storage and distribution of human tissues and cells" and article 3 par. 2 of the Charter of Fundamental Rights of the European Union "In the field of medicine and biology, the following must be respected in particular:-the free and informed consent of the person concerned, according to the procedures laid down by law, -the prohibition of eugenic practices, in particular those aiming at the selection of persons, -the prohibition on making the human body and its parts as such a source of financial gain, -the prohibition of the reproductive cloning of human beings".

[47] see footnote 25 hereof and paragraph 82 of the decision S.H and Others v. Austria (cited below) and paragraph 54 of Knecht v. Romania decision of 11-12-2013 Case V.C v. Slovakia paragraph 114 decisionof 8-11-2011, where it was ruled that the sterilization of a Roma woman after childbirth, without her full and informed consent, raises questions as to whether the state activated effective legal mechanisms to protect Roma reproductive freedom and the appropriate supervision of sterilizations.

[48] https://hudoc.echr.coe.int/eng#{%22itemid%22:[%22001-83788%22]}

[49] https://hudoc.echr.coe.int/eng#{%22itemid%22:[%22001-80046%22]}

[50] https://hudoc.echr.coe.int/fre#{%22itemid%22:[%22002-309%22]}

Evans v. United Kingdom[51]

N. Evans, suffering from cancer, which required surgical removal of her ovaries (that means, embryos couldn't implant in the uterus for 2 years after the operation), and her partner J. decided to fertilize her eggs to freeze them and resort to IVF in the future. Accordingly, they signed a consent form, mentioning their right to withdraw before implantation of the fertilized eggs. The eggs were fertilized, resulting in 6 embryos that were frozen and placed for preservation. A few months after the ovariectomy, the couple divorced and J. requested the destruction of the embryos, arguing that he did not wish to be the father of a child that he would not raise himself. N. initially appealed to the British courts arguing that she had no other chance to create a family and in the E.C.H.R. for violation of the right to create a family (Article 8) and to the life of the embryo (Article 2).

Her appeal was rejected by the E.C.H.R., on the grounds that the choice of the English legislator to require the consent of the man up to the moment of implantation of the fertilized egg does not violate the above articles. In fact, the fact that there was no consensus among the members of the Council of Europe on this issue was taken into account, as well as the difficulty of recognizing a right to life in favour of foetuses.

S. H. And Others v. Austria

The applicants are two married couples with an infertility problem and sought refuge in A.R. The only means of having a child, with one of them being a genetic parent, was in vitro fertilization (IVF), using donor sperm (in the case of the first couple) and eggs (in the case of the second couple), -becoming mutual donors of genetic material (sperm and eggs)-. Both methods were illegal in Austria, where the law generally prohibited egg donation and the use of donor sperm for IVF (although it was accepted outside the country). However, the same law allowed other methods of assisted reproduction and, in particular, in vitro fertilization using eggs and sperm from people married to each other or living together as man and wife (homologous reproductive techniques) and, in exceptional cases, sperm donation for fertilization of the uterine. The applicants applied to the Austrian Constitutional Court, which decided that there was an interference with their right to respect for their family life, but that this was justified because it was designed to exclude both the creation of unusual family relationships (a child with two mothers, one thebiological mother and the other "surrogate" mother) and the exploitation of women. The E.C.H.R. examined the purpose of the legislator (which was in the interest of the child's free development, not to be a member of a family with more than two genetic parents) and emphasized that on this issue there was no consensus of the countries of the Council of Europe. Given this, it rejected the appeal, ruling that there was no violation of Article 8 of the Europ. Conv.

From the overview of the above jurisprudence, the conclusions that could be drawn are:

a) the right regarding assisted reproduction derives from article 8 of the Europ. Conv.,

b) this guarantees self-determination and autonomy of the person, constitutes an aspect of the free development of his personality and the focus of his privacy,

[51] Conversely, the Tennessee Supreme Court in First Embryo Disposition Case – Davis v. Davis, 842 S.W. 2D 588, 597 (Tenn. 1992), answered negatively the question of whether a pre-embryo (up to 14 days old)can be considered a person and held that disputes involving the disposition of pre-embryos produced by in vitro fertilization must be resolved on the basis of wishes of the parents, who, if they disagree, their previous agreement regarding their disposition will apply and if there is no such agreement, the interest ofthe party who wants to prevent the birth will prevail (see Th. Antoniou op. op. pp. 110- 112. According to the author, if pre-embryos were recognized as bearers of life and dignity, this would entail the legislative ban on the use of spirals, the ban on abortions except in cases with medical indications and the mandatory implantation of every fertilized egg in vitro).

c) it is protected by the national legislations of the member states of the Council of Europe, although not in the same way,

d) its limits are determined by law, which reflects the values of a given society, but also by the consent of the parties concerned (spouses),

e) its content consists of free access to the relevant medical support,

f) the right to create a family or its support by the state authorities of the article 12 of Europ. Conv. it is not absolute and

g) the “in vitro” embryo does not fall under the protection of article 2 of the Europ. Conv, since it is not a person, just like the embryo, since it has the right to life, this is limited by the rights and mother's interests.

In particular, the Court, with the decisions of Dickson v. United Kingdom of 4-12- 2007 and Evans v. United Kingdom of 10-4-2007, on the one hand, confirmed the fundamental nature of the above-mentioned right, recalling that the possibility of resorting to a method assisted reproduction is an integral part of one's private and family life and on the other hand it stressed that member states do not have unlimited freedom to decide such issues, since the decision to become a parent is an element of one's identity and existence.

In the case of Dickson, it ruled that the restrictions that can be set by the English legislature for reasons of public interest, cannot reach the point where the state intervenes in the private life of the person.

The Evans case resolved the conflict between a woman's right to have a child from her genetic material and a man's (ex-boyfriend's) right not to be a father. Neither right was given priority. The E.C.H.R. in its decision pointed out the lack of homogeneity in the legal field on the issue of “in vitro fertilization”, while it considered that the English legislation was detailed, drawn up after dialogue and deliberation[52].

In the S.H v. Austria case, it approached the issue of the change in the institution of the family, due to the technological development of reproduction, without however taking a position, pointing out the lack of consensus of the member states.

4. THE RIGHT TO PRE-IMPLANTATION GENETIC DIAGNOSIS

Some of the questions that need answering and are related to pre-implantation diagnosis are:

1. Is there any responsibility of the parents, when they did not attempt an abortion, while they knew through a prenatal examination, that the embryo might present a serious health problem?

2. Is there any responsibility of the parents, because they did not perform a prenatal examination, despite the existence of hereditary factors and a heavy medical history?

3. The disposal of surplus reproductive material for research purposes is legal?

A) In vitro diagnostic tests (pre-implantation genetic testing, which includes the analysis of the genetic material contained in embryonic cells or polar bodies, which are removed in vitro, to obtain information on genetic characteristics, before transfer and implantation in the uterus) are a tool for the diagnosis of serious genetic diseases[53] in fertilized eggs, so that only the healthy

---

[52] According to the ECHR, the critical dividing line that requires the consent of both prospective parents is the moment of implantation, either it is natural (by sexual intercourse) or artificial reproduction (artificial implantation of the fertilized egg). Until then, the right of reproduction is exercised equally, especially when in the artificial each phase has a long-time gap and the genetic material inside the test tube does not belong to one of the 2 spouses, but is an element of the personality of both.

[53] With this procedure, abnormalities of the composition, number and structure of the chromosomes in the "in vitro fertilized egg" are detected, as well as the detection of the sex. This makes it possible to diagnose certain chromosomal abnormalities or detect genetic diseases, such as monogenic (e.g. cystic fibrosis), sex-linked (e.g. Duchenne muscular dystrophy) or chromosomal abnormalities (e.g. trisomies).

ones are transferred (in the context of assisted reproductive technology) to the uterus.

In vivo diagnostic tests (intrauterine examination) are carried out on biological material collected by amniocentesis (taking amniotic fluid, which contains fetal cells) or by puncture of the supporting tissue of the fetus, which develops into the trophoblast and, later, the placenta (examination seminal vesicles) during the early stages of pregnancy and help to detect serious disease in the foetus (which is linked to the decision of the pregnant woman whether or not to terminate the pregnancy).

Apart from their positive aspect (as they can be beneficial to families with hereditary origins of serious diseases) they also create issues of quality control of life.

The right to reproduction does not entail a "right to a healthy child", however, what sense would the right to reproduction (and to found a family) have, if it resulted in a stillborn embryo or a newborn with serious illnesses? That is why the national legislations of the states have provided for the permissibility of abortion up to a certain phase of the pregnancy, when a serious abnormality in the embryo is diagnosed. However, state intervention is limited to providing the woman with the opportunity to have an abortion and not to (directly or indirectly, e.g., with benefits) imposing it, because the latter would constitute an interference with the individual's right to self-determination. Therefore, the first two questions posed at the beginning of this subsection could ONLY be answered in the NEGATIVE.

At the international level, the Oviedo Convention includes a relevant provision in articles 12 and 14[54]. At the level of national legislation, attempts are being made to legislate it more and more clearly[55].

It is a fact that the different social and cultural conditions in each country, where other special factors also play a role (such as, for example, religion in Ireland, where both abortion and preimplantation genetic diagnosis are absolutely prohibited) mean that there is no common threshold for treatment of preimplantation genetic diagnosis in all European countries. This has resulted in cross-border movements of patients, despite the "chilling effects" measures taken in some countries (see especially Ireland on abortion).

B) Besides, the possibility of creating and using fertilized eggs (embryos in vitro) for research purposes has been the subject of extensive discussions at an international level. Regarding the creation of eggs for such purposes, the trend is to ban the practice, at least for the countries that have ratified the Oviedo Convention (see article 18 par. 2 thereof)[56]. Regarding the

---

[54] Article 12 – Predictive genetic tests Tests which are predictive of genetic diseases or which serve either to identify the subject as a carrier of a gene responsible for a disease or to detect a genetic predisposition or susceptibility to a disease may be performed only for health purposes or for scientific research linked to health purposes, and subject to appropriate genetic counselling. Article 14 – Non-selection of sex, the useof techniques of medically assisted procreation shall not be allowed for the purpose of choosing a future child's sex, except where serious hereditary sex-related disease is to be avoided.

[55] In Greece, law 3305/2005 in article 10 (as it applies after its replacement by article 6 par. 3 of law 4958/2022), set as conditions for the couple's access to the technique of pre-implantation genetics diagnosis their consent, after providing genetic counselling and permission from the Medical Assisted Reproduction Authority.

