Republic of San Marino

San Marino Bioethics Committee

Law no. 34 of 29 January 2010

MOTHERHOOD AND PARENTHOOD. BIOETHICAL INSTRUMENTS TO CONTRIBUTE TO REFLECTION

APPROVED ON 10 NOVEMBER 2021

Interpretation and Translation Service of the Department of Foreign Affairs

TABLE OF CONTENTS

INTRODUCTION

San Marino Bioethics Committee (CSB) was entrusted by the Permanent Parliamentary Commission for Hygiene and Health, Pensions and Social Security, Social Policies, Sports; Territory, Environment and Agriculture with the task of examining in detail the various issues relating to motherhood.

The considerable complexity and wide-ranging scope of the subject to be dealt with does not allow the countless topics to be condensed in a single exhaustive document. Therefore, the CSB decided to identify for each "macro area" the aspects, which are more critical from a bioethical point of view, together with those that are less reflected on in the international debate.

This decision did not exclude the various references to existing legislation and related obligations, despite the awareness that these are necessarily the result of specific ethical positions presupposed and validated at the time of drafting the legislative text.

The ultimate aim of this document is therefore to offer a valuable contribution to the ongoing reflection on the topics under consideration, which are presented as comprehensively as possible, along with the related issues, as well as and to promote public debate in a variety of areas.

With regard to fundamental bioethical issues concerning life, death and the primary relationships of each human being, such as maternal-foetal, maternal-neonatal and parental relationships, the CSB intended to fulfil its mandate by identifying a balance among its different positions.

In particular, the CSB wanted to avoid the risk of biased judgements, in order to understand and make understood the philosophical and bioethical argumentations underlying the different positions, and to exposing them to free debate.

The common thread of this work is the enhancement of motherhood and parenthood in all areas from the point of view of bioethics. The principles of bioethics are aimed at the protection of the unique and unrepeatable global event of the birth of a new human being and the complex relationships with other human beings who interact therewith, starting from the first, irreplaceable and fundamental maternal-foetal relationship.

The *primum movens* of this document is undoubtedly the biological element that identifies the subject of the work in the new vital process belonging to the human species in a substantial sense, to which philosophy attributes different ontological meanings and of which bioethics identifies the principles that protect and recognise human dignity.

The bioethical reflection carried out by the CSB follows the scientific evolution of diagnostic and therapeutic techniques, including prenatal tests for diagnostic and therapeutic purposes and medically assisted procreation, in order to identify particularly complex aspects from a bioethical point of view and the consequent decision-making repercussions concerning the latter.

In this document, surrogate motherhood is a key issue, which the CSB has thoroughly examined because of the scientific, psychological, bio-legal and social implications of this practice for all stakeholders, including the surrogate mother, intended parents, genetic parents and the child, who is the real “subject” of the contract.

This practice, which originates in a culture that is increasingly oriented towards finding solutions that maximise human potential in economic and health terms, is *de facto* part of a huge world market for the exploitation and sale of human beings, in open violation of the fundamental rights enshrined in all international charters. Indeed, it reifies what is considered an inalienable good, namely the health and life of both children and women.

The CSB has unanimously condemned surrogate motherhood, considering it a new disguised form of slavery, and hopes that national and international legal systems will take all legal action to discourage this modern form of slavery, regardless of whether it takes place within their territory or outside it (with its subsequent surreptitious introduction).

Lastly, the CSB addressed the issue of voluntary termination of pregnancy. In this regard, it highlighted some aspects to which public opinion and the bioethical debate pay less attention than others, which have a greater media impact, while respecting all opinions expressed in society and in the Committee. With a purely bioethical approach, the CSB identified the fundamental principles underpinning the various perspectives, which are sometimes conflicting and sometimes reconcilable.

Due to the wide-ranging scope of the content, conclusions and recommendations are not contained in a concluding chapter but are expressed within each chapter.

Everyone in society is called upon to protect and enhance motherhood and parenthood. The CSB has made its contribution through bioethical reflection. Citizenship can be a powerful driving force through public debate, and political decision-makers have the task of translating all this into concrete legislative action that reflects and respects all opinions, in a difficult but necessary balance concerning issues that so deeply involve everyone's conscience.