[56] Article 18 – Research on embryos in vitro "1 Where the law allows research on embryos in vitro, it shall ensure adequate protection of the embryo. 2 The creation of human embryos for research purposes is prohibited". It is argued that this article does not prohibit or allow research but refers the decision to the national legislature "*in fact, without taking a position on the principle of research on the foetus, it indirectly allows it in paragraph 1 of the article, when it refers the relevant decision to the national legislature. The categorical wording of the provision of paragraph 2 of article 18, which does not allow the creation of embryos for research, sets the limit of this freedom. In the intermediate space are the supernumerary unused embryos, those that have not been used by those from whom they come*" in Papazisi Theofano "Ζητήματα βιοηθικής στην Σύμβαση του Oviedo σε σχέση και με τον. 3089/2002", ΧρΙΔ 2006 σελ. 385 επ. The creation of embryos for research is permitted in the United Kingdom,

disposal of surplus reproductive material for research purposes, this is not prohibited as a rule[57], but sometimes it is allowed under conditions (for therapeutic purposes)[58].

The decisions that are important are:

A.K. V. LATVIA (Application no. 33011/08)[59]

COSTA AND PAVAN v. ITALY (Application no. 54270/10)[60]

PARILLO v. ITALY (Application no. 46470/11)[61]

A.K. v. Latvia

The applicant was 40 years old and discovered her pregnancy in the 6th week when she visited A. Hospital. Since then, she attended all her gynaecological appointments and gave birth in June 2002 to a baby girl with Down syndrome. She claims she was denied adequate prenatal screening that would have indicated her fetus's risk of a genetic disorder and allowed her to choose whether to continue the pregnancy.

The E.C.H.R. held that there had been a violation of Article 8, because the domestic courts had failed to fully investigate the above claim of the applicant.

Costa and Pavan v. Italy

The Italian legislation, during the time occupied by the E.C.H.R. allowed IVF for infertile couples or those where the man suffers from a sexually transmitted disease but prohibited preimplantation genetic diagnosis. The parties-spouses were already the parents of a child suffering from cystic fibrosis, and they themselves, after relevant tests, were diagnosed as healthy carriers of the disease. In 2010, Costa became pregnant and found through medical tests that the embryo suffered from cystic fibrosis, with the consequence of terminating the pregnancy. In order to undergo IVF again and in order to make sure that the embryo will be healthy, the couple wanted to use the method of pre- implantation genetics. However, due to the legislation, they could not resort to in vitro fertilization and appealed to the E.C.H.R. arguing that in order to have a child without cystic fibrosis, Costa had to become pregnant naturally and terminate the pregnancy when the fetus tested positive for the disease, this constitute unjustified discrimination against them, in relation to couples who were infertile or they carried a sexually transmitted disease, for which the Italian legislature provided.

Parrillo v. Italy

The Italian applicant, A. Parrillo, in 2002 with her partner, resorted to A. R. techniques, through which five fertilized eggs were created, which were cryopreserved. In November 2003 her partner died, before the implantation of the fertilized eggs. The applicant wished to donate the "in vitro fertilized eggs" to help scientific research to find ways to cure diseases that are difficult to cure. However, Italian legislation (N. 40/2004) prohibits experimentation on human fertilized eggs, even for scientific research purposes, making any such act punishable by two to six years in prison. The applicant argued that the fertilized eggs in question were created before the aforementioned law came into force and that it was therefore perfectly legal for her to store them through cryopreservation and then donate them for research. The applicant complained that the intervention of the Italianlegislature in prohibiting her from donating her fertilized eggs

---

Belgium and Sweden.

[57] See Greece, Switzerland, Netherlands, Hungary, Estonia, Skopje.

[58] See Italy and Slovakia.

[59] https://hudoc.echr.coe.int/eng#{%22itemid%22:[%22001-145005%22]}

[60] https://hudoc.echr.coe.int/eng#{%22itemid%22:[%22001-112993%22]}

[61] https://hudoc.echr.coe.int/eng#{%22itemid%22:[%22001-157263%22]}

for scientific research, requiring her to keep them cryopreserved until they were no longer viable, infringed her right to respect for her private life (Article 8).

For the first time the E.C.H.R. was called upon to rule on the question of whether "the right to respect for private life" could include the right to use fertilized eggs obtained through IVF for donation to scientific research. The "family life" aspect was not an issue in this particular case since Ms. Parrillo had decided not to proceed with a pregnancy with the eggs in question. The E.C.H.R., noting that the fertilized eggs obtained through IVF contained the reproductive material of the significant person and therefore constituted an element of his identity, concluded that Mrs. Parrillo's ability to choose the fate of her fertilized eggs, it concerned an aspect of her personal life and therefore related to the right of self-determination. The E.C.H.R. also took into account the importance attached by the national legal system to the freedom of choice of assisted persons regarding the fate of fertilized eggs that were not intended for implantation. It therefore concluded that Article 8 was applicable in this case. However, it dismissed the appeal, because there was no indication that Ms Parrillo's deceased partner, who, like the applicant, held the same interests in the fertilized eggs in question at the time of the IDA, would wish to donate them to science. Furthermore, there were no regulations governing the situation in Italy.

From the overview of the above jurisprudence, the conclusions that could be drawn are:

- The E.C.H.R. in the case of A.K. v. Latvia emphasized the importance of enabling every expectant mother to have access to adequate prenatal testing, which would result inreporting the risk of a genetic disorder to her foetus and allow her to choose whether to continue or terminate her pregnancy, within the context of the relevant of private autonomy.
- The E.C.H.R. in Costa & Pavan v. Italy dealt with the issue of banning the use of preimplantation genetic diagnosis. The Court ruled that the Italian legislation, which allowed the possibility of termination of pregnancy, however prohibited pre-implantation testing in cases of genetically inherited diseases, was in conflict with Article 8 of the E.S.D.A., since the choice of the parents " not to have a child suffering from cystic fibrosis was an expression of their private and family life".
- From Parrillo v. Italy, it can be concluded a contrario that if the applicant's partner was alive and consented to the donation, it would be possible according to the E.S.D.A. and the prohibition of the Italian law would constitute a violation of the right to respect for private life.

5. «WRONGFUL LIFE»

Related to the above issue of pre-implantation diagnosis, is the responsibility of the doctors (and biologists) who carry out the diagnostic tests. The error of the diagnosis creates their responsibility towards the parents, but not towards the child, who cannot establish a relevant right to compensation, because he/she will experience a life "unfair and unworthy to live". These are the "wrongful life" cases that have concerned the courts of several states and the E.C.H.R.[62]

Before examining the events of the case that occupied the E.C.H.R. we should make a reference to the Perruche[63] case, which occupied the French Supreme Court, due to relevance. The above decision concerned a child who was born completely deaf, with absolute inability to see in one eye, suffering from serious neurological problems, heart disease and significant mental

---

[62] https://hudoc.echr.coe.int/eng#{%22itemid%22:[%22001-215360%22]} Similar Case has conducted and the Supreme Court of the State of Washington, case of Pacheco-Leumus v USA,https://1f2ca7mxjow42e65q49871m1-wpengine.netdna-ssl.com/wp-content/uploads/2021/12/Toombes-v- Mitchell-Approved-Judgment.pdf, https://www.courts.wa.gov/opinions/pdf/1005261.pdf

[63] Decision on the Perruche Case (November 17, 2008, Bull. civ. No 9) of the Plenary Session of the French Supreme Court.

retardation. It was about the consequences of rubella, which his mother had contracted at the beginning of the pregnancy and who, due to the incorrect results of a biological laboratory, was deprived of the possibility to terminate the pregnancy, although she had strongly expressed this wish to her doctor, in the event that he was not covered by immunity against the disease. The child's parents requested restitution for both the moral damage they suffered and the material damage their child suffered. The dispute that erupted between the French Court of Cassation and the courts of substance concerned whether or not the latter's claim for compensation should be upheld. The Supreme Court awarded compensation to both the parents and the child independently, invoking the provisions of the French Civil Code on intra-contractual and tortious liability. The French legislator, after this case, prohibited by law the compensation of doctors to disabled children, born after incorrect prenatal testing, because such a thing offends the personality of the children (!).

In the case of N.M. and others v. FRANCE (Application 66328/14), N.M. (mother, born in 1972) M.M. (father, born 1971) (and their son A, born 2001) sought compensation, in an action brought in 2006, for special expenses arising from the disability of A. (born with VARTEL syndrome, leading to perforation of anus, with abnormalities affecting the kidneys, a vertebra and one of his upper limbs, as well as facial asymmetry), which was not detected during pregnancy, despite 3 diagnostic tests and for trisomy 21, due to an error by the diagnostic test, in a French public hospital. Prior to the filing of the lawsuit before the French courts, the provisions of the above-mentioned Law I, no 2002-30 (also known as the Perruche Law) were in force, which exempted the doctors from paying the relevant compensation and this law was given retroactive effect with a subsequent law of 2005. The above law was also applied by the French Conseil d' Etat, awarding only compensation for moral damage to the parents and no compensation to the child (upholding the decision of the Administrative Appeals Court, which had also awarded compensation to the child, based on Article 1 par. 1 of the First Additional Protocol of the Europ. Conv.). The applicants invoked the aforementioned violation of the First Additional Protocol of the Europ. Conv. in terms of property, to apply the law retroactively. The E.C.H.R. ruled that for the applicant parents there was a violation (since there was a reasonable expectation of compensation), reserving the amount.

It should be noted that the aforementioned law has concerned the E.C.H.R. and in previous cases[64], but the presentation of the latter was preferred as the most recent.

III. CHOICING THE EMBRYO – SAVIOR SIBLING – DEATH OF THE EMBRYO

Most of the issues raised in this Chapter have not (yet) concerned the E.C.H.R. However, they have occupied both the theory and several national courts (with richjurisprudence among them). They are presented here in summary, as a percentage ofwhat has already been exposed above. The applicable international and national (where it exists) is taken as the legislative regime.

1) Is "embryo selection" allowed?
2) Is it allowed to create in vitro embryos, solely to obtain stem cells from them?
3) Is it possible to carry out genetic tests on embryos in vitro, in the context of assisted reproduction, even when the purpose of the genetic test is not limited to the selection of a healthy embryo, which will not suffer from a serious hereditary disease, but also aims to be the chosen one embryo compatible donor with the already sick child of the family (saviour sibling)?[65]

---

[64] See decisions in cases Draon v. France and Maurice v. France (6 0ctober 2005, no. 1513/03 & no. 11810/03), Petri and Leblanc v. France (26 August 2008, no. 28565/06) and Levenez v. France (19 January 2010, no. 306).

[65] The question was raised in England, where the British Court of Appeal gave the "green light" to parents to have a child histocompatible with his sick brother. Zain Hashmi suffered from a serious genetic blood disorder that required him to undergo up to 5 blood transfusions each week lasting 12 hours. Zain's parents, in an

4) What happens in case of death of the embryo?

1) According to article 14 of the Convention of Oviedo, the selection of the sex of the embryos is allowed, for reasons related to the health of the children themselves who will be born[66]. Article 12 of the Convention allows the carrying out of tests that predict the genetic predisposition to disease, so indirectly it seems to accept the selection of an embryo for health reasons, regardless of its sex. Both provisions accept a form of "negative eugenics". In any case, however, the gamete donors, thus the future parents, arethe ones who have the final decision.

Different is the case of selection for reasons of "positive eugenics", such as when the parents wish to select for the child to be born, through pre-implantation genetic diagnosis, specific phenotypic characteristics (eye or hair colour, height, etc.) or a specific genetic abnormality carried by the parents (e.g. congenital deafness or congenital dwarfism), on the grounds that the child will function better in the family context. In these cases (children on demand) there is no medical indication, and the choice is not aimed at dealing with a medical problem and contradicts the principle of dignity. That is why it is not allowed.

2) There are no legal dilemmas (at least in the countries where abortion is allowed and for as long as it is allowed) about the stem cells derived from cadaveric fetal tissue after abortion or miscarriage. It is permissible to take them. Whether the consent of the surrogate and the donor of the gametes is required and whether this decision can be taken by the doctor, are matters that are left to the state legislator, although the proportional application of article 22 of the Oviedo Convention[67] is provided for, in this regard. For obtaining stem cells from excess in vitro embryos, reference has already been made in the previous sub-chapter.

However, regarding the question of creating embryos in vitro for obtaining stem cells, there is a legal dichotomy. According to others, based on article 18 par. 2 of the Convention of Oviedo, this is prohibited, according to others it is allowed for therapeutic purposes. In Greek territory it is actually allowed for therapeutic purposes, with the method of therapeutic (and not reproductive, which is prohibited) cloning.

3) Related to the above issue is the case where the pregnancy occurs through in vitro fertilization, with simultaneous selection of an embryo histocompatible with the couple's first child, so that the second child can help in the treatment of his brother.

This is the case where a child suffers from a genetic abnormality and needs a hematopoietic cell transplant. In this case, it is not enough to use the patient's own stem cells, because the genetic abnormality will also be present in the stem cells. Thus, the use of hematopoietic progenitor cells derived from the umbilical cord blood of the couple's second child is preferred, which is specially selected for this purpose, through pre- implantation screening, so that it is on the one hand histocompatible with his brother and on the other hand does not present the same genetic alteration. The stem cells obtained from the second donor

---

attempt to prevent the foretold death of their child, applied to Britain's Human Fertilization and Embryology Authority (HFEA) to obtain permission to give birth, through pre-implantation diagnosis, a child histocompatible with Zain. Although the HFEA ruled in favor of the Hashmi couple's request, representatives of anti-abortion Roman Catholic Church organizations reacted strongly and took legal action. At first instance, the justice ruled that the HFEA overstepped the bounds of its jurisdiction by authorizing pre-implantation histocompatibility testing on in vitro embryos. But the Court of Appeal vindicated the parents by ruling that the HFEA is the competent authority in Britain to issue licenses to couples who wish to carry out pre-implantation tests and effectively allowing the birth of a histocompatiblebrother for Zain.

[66] These are the diseases related to the X chromosome, which usually manifests in males, due to the different composition of the sex-linked pair of chromosomes 23, which consists of a single X chromosome. Similar regulation in Greek law with article 1455 of the Civil Code.

[67] Article 22 – "Disposal of a removed part of the human body When in the course of an intervention any part of a human body is removed, it may be stored and used for a purpose other than that for which it was removed, only if this is done in conformity with appropriate information and consent procedures".

embryo are used in a transplant to the eldest child of the family.This is embryo selection aimed at protecting health, without being included in the category of "negative eugenics". In the absence of a legislative framework for this case, several bioethical issues are raised. Those who hold a negative view, focus on the"instrumentalization" of the embryo (treating a future person as a means to serve other purposes). The counter argument is that the fact that a child is born to serve a recognized purpose does not automatically mean the loss or violation of his human value[68].

4) The question of the death of the embryo and the fate of its body is left to the respective national legislator.

In Greece, the deceased is legally treated as a "thing" and not as a "person". However, there are criminal provisions for the protection of the body (e.g., from profane acts). For the dead fetus under 180 days, there is no legislative framework. The only thing that exists is a recommendation of 19-12-2013 of the National Bioethics Committee, which seems to be adopted as a protocol by public hospitals and where the case of the fetus that died before 180 days is dealt with (where the parents decide on the burial, burning it or managing it as a medicine waste, when they do not wish to decide on it, the issue is taken over by the Hospital), as long as for the fetus after 180 days a normal birth is induced and burial (or cremation) is carried out.

Jurisprudence has not, to my knowledge, dealt with the issue. On the other side of the Atlantic, however, the Supreme Court dealt with the case of Kristina Box, Commissioner, Indiana Department of Health, et al, v. Planned Parenthood of Indiana and Kentucky Inc. et al (2019). There was an issue regarding the constitutionality of, among other things, Indiana's statutory provision regarding the disposal of post-abortion foetal remains. The relevant provision prohibits the burning of these remains together with other medical waste, and mandates the immediate incineration of fetal remains, however leaving the final decision on the fate of the fetus after the abortion to the mother. The above legislative provision was deemed constitutional by the Supreme Court U.S.[69]

IV. «EUGENICS» and «HEALTH»

ETHICAL DILEMMA ASSOCIATED WITH NEW TECHNOLOGIES (INTERVENTION IN THE HUMAN GENETOME)[70]

A) Before proceeding to the position of the issues of this chapter, it is useful to clarify some terms, widely used in legal texts, such as the term "EUGENICS" and the term "HEALTH", although

---

[68] see Ευάγγελος Μάλλιος "Γεννετικές Εξετάσεις και Δίκαιο", 2004 σελ. 55 (E. Mallios, Genetic tests and law, 2004, p. 55) "*The first and main reason for resorting to pre-implantation diagnosis is the birth of a child without specific genetic anomalies. But when stem cell transplantation from a histocompatible donor is the only therapeutic way out of certain death, its absolute refusal is morally reprehensible and legally meteoric. Preimplantation testing should be extended to histocompatibility testing only as a last resort, i.e.,only when classical medical treatment methods have exhausted their limits. When the legal good at stakeis the health and life of a child, then preimplantation diagnosis and artificial reproduction can deviate from their purpose (as defined by law: to treat infertility and protect the health of the foetus) and become in a method of treatment and protection of the life of a third person*" (free translation).

[69] Ναταλία Ταμιωλάκη οπ.αν. σελ.763-764 (Natalia Tamiolaki, The problem of the abortion, 2019, pages 763-764. In particular, on the issue of burial and management of foetal tissues and embryos in Greece, see related thesis by Nikolaos Koutkas.

[70] According to the Article 13 – Interventions on the human genome of the Convention of Oviedo "An intervention seeking to modify the human genome may only be undertaken for preventive, diagnostic or therapeutic purposes and only if its aim is not to introduce any modification in the genome of any descendants".

I imagine that they are familiar to most.

The term "Eugenics" (engl. Eugenics, franc. Eugénique ou Eugénisme) refers to the "scientific branch with object the ways of improving the human race, mainly at the physical level, by applying the laws of genetics and heredity"[71]. When international legal texts use this term, they mainly refer to its content, as it was attributed by the founder of the eugenics political movement, Sir Francis Galton (1822-1911)[72] and as it was reinforced by racial theories which found application at the beginning of the 20th century, mainly in the USA[73] and later in Germany, *as the attractive scientific clothing of racist choices*[74], applications which these legal texts seek to condemn[75].

The term "Health" is attributed to the Charter of the World Health Organization (sanctioned by the Greek state with n.d. 436/1947, A' 238), as : "Health is a state of complete physical mental and social well-being and not merely the absence of disease or infirmity" [La santé est une état de complet bien-être physique, mental et social, ne consiste pas seulement en une absence de maladie ou d'infirmité]. Health has two aspects: "*On the one hand, it is a classic individual (negative) right with erga omnes force, which includes the obligation of the State and any other*

---

[71] G. D. Babinioti, entry: eugenics, Dictionary of the new Greek language, 2nd edition, Athens 2002, p. 686, Tegopoulos-Fitrakis, Major Hellenic Dictionary, 1999, p. 454., French Dictionary Robert «Eugénique ou eugénisme: Science qui étudie et met en oeuvre les méthodes susceptibles d'améliorer les caractères propres des populations humaines, essentiellement fondée sur les connaissances acquises en hérédité», encyclopedia Larousse «Eugénique ou eugénisme : Science qui a pour objet d'étudier les conditions les plus favorables à la reproduction humaine et à l'amélioration consécutive de la race». Eugénisme, Dictionnaire Permanent Bioéthique et Biotechnologies, p.853.

[72] Eugenics = suppression of "inferior" reproduction. He believed in the linear dependence of personality development and social behaviour on hereditary specifications.

[73] see U.S. Supreme Court decision Buck v. Bell (1927): In 1924, Virginia, USA, enacted a law that, for eugenics reasons, allowed the compulsory sterilization of mentally retarded individuals. To test the constitutionality of the law, the supervisor of the institution for the retarded who cared for young Carrie Buck, asked the institution's board of directors (BoD) to apply the law to her, citing that she was the daughter of a mentally retarded woman with three children of unknown parents and that she herself was incorrigible, as her adoptive family entrusted her to the institution after her pregnancy by an unknown father. The Board agreed but her curator disagreed and thus a court case arose that reached the Supreme Court. On May 2, 1927, the Supreme Court by a majority of 8 to 1 accepted the constitutionality of compulsory sterilization (Buck v. Bell). In the opinion of the majority (Judge Holmes): "We have seen more than once that the public welfare may call upon the best citizens for their lives. It would be strange ifit could not call upon those who already sap the strength of the State for the lesser sacrifices, often not felt to be such by those concerned, in order to prevent our being swamped with incompetence. It is better for all the world, if instead of waiting to execute degenerate offspring for crime, or to let them starve for their imbecility, society can prevent those who are manifestly unfit from continuing their kind. The principle that sustains compulsory vaccination is broad enough to cover cutting the Fallopian tubes. Three generations of idiots are enough."