This document is enriched by appendices that allow the reader to study in depth the scientific aspects of prenatal tests and medically assisted procreation, and by a glossary containing the definitions of the terms used in the text. Moreover, it contains an interesting philosophical and bioethical analysis of the concept of "person" and, as is customary for this Committee, also a reference to the legislation of the Republic of San Marino and a comparison among the positions of the three monotheistic religions on motherhood and parenthood.

For their contribution to the appendix on religions, the CSB would like to thank Dariusch Atighetchi, Professor of Islamic Bioethics at the Faculty of Theology in Lugano, and Luciano Meir Caro, Chief Rabbi of the Jewish Community of Ferrara. The CSB would like to thank also expert Roberto Ercolani for the psychological aspects of the whole document.

The document was approved during the plenary meeting of 10 November 2021 by all members present: Borgia, Cantelli Forti, Carinci, Garofalo, Griffo, Guttmann, Hrelia, Iwanejko, Raschi, Selva, Strollo, Tagliabracci. Santori did not participate in the meeting but gave his approval.

Luisa M. Borgia
CSB President

MOTHERHOOD AND PARENTHOOD

Motherhood and parenthood are the culmination of adults' psychosexual development in which the capacity to create, protect, nurture, love, respect and take pleasure vis-à-vis another human being is generated. Motherhood and parenthood are influenced by a multiplicity of biological, cultural, psycho-affective, psycho-social, legal and anthropological elements that interact with each other in an extremely complex way and have a considerable effect on the psychological development of the child, the mother and the parents.

Motherhood and parenthood are based on the projection of a foreseeably innate relationship that binds all roles involved together.

The idea of having a child and the thought of parenthood slowly grow into awareness at the time of childbirth.

With their predisposition to establish a relationship with their caregivers, children safeguard their own physical and psychological survival.

For this reason, they unconsciously rely immediately on the voice - better live than recorded [1,2 3,4 ,5] - of parents – but mainly of the mother[6,7]- by continuing the "prenatal bond"[8] and then showing a marked preference for the human face[9]. However, only after about a year, children will begin to identify the human face as not belonging to them.

Indeed, newborn babies tend to merge with the external environment, since they do not know how to differentiate themselves from their surroundings. Therefore, they experience undefined tensions, as they are unable to understand where stimuli come from or what their meaning is.

Through containment and mirroring, parents will indeed give a meaning to the experiences of children and will therefore allow their development[10,11].

In this regard, a depressive syndrome appearing in the mother in the last trimester can therefore be detrimental, since it can interfere from birth with the ability to benefit from mirroring due to an initial

---

1 Krueger CA et al. *Fetal response to live and recorded maternal speech*. Biol Res Nurs. 2015 Jan;17(1):112-20.

2 Voegtline KM et al. *Near-term fetal response to maternal spoken voice*. Infant Behav Dev. 2013 Dec;36(4):526-33.

3 Kisilevsky BS, Hains SMJ. *Onset and maturation of fetal heart rate response to the mother's voice over late gestation*. Dev Sci. 2011 Mar;14(2):214-23.

4 Rand K, Lahav A. *Maternal sounds elicit lower heart rate in preterm newborns in the first month of life*. Early Hum Dev. 2014 Oct;90(10):679- 83.

5 Lee GY, Kisilevsky BS. *Fetuses respond to father's voice but prefer mother's voice after birth.* Dev Psychobiol. 2014 Jan;56(1):1-11.

6 Damstra-Wijmenga SM. *The memory of the new-born baby.* Midwives Chron. 1991 Mar;104(1238):66-9.

7 Kisilevsky BS*. Effects of experience on fetal voice recognition*. Psychol Sci. 2003 May;14(3):220-4

8 See paragraph: **"Maternal-foetal relationship".**

9 De Pascalis L et al. *Maternal gaze to the infant face: Effects of infant age and facial configuration during mother-infant engagement in the first nine weeks.* Infant Behav Dev. 2017 Feb;46:91-99.

10 Bion W.R. (1962 year of publication in English), *Learning from Experience*, Tr. It. Armando Editore, Rome 1972; Fonagy P., Target M. (eds.), *Attachment and reflective function*, Raffaello Cortina, Milan 2001; Winnicott D.W. (1965), *The Family and Individual Development*, Tr. It. Armando Editore, Rome 1970.

11 Krol KM et al*. Breastfeeding experience differentially impacts recognition of happiness and anger in mothers.* Sci Rep. 2014 Nov 12;4:7006. doi: 10.1038/srep07006.

difficulty in recognising the mother's face and voice[12].

Pregnancy and childbirth are part of a single biological process common to all animals (reproduction and survival of the species). However, in human beings, they have a multiplicity of meanings (psychological, symbolic, ethical, social, medical) that make them unique among all other species.

Childbirth, motherhood and parenthood are an "extension phase of the life cycle of the family" (WHO)[13], a natural event that, in the human species, becomes unique in its cultural and anthropological dimension.

For this reason, addressing this issue from a bioethical point of view means first of all looking at the importance of pregnancy, childbirth and parenthood insofar as they relate to the unique and unrepeatable global event of the birth of a new human being and the complex relationships with the other human beings who interact therewith[14,15,16].

HUMAN EMBRYO FROM BIOLOGICAL RELEVANCE TO ONTOLOGICAL MEANING

Biology and genetics contribute to identifying the "subject" of this document. Indeed, they reveal each stage of a new life process, starting from fertilisation[17], when, with the penetration of the spermatozoon into the cytoplasm of the egg cell, the two gametes form a new biological entity, namely the zygote, which contains a new individualised project-programme, and therefore a new life.

The newly generated system, called zygote or one-cell embryo, begins to operate as a new unit with a well-defined genetic heritage, which contains qualitatively different information compared to that of the somatic cells of the maternal and paternal organism.

This genome identifies the one-cell embryo as biologically human and specifies its individuality through the characters of programmed determination, finalism, self-production and self-direction[18].

Therefore, a process of quantitative and qualitative development begins, with a precise temporal sequence and a progressive creation of precise spaces through a programme characterised by coordination (molecular and cellular activities guided by the genetic information contained in the genome and under the control of signals coming from interactions between the embryo and its

---

12 Figueiredo B. *Mother's anxiety and depression during the third pregnancy trimester and neonate's mother versus stranger's face/voice visual preference.* Early Hum Dev. 2010 Aug;86(8):479-85.

13 WHO Recommendations and Guidelines on motherhood and parenthood include, among others: https://www.who.int/health- topics/maternal-health#tab=tab_1; https://www.who.int/publications/i/item/WHO-MCA-17.10; *WHO Recommendations: intrapartum care for a positive childbirth experience.* Geneva: World Health Organization; 2018. Licence: CC BY-NC-SA 3.0 IGO; *Global Strategy for Women's, Children's and Adolescents' Health (2016–2030)*. New York: Every Woman Every Child; 2015.

14 Alushaj A, Tamburlini G. *Effects of maternal and childcare time on child development: A review of the evidence*. *Medico e Bambino* 2018;37:361-370

15 Barlow J et al. *Group-based parent-training programs for improving emotional and behavioral adjustment in children from birth to three years old.* Cochrane Database of Systematic Reviews 2010

16 Mihelic M et al. *Effects of early parenting interventions on parents and infants: a meta-analytic review*. Journal of Child and Family Studies, 2017;26(6),1507-1526

17 Gilbert S. F. Developmental Biology. 2000: *"Fertilization is the process whereby two sex cells fuse together to create a new individual with genetic potentials derived from both parents".*

18 Piotrowska K et al., *Role for sperm in spatial patterning on the early mouse embryo*. Nature 2001; 409, 517-521. Gardner RL. *Specification of embryonic axes begins before cleavage in normal mouse development*. Development 2001; 128, 839-847. Pearson H., *Your destiny from day one*. Nature 4 July 2002; VOL 418.

environment), continuity (the individual is always the same but gradually acquires its final form) and progression (the organism progressively develops from simpler to more and more complex forms)[19].