[74] see. Ε. Μάλλιος οπ.αν. διδακτορική διατριβή, σελ. 197, see E. Mallios above doctoral thesis, page 197.

[75] Indicatively, from 1907 to 1935, a total of 21,539 people were sterilized, more than half of them in California, while in Germany on July 14, 1933, a law was passed for the sterilization of hereditary patients (mentally retarded, schizophrenic, manic-depressive, those suffering from Huntington's chorea, deaf and dumb, physically disabled and chronic alcoholics). It is estimated that between 1933 and 1939, 350,000 to 400,000 people underwent sterilization (see Eugénisme, Dictionnaire Permanent Bioéthique et Biotechnologies, p.853). Lombardo's book states that by 1970 in the USA 30 states had legislated compulsory sterilization, which led to the sterilization of 65,000 citizens. Even today, eugenics logics are seen being adopted by some courts. Typical are the cases of Re H [2004] FamCa 496 (Austl) and the case of Jeannette Re B. (A MINOR) [1988] 1 A.C. (H.L.), involving the compulsory sterilization of two girls aged 12 and 17 respectively in Australia and Britain, the vasectomy of mentally disabled DE in Britain, the hysterectomy of Angela, aged 11 in Australia (Re Angela [2010] FamCa 98 (Austl) and Ashley X in America (The Ashley Treatment Towards a Better Quality of Life for Pillow Angel: http://pillowangel.org/Ashley%20Treatment%20v7.pdf).

public or private subject to refrain from any behavior capable of injuring the physical and mental well-being, thus the health of citizens or to limit their freedom to decide for themselves in matters concerning their personal health. On the other hand, it is a formal social right, which consists in the provision by the State of services that promote, maintain, or restore the health of citizens"[76]

Any medical intervention on the human body, with the aim of regaining the person's physical and mental functions, serves the protection of human dignity, which in the corresponding chapter I (subchapter 2 hereof), was shown as a cornerstone of the Oviedo Convention, but also of most nation-state Constitutions. This principle, by definition, isopposed by eugenics, as defined above.

B) Since the early 1990s, biotechnology, molecular genetics and genetic engineering have bombarded us with a series of discoveries and medical interventions that are rapidly challenging established social mores. Indicatively, they were very widely discussed:

a)The applications of Nanotechnology in humans (with limited knowledge about the behavior of nanoparticles in biological environments such as the human body, with unknown ways of interaction of implants with the biochemical composition of the organism) have already raised huge issues, e.g. with its use in the vaccines for Covid-19, -which were allowed to be given (also) to pregnant women(!!!), while they were excluded from the 3rd phase of clinical trials and while they were in an experimental stage - and the side effects of these. Itis sad that it was required a court decision to make them known to the general public[77],

b) synthetic life, after the announcement in May 2010 of the Institute of J.C. Venter for the creation of the first synthetic bacterial cell, capable of reproduction[78],

c) new techniques, such as that of the CRISPR/Cas9[79] method in genome editing, with the possibility of changing the DNA of an organism, i.e. with the possibility of adding, removing or modifying genetic material in specific positions of the genome, especially after the announcement ofa research group at the University of Shenzhen that it is recruiting couples in its effort to create the first children to be born after genome editing[80], while the committee of the International Summit on Human Gene Editing in Washington on 2/14/2017 left open the question of whether gene therapy is permissible for "improvement" purposes. It is important to point

---

[76]Χαράλαμπος Ανθόπουλος «Η προστασία της υγείας ως θεμελιώδες κοινωνικό δικαίωμα», ΤοΣ 4/1993, σελ.74Ι, Charalambos Anthopoulos "The protection of health as fundamental social right" (free translation).

[77] see https://phmpt.org/pfizers-documents/, Public Health and Medical Professionals for Transparency, This non-profit, made up of public health professionals, medical professionals, scientists, and journalists exists solely to obtain and disseminate the data relied upon by the FDA to license COVID-19 vaccines. The organization takes no position on the data other than that it should be made publicly available to allow independent experts to conduct their own review and analyses. Any data received will be made public on this website.

[78] Although it eventually turned out to be a DNA copy of the bacterium Mycoplasma genitalium, assembled in the laboratory, see p. 13 Roupakias etc. op. op., the research was continued by another group in 2016, which published the results in Nature https://www.science.org/doi/10.1126/science.aad6253 "Design and synthesis of a minimal bacterial genome", the scientists are now talking about possible applications in agriculture, nutrition, biomedicine and environmental restoration.

[79] The technique arose from copying a natural genome editing system that occurs in bacteria. Bacteria capture fragments of DNA known as CRISPR arrays, which allow bacteria to remember viruses (or their close relatives). If the viruses attack again, the bacteria produce pieces of RNA from the CRISPR arrays to target the viruses' DNA. The bacteria then use the Cas9 enzyme to cut the DNA, inactivating the virus. In the lab, once the DNA is cut, researchers use the cell's DNA repair machinery to add or delete pieces of genetic material or make changes to it, by replacing an existing segment with a personalized DNA sequence. The method suffers from a safety point of view with the possibility of so-called off-target effects(editing in the wrong part of the genome) and mosaicism (when some cells carry the edit, but others do not).

[80] CRISPR BABIES, resistant to HIV, smallpox and cholera www.apnews.com/4997bb7aa36c45449b488e19ac83e86d/ "Chinese researcher claims first gene-edited babies".

out that most bioethical concerns lie in the question of whether it is ethically permitted to carry out experiments on human embryos after 14 days after their creation (the conflicting opinions are based on those who believe that they are a set of cells and those who believe that since then it acquires a human status),

d) the technique of mitochondrial transplantation[81]. That technique is applied by the law in the United Kingdom since 2015, although it has raised a storm of reactions, because against those who argue that its application will save many people from serious and fatal diseases, without affecting the characteristics of the person, stand those who express concerns about its safety, since it has been tested on animals and human tissues and not on humans, while they believe that it can be a back door for the creation of "children on demand", with an indirect legalization of eugenics. This controversy was also expressed in Greece at the National Bioethics Committee during its meeting on 7-7-2014[82], while already in my country a baby was born with that method on 11-11-2019 and

e) publication of a study by Israeli scientists[83] in the journal Nature on 17-3-2021, on the subject of "ex utero mouse embryogenesis from pre-gastrulation to late organogenesis". This is a group of Israeli scientists from the Weizmann Institute of Science, who published the results of their research, during which they had successfully gestated hundreds of mice inside an artificial womb. They placed fertilized eggs inside glass vials rotating in a ventilated incubator and grew the embryos for 11 days (the mid-point of a mouse pregnancy) outside their mother's body. The embryos developed normally, their hearts, visible through the glass vials, beating steadily at 170 beats per minute. … One step closer to pregnancy-free reproduction... The idea of babies growing in jars … In 1992 Japanese researchers had some success growing goats inside rubber bags. In 2017, researchers at the Children's Hospital of Philadelphia (CHOP) revealed they had grown lamb embryos in plastic bags from the equivalent of around halfway through a typical ewe pregnancy to full term. In 2019, Dutch researchers received a €2.9 m. grant from the EU to develop an artificial womb that would use replicas of human babies dotted with sensors before being deployed in hospitals. The scientists behind these innovations are motivated by noble intentions: they want to save the most vulnerable human beings on the planet by improving outcomes for super-premature babies, or to understand early gestation, and why so many pregnancies end in miscarriage”[84].

---

[81] It's about 2 techniques. The technique by which Pronuclear Transfer in vitro fertilization takes place and the pronucleus of the mother/father zygote of the fertilized egg containing defective mitochondria is removed. The donor egg is fertilized with the father's sperm and this donor/father zygote has its pronucleus removed and replaced with the pronucleus from the mother/father zygote. The final fertilized egg will contain genetic material from three people and will be a "three-parent baby". In the second technique of Maternal Spindle Transfer or Maternal Chromosomes Transfer the difference is that the nucleus of the "defective" egg of the mother replaces the nucleus of a healthy donor egg, with fertilization following.

[82] https://medlawlab.web.auth.gr/wp-content/uploads/2022/02/01.-%CE%93%CE%9D%CE%A9%CE%9C%CE%97-%CE%A3%CE%A5%CE%93%CE%A7%CE%A1%CE%9F%CE%9D%CE%91-%CE%96%CE%97%CE%A4%CE%97%CE%9C%CE%91%CE%A4%CE%91-%CE%95%CE%A0%CE%99%CE%9B%CE%9F%CE%93%CE%97%CE%A3-%CE%A3%CE%A4%CE%97%CE%9D-%CE%91%CE%9D%CE%91%CE%A0%CE%91%CE%A1%CE%91%CE%93%CE%A9%CE%93%CE%97-7-%CE%99%CE%BF%CF%85%CE%BB%CE%AF%CE%BF%CF%85-2014.pdf

[83] https://www.nature.com/articles/s41586-021-03416-3.epdf?sharing_token=1OeBH0ez5Z_T40fV-ArDBNRgN0jAjWel9jnR3ZoTv0Oc3gOxmeEbIiar8ru9wpu0LY5hZ8SlAs_-kqTq7DSCYEaMeWpWVzGVnmjbp5smvpsEmIC397wIO282J3boHHI0cNMTqu8pZaqS8jfptTrPDQeGyy2Ciz FerigABLKxEfZPM_tDH2KcZc7TJOgEPCD2VXSsd5bDyBjhpFFwRfN- qt_ldlOEbpqNKBUVOV94gd9kdqCJ_U8Op6B-23X01sWiJcTr2dxoSlJiA2c9nq3E5VmFKZLm2NE5avaT20UwLCdkJ1Ml3qLi4cHtHvLFFRVrX9G0W22GXsb mDtl4uXibaYvzsingT9G8YblsqKJjnmQ%3D&tracking_referrer=www.theguardian.com

[84] Jenny Kleeman “Reproduction without pregnancy: would it really emancipate women?”, https://www.theguardian.com/commentisfree/2021/mar/25/reproduction-without-pregnancy-emancipate-women-artificial-wombs

C) The list of discoveries is endless and long. On the one hand, research, and the wave of technological progress, which is certain that we cannot stop it, because it is connected to the constant need of man to improve the quality of his life. Here, the precautionary principle, as it is formulated mainly in modern environmental law, mandates the cessation of research activities and applications, if there is uncertainty as to the risks that may be involved. This principle acts as an inherent limitation of the freedom of research. However, the key question is: does it actually work? Because it is not only the question of law that has (or should) be set as an operating framework and that, accustomed to stable situations and slow paces of adaptation, stands and watches awkwardly while gasping and runs behind the developments, without always standing up next to those, for whom progress is supposed to exist, but it is also how the latter ultimately constitutes a safety valve against developments, operating in a human-centered way and controlling the respective experts, who propose, give opinions and decide for "our good".

On the other hand, the right to health, which is linked to the complete control of organic and mental functions by the subject of self-determination, that is, by each person personally for himself. Which is linked to the protection of human value and personality because the loss of control of organic or intellectual functions can marginally lead to the "objectification" of the individual and his transformation into a hetero-determined entity, while the control of organic and intellectual functions is a necessary condition for the free development of the personality. Which is connected to the protection of life because the viability of the person presupposes a minimum control of his vital functions, a "minimum health".

The control of reproductive modes, the possibilities of prenatal disease control, the insights from mapping the human genome, the genetic interventions in the human reproductive line to restore "defective" genes -or when there can be no restoration, the dilemma of the pregnant for abortion or for the birth of a child with genetic disorders-, gene therapies and intervention in the human genome for therapeutic and aesthetic purposes, give the possibility of strengthening the genetic heritage of people, through the manipulation of their genetic code. What this means in practice is that "a new spectre of eugenics is hovering over the planet". These are those forms of eugenics which, alongside the old ones, -where they are still applied to the detriment of the disabled[85], the poor of thisplanet and not only-, *are identified with the terms of increased economic efficiency, better performance standards, improvement of health and quality of life, under the guise of consumer desire[86]*, while some of them have passed into modern customs and seem to begaining ground in becoming widely or merely accepted[87]. This is what was aptly pointed out[88], on the occasion of the announcement of the creation of the "artificial womb", that pregnancy can be *a choice open to elite women whose companies will pay for it or who can afford to cover the cost themselves, while "natural pregnancy" could be considered* as a *sign of poverty, unplanned pregnancy or chaotic lifestyle.* And the fact that multinational companies such as Apple, Google, Facebook, VICE and Buzzfeed have already offered to cover the cost of freezing their employees' eggs so they don't have to worry about fertility decline, in the most productive years of their career, can't lead us to reassurance.

The possibilities of intervention in the human genome seem to not only threaten, but ultimately *shake some accepted terms and rules that regulate institutions (such as kinship), but also the very concept of man and his genetic origin, leading to an evaluative void, where the limits of social consensus or social solidarity seem to shift to the detriment of the protection of human*

---

[85] See above footnote 75.

[86] See E. Mallios above doctoral thesis, page 199 (free translation).

[87] e.g., the stream of consumers-parents who request gene intervention for "custom-made children" increases, in phenotypic characteristics (eye, hair, skin colour), but also in abilities-enhancing characteristics (such as for athletic performance).

[88] See above footnote 85.

dignity. Faced with the critical demand, on the one hand the need for progress and development of biomedical research (with the aim of protecting health) and on the other hand the respect for the personality and dignity/value of every human being, the modern applications of bioethics must be examined under the microscope of human dignity/value/worth.

And because human dignity is subjective and for this reason, each of us has the freedom to define for himself which actions are compatible or not with his own value, each of us can decide when our dignity/value is offended and when it is not and it is not understood "an outside decision" about insulting this value.

But can the protection of human dignity/value provide the answers to all the issues that arise? A balance between the dignity/value of man and contemporary bioethical issues is certainly required. *But this balance cannot be achieved through the recognition of a scaling (relativization and weighting) of human value*[89]. The legal argument for any dispute can be built up and substantiated whenever there is a conflict. *But one must take a step back from the theoretical abstractions, to see that what is at stake each time is not the perfection of a legal reasoning, but the lives of real people, with finite possibilities andgiven weaknesses, who often come faced with challenges and dilemmas that are beyond them. The role of the State in general and the Courts in particular then emerges more clearly: the relief of people from burdens that only internal, moral imperatives can impose on them, the strengthening of the sense of justice and the promotion of social peace*[90].

Epilogue

Aldous Huxley[91] in his novel "Brave New World" of 1932, talks about an imaginary state in which the science of biology has made such progress that parents will no longer be required to create children, since embryos will be hatched in special artificial placentas, since they will have previously been cloned and even in multiple copies. This state will be hierarchically structured in “castes”. Each “caste” will be determined on the basis of the genetic material and the nutrients that will be given to the embryo during the process of hatching and not on the basis of the effort to improve human existence, nor on feelings and expectations, while the parent, the child, the brother will be fading meanings.

And here we are at the time when the fantastic becomes reality. For those of us born Human, began our lives in our first home, which is the amniotic universe (the womb)[92], supplied with the 0.1% of our genome that makes us unique and with the absolute awareness that we are grains of sand, towards the planet we share with other living beings and towards our great Home, the vast Universe, -yet completely connected to each other and to it-, for those of us who still feel Human and want to remain Human, we must take extra care: To demand continuous and permanent all-round information, so that on an individual level, we can make the right decisions for ourselves, our children and our loved ones and on a collective level, to ensure the conditions

---

[89] βλ. Φ.Παναγοπούλου-Κουτνατζή, οπ.αν. περί της αξίας της ανθρώπινης αξίας σελ. 744 (Επίλογος), see F.Panagopoulou-Koutnatzi epilogos in the article “about the value of the human dignity”, page 744 (free translation).

[90] See above Natalia Tamiolaki, page 771 (free translation).

[91] Who is considered as a follower of eugenics, not as a supporter of racial discrimination, but as a supporter of genetic determinism (negative and positive eugenics), advocating that eugenics was the answer to the degeneration of the human race, considering it necessary to direct evolution of the human species, through the directional control of reproduction.

[92] see Ioanna Mari op.an. footnote 9, Thomas Verny “Womb ecology – World ecology”, Proceedings of the 2nd World Conference on Prenatal Education, Athens 1994, βλ. Ι.Μαρή οπ.αν. υποσημείωση 9, Thomas Verny “Οικολογία στη μήτρα για Οικολογία στον κόσμο” (Womb ecology – World ecology), Πρακτικά 2ου Παγκόσμιου Συνεδρίου Προγεννητικής Αγωγής, Αθήνα 1994.

of access of each of our fellow human beings to the knowledge for the best management of our common life and for the cause of making collective decisions, on a democratic basis, -since we are in a position to know better our "good", in contrast to each "expert", who wants to acquire control and power over our personal data, our very human essence.

Let's try to remain Human, until the end of our lives. We owe it to our children; we owe it to our grandchildren. I think that is the task of our generation.

Note: The paper was initially presented as a congress key-note presentation on the 9th Oct 2022 during the Global Congress titled "Prenatal Sciences, Human-Earth Connection and Life Sustainability" organized by the Prenatal Sciences Partnership (6-9 Oct 2022)

REFERENCES

Author's Note: The bibliography and articles listed here, correspond to a very small, indicatively selected part of the foreign and Greek one, which was studied by the author for the needs of this paper. They are arranged in groups corresponding the related parts of the paper.

I. 1. THE RIGHT TO LIFE

1. Ακτύπης Σπυρίδων-Ηρακλής "Ευρωπαϊκή Σύμβαση Δικαιωμάτων του Ανθρώπου (ερμηνεία κατ' άρθρο), Διεύθυνση έκδοσης Λίνος-Αλέξανδρος Σισιλιάνος, Νομική Βιβλιοθήκη 2017 σελ. 68-118
2. Γαλανού Μαρία σε "Ι.Σαρμάς/Ξ.Κοντιάδης/Χ.Ανθόπουλος, ΕΣΔΑ Κατ' άρθρο ερμηνεία," εκδ. Σάκκουλας 2021, σελ. 74-124
3. Δαγτόγλου Πρόδρομος "Συνταγματικό Δίκαιο – Ατομικά Δικαιώματα" 4η έκδοση 2012 Σάκκουλας, σελ. 196-202
4. Μηλαπίδου Μ. Μαρία «Νομικά ζητήματα στην αρχή της ζωής (Υπό το πρίσμα της νομολογίας του ΕΔΔΑ», εκδ. Νομική Βιβλιοθήκη 2021, σελ. 7-8
5. Παναγοπούλου - Κουτνατζή Φερενίκη Σκέψεις αναφορικά με το δικαίωμα διακοπής της ανθρώπινης ζωής», Εφημερίδα Διοικητικού Δικαίου 1/2010 σελ. 122-127
6. Σατλάνης Χρήστος "Οι θετικές υποχρεώσεις των κρατικών αρχών για τη διασφάλιση και την προστασία των δικαιωμάτων του ανθρώπου στη νομολογία του ΕΔΔΑ", Νομικό Βήμα 2010, σελ. 1634-1666 (ιδίως 1646 επ.)
7. Στρατηλάτης Κώστας σε Φ.Σπυρόπουλος- Ξ.Κοντιάδης- Χ.Ανθόπουλος- Γ. Γεραπετρίτης "Σύνταγμα Κατ' άρθρο ερμηνεία", εκδ. Σάκκουλας 2017, σελ. 115-124
8. Χαράλαμπος Χρυσανθάκης "Μεταξύ ζωής και θανάτου- Το δικαίωμα στη ζωή υπό το φως της Νομολογίας του Ευρωπαϊκού Δικαστηρίου των Δικαιωμάτων του Ανθρώπου", εκδ. Σάκκουλας 2007
9. Lawrence Early, Anna Austin, Claire Ovey and Olga Chernishova (eds) "The Right to Life under Article 2 of the European Convention on Human Rights: Twenty Years of Legal Developments since McCann v United Kingdom, In honour of Michael O'Boyle", Wolf Legal Publishers, 2016
10. Ariav Roee "National Investigations of Human Rights Between National and International Law", Goettingen Journal of International Law 4 (2012) 3, 853-871
11. Ford Mary "Evans v. United Kingdom: What Implications for the Jurisprudence of Pregnancy? -A Critique", Int-Am&EurHRJ 2009.66-80, EHRL 2008.170- 184
12. Stephen Post "The echo of Nuremberg:Nazi data and ethics", Journal of Medical Ethics, τόμος 17, αρ. 1, σελ. 42-44

I. 2. THE PRINCIPLE OF HUMAN DIGNITY or VALUE (WORTH)

13. Haberle Peter "Έννοια και περιεχόμενο της ανθρώπινης αξιοπρέπειας κατά το γερμανικό και το ελληνικό σύνταγμα", ΤοΣ 1982 σελ. 201-232
14. Αντωνίου Θεοδώρα "Ο σεβασμός της αξίας του ανθρώπου ως αρχή και δικαίωμα στο Σύνταγμα του 1975", εκδ. Σάκκουλα 2010
15. Βιδάλης Τάκης "ΒΙΟΔΙΚΑΙΟ. ΠΡΩΤΟΣ ΤΟΜΟΣ:ΤΟ ΠΡΟΣΩΠΟ", Εκδ. Σάκκουλα 2007, σελ.6-7, του ιδίου "Κανονιστικές συνέπειες της αρχής της αξίας του ανθρώπου, με αφορμή τη νομολογία του Συμβουλίου της Επικρατείας" σε Τόμο Τιμητικό του Συμβουλίου της Επικρατείας, 75 Χρόνια, εκδ. Σάκκουλας, Αθήνα-