Therefore, biology identifies the new organism as a being belonging to the human species, with a substantial continuity between the first moment of conception and that of birth.

On the contrary, the philosophical approach attributes different ontological meanings to the new organism, with the aim of clarifying whether it can be considered a person[20].

Because of the wide-ranging scope of this subject, which would require an *ad hoc* document, the CSB considered it essential to avoid systematically addressing the ontological meaning of the embryo, while illustrating the various philosophical approaches leading to the bioethical choices regarding the embryo.

The strength of the moral obligation to respect and protect the embryo essentially depends on whether or not the embryo is recognised as a person to whom protection and recognition of human dignity are due in terms of absolute moral value. Indeed, considering the human embryo as a person from fertilisation implies its unconditional and absolute protection (an absolute duty), at every stage of its development. On the contrary, delaying recognition of such status to later stages would admit the possibility of refusing the right to protection in cases where different values are in conflict (in which case protection would represent a duty that is not absolute, but a *prima facie* duty, i.e. a duty that can be derogated from if it comes into conflict with other duties considered morally more binding and deriving from the embryo's relationship with other persons).

In any case, both approaches recognise that human embryo is not merely biological material, an entity of any nature, but an organism belonging to the human species in a substantial sense, and as such recognisable in every human being at all stages of existence. Therefore, whatever the view of the human embryo's status may be, the most morally correct approach is responsibility, from which respect and protection derive (as an absolute or a *prima facie* duty).

MATERNAL-FOETAL RELATIONSHIP

Recent literature has shown that the maternal-foetal bond is established right from the preimplantation phase, with documented leading role of the embryo and cooperation between the child and the mother, which gives rise to a relational aspect[21].

[19] Bose et al., *Purified human early pregnancy factor from preimplantation embryo possesses immunosuppressive properties.* Am. J. Obstet. Gynecol, Apr 1989;160(4):954-60.

[20] See **Annex 1** for the concept of "person".

[21] On maternal-foetal interactions and the consequences for maternal and offspring's health, worth highlighting is the research started in 2015 and still ongoing at the Universitätsklinikum Hamburg-Eppendorf. Zentrum für Diagnostik Institut für Immunologie, led by Prof. Eva Tolosa: *Feto- maternal immune cross talk: Consequences for maternal and offspring's health (KFO 296),* aimed at studying the mechanisms of immunological tolerance towards the foetus developed by the maternal immune system during pregnancy, in order to develop pregnancy-like immune responses for the treatment of patients suffering from Multiple Sclerosis. See also: Fazeli A et al.; vol 7-2 III- II8 2008: *Briefings in functional genomics and proteomics- "Maternal communications with gametes and embryos: a complex interactome;* Duc-Gorain P, Mignot T.M, Bourgeois C, Ferre F. *Embryo-maternal interactions at the implantation site: a delicate equilibrium.* Eur J Obstet Gynec Reprod Biol;83(1):85-100, 1999; Relier JP. *Influence of maternal stress on fetal behavior*

Three types of biochemical hormonal-immunological relations of the maternal-foetal relationship in the preimplantation phase can be briefly identified[22]:

- the "preparation" of the epithelium of the tubal tract for contact with the oocyte and spermatozoa;

- the “supply” of the energy source (glycides, proteins and lipids from the oviduct secretions), which allows the embryo to survive during the 6-8 days from fertilisation to implantation, in the absence of connection with the mother's blood and oxygen;

- the immunological exception that makes it possible not to reject a child whose genetic heritage is 50% different from that of the mother.

It follows that this phase may have repercussions in terms of successful/unsuccessful implantation.

Furthermore, it has been demonstrated that this relationship (so-called *cross-talk*[23]) must be optimal in order to avoid inauspicious prenatal results, such as spontaneous abortion or low birth weight babies (< 2400 g), with major consequences in childhood, adolescence and adult life[24].