Θεσσαλονίκη 2004 σελ. 145-156
16. Δαγτόγλου Πρόδρομος "Συνταγματικό Δίκαιο – Ατομικά Δικαιώματα" 4η έκδοση 2012 Σάκκουλας, σελ. 1116-1121, Δρακουλάκης Μιχάλης "Η ανθρώπινη αξιοπρέπεια ως έννομο αγαθό", https://www.mcaounilaw.gr/ 4-9-2019
17. Κιβρακίδου Άννα "Προσβολές της ανθρώπινης αξιοπρέπειας. Συγκριτική θεώρηση της ελληνικής έννομης τάξης και της ΕΣΔΑ (άρθρο 3)", διδακτορική διατριβή 2018
18. Ντουράκη Θωμαϊς "Διεθνές και Ευρωπαϊκό Δίκαιο Βιοηθικής και Δικαιωμάτων του Ανθρώπου", ΔτΑ 65/2015, σελ. 529- 545
19. Φ.Σπυρόπουλος/Ξ.Κοντιάδης/Χ.Ανθόπουλος/Γ.Γεραπετρίτης "Σύνταγμα Κατ' άρθρο ερμηνεία", εκδ. Σάκκουλας 2017, ερμηνεία του άρθρου 2 του Συντάγματος
20. Παναγοπούλου - Κουτνατζή Φερενίκη "Περί της αξίας της ανθρώπινης αξίας", Εφημερίδα Διοικητικού Δικαίου 5/2010 σελ. 736-744
21. Τζέμος Βασίλης "Η ανθρώπινη αξιοπρέπεια στο δίκαιο της Ευρωπαϊκής Ένωσης http://www.publiclawjournal.com/docs/1/tzemos.pdf
22. Τσεβρένης Βασίλειος "Ανθρώπινη Αξιοπρέπεια", εκδ. Σάκκουλας 2012 (1.7. Η προβληματική των εκάστοτε υποκειμένων της στις διάφορες έννομες τάξεις, σελ. 215-217)
23. Χρυσόγονος Κώστας "Ατομικά και Κοινωνικά Δικαιώματα", Νομική Βιβλιοθήκη 2017, σελ. 147-151
24. Andorno Roberto "Human Dignity, Life Sciences Technologies and the Renewed Imperative to Preserve Human Freedom" The Cambridge Handbook of Information Technology, Life Sciences and Human Rights (M. Ienca, O. Pollicino, L. Liguori, E. Stefanini, R. Andorno, editors), Cambridge University Press, 2022
25. Andorno Roberto "The dual role of human dignity in bioethics", Med Health Care and Philos (2013) 16:967–973
26. Andorno Roberto "Human Dignity and Human Rights", Handbook of Global Bioethics, Dordrecht: Springer, 2014, pp. 45-57
27. Hardy Jacques "De l'utilité sociale du droit à propos de «L'affaire du sang contaminé", Presses Universitaires de France, 6/1995
28. HÄYRY Matti and TAKALA Tuija "Human Dignity, Bioethics, and Human Rights", Developing World Bioethics ISSN 1471-8731 (print); 1471-8847 (online) Volume 5 Number 3 2005
29. Lepard Brian "Rethinking Humanitarian Intervention:A Fresh Legal Approach Based on Fundamental Ethical Principles in International Law and World Religions", Pennsylvania State University Press 2002
30. Mathieu Bertrand "La dignité, principe fondateur du droit", Journal International de Bioéthique 2010/3 p. 77-83
31. Requin Bernard "SIDA et transfusion sanguine ou l' affaire du sang contaminé. Les difficiles qualifications pdnales", Méd Mal Infect. 1998; 28 : 15-23

I.3. BIOLOGICAL AUTONOMY

32. Αντωνίου Θεοδώρα "Ο σεβασμός της αξίας του ανθρώπου ως αρχή και δικαίωμα στο Σύνταγμα του 1975", εκδ. Σάκκουλα 2010, σελ. 106 επ. (ιδίως σελ. 120-131)
33. Βιδάλης Τάκης "ΒΙΟΔΙΚΑΙΟ. ΠΡΩΤΟΣ ΤΟΜΟΣ: ΤΟ ΠΡΟΣΩΠΟ" Εκδ. Σάκκουλα 2007, σελ. 25-32
34. Μάνεσης Αριστόβουλος "Συνταγματικά Δικαιώματα α΄ ατομικές ελευθερίες" εκδ.οικ.Σάκκουλα Θεσ/νίκη 1982, σελ. 10-12, 20, 23, 26 επ., 38 επ., 89 επ.

II. 1. THE RIGHT TO REPRODUCTION

35. Βιδάλης Τάκης "ΒΙΟΔΙΚΑΙΟ. ΠΡΩΤΟΣ ΤΟΜΟΣ:ΤΟ ΠΡΟΣΩΠΟ", Εκδ. Σάκκουλα 2007, σελ. 177-236
36. Κοτζάμπαση Αθηνά «Το δικαίωμα στην αναπαραγωγή», ΔτΑ 30/2006 σελ. 421
37. Μάλλιος Βαγγέλης «Κύηση:Συγκρούσεις δικαιωμάτων μεταξύ προσώπων και εμβρύων", ΔτΑ 73/2017, σελ. 561-578
38. Μάλλιος Βαγγέλης «Το Στρασβούργο αντιμέτωπο με τα διλήμματα βιοηθικής" ΔτΑ 44/2009 σελ. 1161-1191
39. Μάλλιος Βαγγέλης «Το ανθρώπινο γονιδίωμα. Γενετική έρευνα και προστασία των δικαιωμάτων του ανθρώπου», εκδ. Αντ. Σάκκουλας 2004, σελ. 63 επ.
40. Μηλαπίδου Μ. Μαρία «Νομικά ζητήματα στην αρχή της ζωής (Υπό το πρίσμα της νομολογίας του ΕΔΔΑ», εκδ. Νομική Βιβλιοθήκη 2021
41. Παναγοπούλου-Κουτνατζή Φερενίκη σε "Ι.Σαρμάς/ Ξ.Κοντιάδης/ Χ.Ανθόπουλος, ΕΣΔΑ Κατ' άρθρο

ερμηνεία," εκδ. Σάκκουλας 2021, σελ. 450-452
42. Παναγοπούλου-Κουτνατζή Φερενίκη «Ακούσια πατρότητα», ΕφημΔΔ 1/2015, σελ. 107-120, Σαββάκης Χαράλαμπος «Μοριακή γενετική, βιοτεχνολογία και τα διλήμματα για τα δικαιώματα του ανθρώπου» σε Συλλογικό Έργο «Νέες τεχνολογίες και συνταγματικά δικαιώματα», εκδ. Σάκκουλας 2004, σελ. 13-21
43. Φύτρου Παρασκευή «Η αστική ιατρική ευθύνη στο πεδίο της ανθρώπινης αναπαραγωγής», εκδ. Σάκκουλας 2022, σελ. 59-82
44. Dhommeaux Jean «Les organes conventionnels des Nations Unies et le dialogue» p. 195-232, Annuaire International Des Droits De L'Homme, 9/2017
45. Morris Caroline «Evans v United Kingdom : Paradigms of Parenting» in The Authors. Journal Compilation r 2007 The Modern Law Review Limited. (2007) 70(6) 979^1007
46. Vidalis Takis "Regulating Assisted Reproduction in the EU: Time for an new Directive?", JIBL 2006 page 12 n