The maternal-foetal symbiosis continues in the development of the foetus' senses and neurobehaviour, as the mother sends nutrients and oxygen to the foetus, while receiving from it the stem cells capable of reaching and repairing any sick parts of her body[25].

In the following months, a complex symbiotic system of collaboration between the mother and the foetus develops in the uterus. Through the so-called fetoplacental unit, this system leads to the complete maturity of a “nutritional brain” represented by the placenta[26].

Studies of foetal psychism show that the maternal-foetal experiential process results in the mother's production of molecules designed to protect the integrity of the foetal brain during labour[27].

Finally, scientific literature shows that communication between mother and foetus/child begins from

---

and brain development. Biol Neonate;79(3- 4):168-71,2001; Shanks N, Lightman SL. *The maternal-neonatal neuro-immune interface: are there long-term implications for inflammatory or stress-related disease?* J Clin Invest;108(11):1567-73, 2001; Shanks N, Lightman SL. *The maternal-neonatal neuro-immune interface: are there long-term implications for inflammatory or stress-related disease?* J Clin Invest;108(11):1567-73, 2001; Douglas J et al. *“Mother- offspring dialogue in early pregnancy: impact of adverse environment on pregnancy maintenance and neurobiology.”* Prog Neuropsychopharmacol Biol Psychiatry. 2011 Jul 1;35(5):1167-77; Pearson H. - *“Your destiny, from day one”* - Nature2002 Jul 4;418(6893): 14-5; Horne AW, White JO, Lalani EN. - *“The endometrium and embryo implantation. A receptive endometrium depends on more than hormonal influences”*- BMJ. 2000 Nov 25;321(7272):1301-2; Bianchi DW1 - *“Fetal cells in the mother: from genetic diagnosis to diseases associated with fetal cell microchimerism”*- Eur J Obstet Gynecol Reprod Biol. 2000 Sep;92(1):103-8; Gardner RL. *“Specification of embryonic axes begins before cleavage in normal mouse development”.* Development. 2001 Mar;128(6):839-47.

22 Serra A. *L’uomo-embrione. Il grande misconosciuto.* Cantagalli, Siena 2003.

23 For the definition of *cross-talk*, see **Annex 5: “Glossary”**. Lash G. *Molecular Cross-Talk at the Feto-Maternal Interface.* Cold Spring Harbor Perspectives in Medicine 5(12). September 2015. DOI: 10.1101/cshperspect.a023010.

24 Bose et al. *Purified human early pregnancy factor from preimplantation embryo possesses immunosuppresive properties*. Am. J. Obstet. Gynecol, Apr 1989;160(4):954-60.)

25 Khan M et al. *Embryonic Stem Cell–Derived Exosomes Promote Endogenous Repair Mechanisms and Enhance Cardiac Function Following Myocardial Infarction*. Circ Res. 2015;117:52-64.; Roman T et al. *Maternal oxytocin triggers a transient inhibitory switch in GABA signaling in the fetal brain during delivery*. Science 2006 Dec 15;314(5806):1788-92.

26 Both the brain and the placenta share the same neuroendocrine, neuroimmune, neuropeptide, neurosteroid and neurotransmitter factors. Carbillon L et al. *Fetal placental and decidual-placental units: role in endocrine and paracrine regulations in parturition*. Fetal Diagn. Ther 2000; 15:308-318.)

27 Roman T et al. *Maternal oxytocin triggers a transient inhibitory switch in GABA signaling in the fetal brain during delivery*. Science 15 December 2006; vol.314.

the very moment the woman realises she is pregnant. As a result, the experience of pregnancy (even unconscious) can influence psychosomatic modulation, the immune system, ormone levels and the hypothalamic-pituitary-adrenal axis.

Scientific evidence shows that the onset of a baby's movements leads to the establishment of a dialogue between mother and child, which also influences sensory and humoral exchanges[28,29]. While occurring unconsciously, this dialogue will influence the learning and mental structure of the foetus[30].

Therefore, the bond of "prenatal attachment" consists of a high degree of empathic contact, which is nourished by emotional and sensory exchanges (then confirmed at the moment of birth when the imaginary child becomes real), and which also characterises the special bond developed by both parents during pregnancy.