II. 2. BEGINNING OF LIFE – TERMINATION OF PREGNANCY - CONFLICTS OF RIGHTS DURING PREGNANCY

47. Ακριβοπούλου Χριστίνα «Οι αμβλώσεις μετά τη Whole Woman's Health versus Hellerstendt (2016)» σε ΔτΑ 2020 σελ. 161-171
48. Ακριβοπούλου Χριστίνα «Η υπόθεση ΕΔΔΑ Α, Β και C κατά Ιρλανδίας μεταξύ δικαίου και ηθικής, το δικαίωμα στην άμβλωση και η χαμένη ευκαιρία για μια ευρωπαϊκή Roe versus Wade» σε https://www.constitutionalism.gr/wp- content/mgdata/pdf/2013akrivopoulou_2013_2_4_15_42_58.pdf
49. Βιδάλης Τάκης "ΒΙΟΔΙΚΑΙΟ. ΠΡΩΤΟΣ ΤΟΜΟΣ:ΤΟ ΠΡΟΣΩΠΟ", Εκδ. Σάκκουλα 2007, σελ. 27-31
50. Γαλανού Μαρία σε "Ι.Σαρμάς/ Ξ.Κοντιάδης/ Χ.Ανθόπουλος, ΕΣΔΑ Κατ' άρθρο ερμηνεία," εκδ. Σάκκουλας 2021, σελ. 76-81
51. Καστανίδου-Συμεωνίδου Ελισσάβετ «Η έννοια του "προσώπου" στο άρθρο 2 της ΕΔΔΑ (Παρατηρήσεις στην Απόφαση του ΕΔΔΑ της 8.7.2004, Υπόθεση Vo v. France) σε ΠοινΔικ 2004, σελ. 1141 επ.
52. Μάλλιος Βαγγέλης «Κύηση:Συγκρούσεις δικαιωμάτων μεταξύ προσώπων και εμβρύων» σε ΔτΑ 73/2017, σελ. 561-578, του ιδίου «Το Στρασβούργο αντιμέτωπο με τα διλήμματα βιοηθικής. Κριτική επισκόπηση της νομολογίας του Ευρωπαϊκού Δικαστηρίου Δικαιωμάτων του Ανθρώπου σχετικά με την "έναρξη" και το "τέλος" της ζωής του ανθρώπου» σε ΔτΑ 44/2009, σελ. 1161-1191
53. Μηλαπίδου Μ. Μαρία «Νομικά ζητήματα στην αρχή της ζωής (Υπό το πρίσμα της νομολογίας του ΕΔΔΑ», εκδ. Νομική Βιβλιοθήκη 2021, σελ. 7-8, 161-162, 185-200
54. Παναγοπούλου - Κουτνατζή Φερενίκη «Ηθικοδεοντολογικές περιπέτειες του αγέννητου τέκνου : Η περίπτωση της τεχνητής διακοπής της κύησης» σε: Μαρία Κανελοπούλου - Μπότη/Φερενίκη Παναγοπούλου Κουτνατζή (επιμ.), Ιατρική Ευθύνη και Βιοηθική, Σύγχρονες προσεγγίσεις και προοπτικές του μέλλοντος, Εκδόσεις Πασχαλίδη, Αθήνα 2014, σ. 219-232
55. Παναγοπούλου - Κουτνατζή Φερενίκη «Σκέψεις αναφορικά με το δικαίωμα διακοπής της ανθρώπινης ζωής», Εφημερίδα Διοικητικού Δικαίου 1/2010 σελ. 122-127
56. Σισιλιάνος Λίνος-Αλέξανδρος "Ευρωπαϊκή Σύμβαση Δικαιωμάτων του Ανθρώπου (ερμηνεία κατ' άρθρο, εδώ του 8), Διεύθυνση έκδοσης Λίνος-Αλέξανδρος Σισιλιάνος, Νομική Βιβλιοθήκη 2017 σελ. 384-387
57. Ταμιωλάκη Ναταλία «Το πρόβλημα της άμβλωσης» σε ΔιΔικ 5/2019 σελ. 759-771, Τσεβρένης Βασίλειος "Ανθρώπινη Αξιοπρέπεια", (Η αξιοπρέπεια "μηχανισμός εξισορρόπησης των συγκρούσεων και του προβλήματος ασυμμετρίας μεταξύ δικαιωμάτων και αξιών"), εκδ. Σάκκουλας 2012 σελ. 232-245
58. Beckman Linda «Abortion in the United States: The continuing controversy», Feminism and Psychology 2/2017, p. 101-113
59. Beckwith J. Francis «Defending Life: A Moral and Legal Case Against Abortion Choice», Cambridge University Press 2007
60. Boonin David «Beyond Roe: Why Abortion Should be Legal--Even if the Fetus is a Person», Oxford University Press 2019
61. Cornides Jacob «Human Rights Pitted against Man», The International Journal of Human Rights, 2008 p. 107-134
62. Dhommeaux Jean «Les organes conventionnels des Nations Unies et le dialogue» p. 195-232 (201) Annuaire International Des Droits De L' Homme, 9/2017
63. Fenwick Daniel «Abortion jurisprudence' at Strasbourg: deferential, avoidant and normatively neutral?» Legal Studies, Vol. 34 No. 2, 2014, pp. 214–241
64. Goldman Tanya «Vo v. France and fetal rights:The decision not to decide», Harvard Human Rights Journal

18/2005, p. 279-282
65. Hart Ely John «The Wages of Crying Wolf:A comment on Roe v Wade», Yale Law Journal, 82 (5), p. 920-949
66. Murray Melissa «Race-ing Roe:Reproductive Justice, Ratial Justice and the Battle for Roe v. Wade» https://harvardlawreview.org/2021/04/race-ing-roe/
67. Priaulx Nicholette «Testing the Margin of Appreciation: Therapeutic Abortion, Reproductive 'Rights' and the Intriguing Case of Tysiąc v. Poland», European Journal of Health Law 2008 (15), p. 361- 379
68. Paulsen Michael Stokes «Abortion as an instrument of Eugenics» https://harvardlawreview.org/2021/06/abortion-as-an-instrument-of-eugenics/

III. 3. ASSISTED REPRODUCTION – CONFLICT OF RIGHTS

69. Αντωνίου Θεοδώρα «Ο σεβασμός της αξίας του ανθρώπου ως αρχή και δικαίωμα στο Σύνταγμα του 1975», εκδ. Σάκκουλα 2010, σελ. 110-113
70. Βιδάλης Τάκης «ΒΙΟΔΙΚΑΙΟ. ΠΡΩΤΟΣ ΤΟΜΟΣ:ΤΟ ΠΡΟΣΩΠΟ», Εκδ. Σάκκουλα 2007, σελ. 207-220
71. Μηλαπίδου Μαρία «Σωματική Ακεραιότητα και Υποβοηθούμενη Αναπαραγωγή», εκδ. Σάκκουλας 2011
72. Όμιλος Μελέτης Ιατρικού Δικαίου και Βιοηθικής (Συλλογικό) «Ιατρική Υποβοήθηση στην Ανθρώπινη Αναπαραγωγή», εκδ. Σάκκουλας 2013
73. Όμιλος Μελέτης Ιατρικού Δικαίου και Βιοηθικής «Υποβοηθούμενη Αναπαραγωγή στην Ευρώπη: Κοινωνικά, Ηθικά και Νομικά Ζητήματα», εκδ. Σάκκουλας 2015
74. Παναγοπούλου- Κουτνατζή Φερενίκη σε «Ι.Σαρμάς/ Ξ.Κοντιάδης/ Χ.Ανθόπουλος, ΕΣΔΑ Κατ' άρθρο ερμηνεία», εκδ. Σάκκουλας 2021, σελ. 450-452
75. Παναγοπούλου- Κουτνατζή Φερενίκη «Το συμφέρον του τέκνου στην ιατρικώς υποβοηθούμενη αναπαραγωγή: μια ηθικοσυνταγματική θεώρηση», ΕφημΔΔ 2/2016 σελ. 202-222, Φύτρου Παρασκευή «Η αστική ιατρική ευθύνη στο πεδίο της ανθρώπινης αναπαραγωγής», εκδ. Σάκκουλας 2022, σελ. 170-265
76. Morris Caroline "Evans v United Kingdom:Paradigms of Parenting" in The Authors Journal Compilation r 2007 The Modern Law Review Limited. (2007) 70(6) 979^1007.https://student.cc.uoc.gr/uploadFiles/1110-%CE%91%CE%9509%CE%9A/Morris%20Evans%20vs%20United%20Kingdom%20paradigms%20of%20parenting.pdf
77. Vidalis Takis "Regulating Assisted Reproduction in the EU:Time for an new Directive?", JIBL 2006 page 12 n

II. 4. THE RIGHT TO PRE-IMPLANTATION GENETIC DIAGNOSIS

78. Ακριβοπούλου Μ. Χριστίνα/Δέσποινα Α. Τζιόλα «Το δικαίωμα στην προεμφυτευτική γενετική διάγνωση στη νομολογία του ΕΔΔΑ», ΔτΑ 64/2015, σελ. 394-405
79. Αντωνίου Θεοδώρα "Ο σεβασμός της αξίας του ανθρώπου ως αρχή και δικαίωμα στο Σύνταγμα του 1975", εκδ. Σάκκουλα 2010, σελ. 137-144
80. Βιδάλης Τάκης "ΒΙΟΔΙΚΑΙΟ. ΠΡΩΤΟΣ ΤΟΜΟΣ:ΤΟ ΠΡΟΣΩΠΟ", Εκδ. Σάκκουλα 2007, σελ. 220-226
81. Καυκά Χαρά «Η απαγόρευση δωρεάς εμβρύων στην ευρωπαϊκή έννομη τάξη. Με αφορμή την απόφαση της Ολομέλειας του ΕΔΔΑ Parrillo κατά Ιταλίας», ΔτΑ 69/2016, σελ. 601-617
82. Κωστοπούλου Μαρία-Ανδριανή «ΕΣΔΑ και ίδρυση της συγγένειας», εκδ. Νομική Βιβλιοθήκη 2021, σελ. 241-254
83. Μάλλιος Ευάγγελος «Γενετικές εξετάσεις και δίκαιο», εκδ. Σάκκουλας 2004, σελ. 37-57
84. Μάλλιος Ευάγγελος «Οι προγεννητικές εξετάσεις και ο κίνδυνος ευγονικής. Σχόλιο στην υπόθεση Perruche (Cour de Cassation, ass. Plen, 17/11/2000)», ΤοΣ 3/2001 σελ. 579
85. Μάλλιος Ευάγγελος «Η συνταγματική κατοχύρωση της γενετικής ταυτότητας:αναγκαιότητα ή πλεονασμός;» σε Συλλογικό Έργο «Νέες τεχνολογίες και συνταγματικά δικαιώματα», εκδ. Σάκκουλας 2004, σελ. 107-117
86. Μηλαπίδου Μαρία ΕΔΔΑ:Υπόθεση Costa et Pavan κατά Ιταλίας (απόφαση της 28-8-2012) – Νομοθετική απαγόρευση προεμφυτευτικής γενετικής διάγνωσης» σε Συλλογικό Όμιλος Μελέτης Ιατρικού Δικαίου και Βιοηθικής, Υποβοηθούμενη αναπαραγωγή και εναλλακτικά οικογενειακά σχήματα, εκδ. Σάκκουλας 2014, σελ. 41-58
87. Παράσχου Ελένη «Νομική και ηθική θεώρηση της Προεμφυτευτικής Γενετικής Διάγνωση – Διλήμματα και προβληματισμοί», https://www.iatrikodikaio.com/iatrikos-ypovoithoumeni-anaparagogi/
88. Σαββάκης Χαράλαμπος «Μοριακή γενετική, βιοτεχνολογία και τα διλήμματα για τα δικαιώματα του

ανθρώπου» σε Συλλογικό Έργο «Νέες τεχνολογίες και συνταγματικά δικαιώματα», εκδ. Σάκκουλας 2004, σελ. 13-21
89. Φύτρου Παρασκευή «Η αστική ιατρική ευθύνη στο πεδίο της ανθρώπινης αναπαραγωγής», εκδ. Σάκκουλας 2022, σελ. 273-277, 306-313
90. Andorno Roberto, Eloïse Gennet, Karin Jongsma and Bernice Elger «Integrating Advance Research Directives into the European Legal Framework », European Journal of Health Law 23 (2016) 49-64
91. Gilles Jessica, Lee Simon «Parrillo v Italy: Is There Life in the European Court of Human Rights? », Oxford Journal of Law and Religion 2015, 0, 1–6
92. Liu N C Athena Glasgow University «Wrongful life: some of the problems», Journal of medical ethics, 1987, 13, 69-73
93. Milan Stéphanie «Aspects internationaux de la procréation médicalement assistée et des diagnostics préimplantatoires», Annuaire International Des Droits De L'Homme, 8 (2016) p. 177-203

II. 5. WRONGFUL LIFE

94. Κουδουμά Ιουλία «Grasping the Legal and Bioethical Issues of "Wrongful life"» σε Bioethica 4/2018, σελ. 40-54
95. Μάλλιος Ευάγγελος «Οι προγεννητικές εξετάσεις και ο κίνδυνος ευγονικής. Σχόλιο στην υπόθεση Perruche (Cour de Cassation, ass. Plen, 17/11/2000)» , ΤοΣ 3/2001, σελ. 579 επ.
96. Φουντεδάκη Κατερίνα «Παραδόσεις Αστικής Ιατρικής Ευθύνης», 2018 Νομική Βιβλιοθήκη, σελ. 155-158
97. Φράγκος Κωνσταντίνος «Ιατρική Ευθύνη», 2018 εκδ. Σάκκουλας, σελ. 215-216
98. Χελιδόνης Απόστολος «Το ανεπιθύμητο τέκνο ως ζημία – Η συλλογιστική της "wrongful birth"», ΕφΑΔΠολΔ, 3/2018, σελ. 247-268
99. Paola Frati, Vittorio Fineschi, Mariantonia Di Sanzo, Raffaele La Russa, Matteo Scopetti, Filiberto M. Severi and Emanuela Turillazzi «Preimplantation and prenatal diagnosis, wrongful birth and wrongful life: a global view of bioethical and legal controversies», Human Reproduction Update, Vol.23, No.3 pp. 338–357, 2017
100. Jecker Nancy «The Ascription of Rights in Wrongful Life Suits», Law and Philosophy Vol 6, No 2/1987, p. 149-165, Rinaldi Jennifer-Ann «Wrongful Life and Wrongful Birth: The Devaluation of Life with Disability», Journal of Public Policy, Administration and Law, Volume 1, 11/2009

III. CHOICING THE EMBRYO – SAVIOR SIBLING – DEATH OF THE EMBRYO

101. Βιδάλης Τάκης «ΒΙΟΔΙΚΑΙΟ. ΠΡΩΤΟΣ ΤΟΜΟΣ:ΤΟ ΠΡΟΣΩΠΟ», Εκδ. Σάκκουλα 2007, σελ. 220-263
102. Λιούρδη Άγκυ «Ιατρικό Ποινικό Δίκαιο», εκδ. Νομική Βιβλιοθήκη 2021, σελ. 122-129
103. Κούτκας Νικόλαος «Διαχείριση και ταφή εμβρυικών ιστών και εμβρύων. Ιατρική, νομική & ορθόδοξη θεολογική προσέγγιση», μεταπτυχιακή διπλωματική διατριβή
104. Μάλλιος Βαγγέλης «Η συνταγματική κατοχύρωση της γενετικής ταυτότητας: αναγκαιότητα ή πλεονασμός;» σε Συλλογικό Έργο «Νέες τεχνολογίες και συνταγματικά δικαιώματα», εκδ. Σάκκουλας 2004, σελ. 107-117
105. Μάλλιος Βαγγέλης «Γενετικές εξετάσεις και δίκαιο" 2004 εκδ. Σάκκουλας, σελ. 50-56 (Η επέκταση της προεμφυτευτικής διάγνωσης:η δημιουργία «παιδιών κατά παραγγελία»)
106. Μάλλιος Βαγγέλης «Το ανθρώπινο γονιδίωμα. Γενετική έρευνα και προστασία των ανθρωπίνων δικαιωμάτων», διδακτορική διατριβή 2002, Ταμιωλάκη Ναταλία «Το πρόβλημα της άμβλωσης» σε ΔιΔικ 5/2019 σελ. 759-771
107. Ταρλατζής Βασίλειος «Προεμφυτευτική γενετική διάγνωση: Ιατρικοί και βιοηθικοί προβληματισμοί σε Ιατρικά Υποβοηθούμενη Αναπαραγωγή: Προς μία ενιαία ευρωπαϊκή πολιτική (διεύθυνση σειράς Καϊάφα-Γκμπάντι Μαρία/Κουνουγέρη-Μανωλεδάκη Έφη/Συμεωνίδου-Καστανίδου Ελισάβετ), Δημοσιεύματα Ιατρικού Δικαίου και Βιοηθικής, τόμος 21Ι, Εκδόσεις Σάκκουλα, Αθήνα-Θεσσαλονίκη 2015, σελ. 179 επ.
108. Devolder Katrien «Preimplantation HLA typing: having children to save our loved ones» Journal of Medical Ethics 2005, p. 582-586
109. Morgan Elaine, Girod Jennifer, John Rinehart «Having a child to save a sibling: Reassessing risks and benefits of creating stem cell donors», Pediatr Blood Cancer 2007;48:249–253
110. Ανδρεάδου Α. «Ηθικές & νομικές προεκτάσεις των νευροεπιστημών», σε Νέες Τεχνολογίες στην υγεία, εκδ. Νομική Βιβλιοθήκη 2021, σελ. 333-337
111. Αντωνίου Θεοδώρα "Ο σεβασμός της αξίας του ανθρώπου ως αρχή και δικαίωμα στο Σύνταγμα του 1975",

εκδ. Σάκκουλα 2010, σελ. 145-182

112. Βασιλείου Μαριάννα «Μεταμόσχεση μιτοχονδρίων και ηθική της δημιουργίας παιδιών με τρεις γονείς», σε Νέες Τεχνολογίες στην υγεία, εκδ. Νομική Βιβλιοθήκη 2021, σελ. 189-193,
113. Βιδάλης Τάκης «Βιοηθική και δίκαιο:το πρόβλημα της ρύθμισης», Επιστήμη και Κοινωνία:Επιθεώρηση Πολιτικής και Ηθικής Θεωρίας, 8/2002, σελ. 107–118
114. Δραγώνα-Μονάχου Μυρτώ «Ηθική και Βιοηθική», Επιστήμη και Κοινωνία:Επιθεώρηση Πολιτικής και Ηθικής Θεωρίας, 8/2002, σελ. 1–26
115. Καλοκαιρινού Ελένη «Πειραματισμός πάνω σε ανθρώπινα έμβρυα:μια φιλοσοφική θεώρηση», Επιστήμη και Κοινωνία:Επιθεώρηση Πολιτικής και Ηθικής Θεωρίας, 8/2002, σελ. 27–43
116. Κτιστάκις Γιάννης «Η "ηθική" ως περιορισμός της βιοϊατρικής:η νομολογία του Στρασβούργου και του Λουξεμβούργου», Συλλογικό έργο "Νέες Τεχνολογίες και συνταγματικά δικαιώματα", εκδ. Σάκκουλας 2004, σελ. 133-137
117. Μανιάτης Αντώνιος «Παγκόσμια βιοηθική και επιτροπές ηθικής», Digesta 2020, Μελέτες
118. Μαρή Ιωάννα «Συνάφεια των άρθρων 21 και 24 του Συντάγματος. Η μητρότητα στην υπηρεσία της βιωσιμότητας» σε Τόμος Τιμητικός του Συμβουλίου της Επικρατείας 2004, εκδ. Σάκκουλας, σελ. 301-316
119. Μηλαπίδου Μαρία «Η τεχνική CRISPR/Cas9 και τα νέα βιοηθικά διλήμματα που αυτή γεννά», σε Νέες Τεχνολογίες στην υγεία, εκδ. Νομική Βιβλιοθήκη 2021, σελ. 247- 254
120. Νάσκου-Περράκη Παρούλα «Το δικαίωμα στην υγεία», εκδ. Σάκκουλας 2022, ιδίως σελ. 175-209
121. Ρουπακιάς Δημήτρης, Χρήστος Τσιρώνης και Τάκης Βιδάλης «Συνθετική Ζωή, Βιοηθική και Δίκαιο», εκδ. Σάκκουλας 2011, σειρά Δημοσιεύματα Ιατρικού Δικαίου και Βιοηθικής
122. Σαρμάς Ιωάννης «Εμείς ο Λαός», εκδ. Σάκκουλας 2016, σελ. 219- 223
123. Ταμιωλάκη Ναταλία «Το πρόβλημα της άμβλωσης» σε ΔιΔικ 5/2019 σελ. 759-771, Φανάρας Βασίλειος «Νέες τεχνολογίες τροποποίησης του γονιδιώματος: Βιοηθικά Ζητήματα» 21-2-2020,
124. Επιστημονική Εκδήλωση-συνοπτική παρουσίαση, Χαριτίδης Κωνσταντίνος, Τάκης Βιδάλης «Νανοεπιστήμες και νανοτεχνολογίες. Το αίτημα της ρύθμισης», εκδ. Σάκκουλα 2010 (σειρά Δίκαιο και Κοινωνία στον 21ο αιώνα), ιδίως σελ. 66-71
125. Φραγκουδάκη Ελλάς «Η Νομοθετική Πρόκληση της Τροποποίησης του Γονιδιώματος μέσω CRISPR – CAS9», https://www.iatrikodikaio.com/crisprcas9/
126. Χιονίδης Γεώργιος «Σεξουαλικά, αναπαραγωγικά και δικαιώματα γονικής μέριμνας των ατόμων με αναπηρία και η Σύμβαση του ΟΗΕ για τα Δικαιώματα των Ατόμων με Αναπηρία», Ελληνική Επιθεώρηση Ευρωπαϊκού Δικαίου 2/2019, σελ. 155-163
127. Andorno Roberto «Human Dignity, Life Sciences Technologies and the Renewed Imperative to Preserve Human Freedom», The Cambridge Handbook of Information Technology, Life Sciences and Human Rights (M. Ienca, O. Pollicino, L. Liguori, E. Stefanini, R. Andorno, editors), Cambridge University Press, 2022
128. Brokowski Carolyn, Mazhar Adli «CRISPR ethics: Moral considerations for applications of a powerful tool», Journal of Molecular Biology, 2018
129. Buchanan Allen, Dan Brock, Norman Daniels, Daniel Wikler «From Chance to Choice-Genetics and Justice», Cambridge University Press, 9th printing 2009, p. 27-60 (Eugenics and its Shadow)
130. Cyranovski David «Embryo Editing devides Scientists», Nature 19-3-2015
131. Greene Joshua and Jonathan Cohen «For the law, neuroscience changes nothing and everything», The Royal Society Publishing 2004, pp. 1775-1785
132. Lepard Brian «Rethinking Humanitarian Intervention», The Pennsylvania State University, 2002
133. Lombardo Paul «Three Generations, No Imbeciles: Eugenics, the Supreme Court, and Buck v. Bell», The John Hopkins University Press 2010, esp.p.1-27, 255-300
134. Post Stephen «The echo of Nuremberg: Nazi data and ethics», Journal of medical ethics, 1991, 17,42-4
135. Savulescu Julian, Jonathan Pugh, Thomas Douglas, Christopher Gyngell «PERSPECTIVE The moral imperative to continue gene editing research on human embryos», Protein Cell 2015, 6(7):476–479.