Studies in this area show that the quality of prenatal affective investment also influences pregnancy and birth, the subsequent parent-child attachment relationship and infant's psychic development[31].

Any intrauterine experience (both positive and negative) remains and lives on in all individuals after birth, even if unconsciously. Indeed, the foetus is not passive but begins to develop its own psychic life and responds to stimuli. Therefore, children at birth cannot at all be considered a *tabula rasa*, as they already have their own personality and the ability to perceive and learn[32,33,34,35,36].

After birth, the maternal-neonatal bond is established through the so-called *bonding*[37], a special relationship based on physical contact (not comparable to the so-called "attachment"), which will

---

28 Malm M-C et al. *Prenatal attachment and its association with foetal movement during pregnancy - A population based survey*. Women Birth. 2016 Dec;29(6):482-486.

29 Güney E, Uçar T. *Effect of the fetal movement count on maternal-fetal attachment*. Jpn J Nurs Sci. 2019 Jan;16(1):71-79.

30 Partanen E, Kujalaa T, Näätänen R, Liitolaa A, Sambethf A, Huotilainen M. *Learning-induced neural plasticity of speech processing before birth*, in *PNAS*, 2013, 110 (37), 15145-15150; Tomatis A. *Dalla comunicazione intrauterina al linguaggio umano. La liberazione di Edipo.* Pavia, Ibis 1993.

31 Starting from Winnicott's (Winnicott, D.W. (1958). *Through Paediatrics to Psychoanalysis.* Tr. It. Martinelli, Florence 1975) and Bowlby's thought (Bowlby, J. 1969, *Attachment and Loss, vol.1: Attachment to Mother.* Tr. it. Boringhieri, Turin, 1972), the "attachment theory" described the child's innate tendency to seek the closeness, attention and care of persons being an affective point of reference. Studies of early parent-child relationships show that infants have unexpected perceptive, motor and behavioural capacities vis-à-vis caregivers with whom they interact (Sameroff A.J, McDonough S.C, Rosenblum K.L. *Treating Parent-Infant Relationship Problems: Strategies for Intervention*; Guilford Press, 2005; Stern D.N, Bruschweiler-Stern N. *A mother is born.* Milan, Mondadori 1999). Similarly, studies of foetal development have shown an active and sensitive foetus with the capacity to learn and interact with stimuli from the mother's body and the environment, especially from the second trimester of pregnancy (Manfredi and Imbasciati. *Il feto ci ascolta e… impara.* Rome, Borla, 2004; Della Vedova and Imbasciati. *Le origini della mente*, in Imbasciati and Margiotta (eds.), *Compendio di Psicologia per gli operatori sociosanitari.* Padua, Piccin 2005). In 1981, Mecca Cranley defined for the first time the construct of maternal-foetal attachment as "the extent to which women engage in behaviours that represent an affiliation and interaction with their unborn child": Cranley M. S. (1981). *Development of a tool for the measurement of maternal attachment during pregnancy*. In *Nursing research*, 30, pp. 281-284).

32 Cannella B.L. *Maternal-fetal attachment: an integrative review*. In *Journal of Advanced Nursing*, 2005, 50(1), pp. 60-68.; Righetti P.L, DellAvanzo M, Grigio M, Nicolini U. *Maternal/paternal antenatal attachment and fourth-dimensional ultrasound technique: A preliminary report*. In *British Journal of Psychology*, 2005, 96, pp. 129-137.

33 Aleksandrowicz MK, Aleksandrowicz DR. *The molding of personality: a newborn's innate characteristics in interaction with parents' personalities*. Child Psychiatry Hum Dev. Summer 1975;5(4):231-41.

34 Fu Y, Depue RA. *A novel neurobehavioral framework of the effects of positive early postnatal experience on incentive and consummatory reward sensitivity.* Neurosci Biobehav Rev. 2019 Dec;107:615-640.

35 Wolff PH, Ferber R. *The development of behavior in human infants, premature and newborn.* Annu Rev Neurosci. 1979;2:291-307.

36 Torgersen AM, Janson H. *Why do identical twins differ in personality: shared environment reconsidered.* Twin Res. 2002 Feb;5(1):44-52.

37 For the definition see **Annex 5: "Glossary".** Genna W, *Supporting sucking skills in breastfeeding infants***,** Jones & Bartlett Larning, Burlington, Massachusetts, 2016; Karimi Z et al. *The effect of mother-infant skin to skin contact on success and duration of first breastfeeding: a systematic review and meta-analysis*, Taiwanese Journal of Obstetrics and Ginecology, 2019, 58, 11-19. Tichelman E, Westerneng M, Witteveen AB, van Baar AL, van der Horst HE, de Jonge A et al. (2019) *Correlates of prenatal and postnatal mother-to-infant bonding quality: A systematic review*. PLoS ONE 14(9): e0222998. https://doi.org/10.1371/journal.pone.0222998. Tichelman E, Westerneng M, Witteveen AB, van Baar AL, van der Horst HE, de Jonge A et al. (2019) *Correlates of prenatal and postnatal mother-to-infant bonding quality: A systematic review*. PLoS ONE 14(9): e0222998. https://doi.org/10.1371/journal.pone.0222998. Wan MW, Downey D, Strachan H, Elliott R, Williams SR, Abel KM (2014) *The Neural Basis of Maternal Bonding*. PLoS ONE 9(3): e88436. https://doi.org/10.1371/journal.pone.0088436 E 14(9): e0222998. https://doi.org/10.1371/journal.pone.0222998.

influence how the child interacts with the world.

The mother's hormonal balance during and after childbirth is crucial in the process of bonding. However, bonding is also favoured, immediately after birth, by physical contact with the mother, by her looks and smells[38], and this very first experience will have a positive influence on the future relationship between mother and child[39].

Suffice it to think that WHO recommends breastfeeding within the first half hour of a baby's birth, also with reference to the innate behaviour of the "sucking instinct".

On the contrary, it was reported that mother-child separation[40] leads to negative physiological consequences for the infant: neonatal stress, increased crying, difficulty in dispersing energy and reduced duration of effective breastfeeding.

PROTECTION OF WOMEN IN PREGNANCY - CHILDBIRTH - PUERPERIUM AND POSTPARTUM

Pregnancy is one of the most demanding and unforgettable experiences for women, in terms of physical, psychological, social and relational involvement, and is also a fundamental step in the couple's life plan.

The continuous and progressive biological and physical modification of the woman is accompanied by a similar psychological modification, with a continuous interaction between the somatic and psychological spheres that involves all relational aspects, namely with herself, the father of the child, her family of origin, work and friends.

Above all, pregnancy is the only experience in which a human being has another one inside her, with whom she establishes an extraordinary intimate and caring relationship.

Therefore, a purely medical approach to pregnant women would be extremely reductive. What is needed is instead a holistic approach, which encompasses all aspects mentioned above and allows the mother to develop the "mental space" for her child.

The first interlocutor is the gynaecologist, to whom the woman entrusts not only her own health and that of her baby, but also her emotions, both positive and negative, which the doctor must be able to

[38] A technique that favours prenatal contact is haptonomy, a discipline founded in 1945 by Dutch physician Frans Veldman (1921-2010), and that studies the affect expressed through tactile contact. Unborn children who can experience loving contact from the womb receive pleasure and self-affirmation, which contribute to building their emotional and affective self-confidence. Prenatal education is the promotion of a good relationship in the triad (mother, father and child) being formed. In order to achieve this objective, it is necessary to provide the couple with adequate information about their emotional skills and their child's ability to relate to them and to live his or her own physical and psychological existence, and to allow the parents to find, in a free and unconstrained manner, the most appropriate channel to express their love to their child.

[39] Lawrence A, Lawrence R.M. *Breastfeeding A guide for the medical profession* (7th ed.), Elsevier Mosby, Piladelphia, 2010; Srivastava S, Gupta A, Bhatnagar A, Dutta S. *Effect of very early skin to skin contact on success at breastfeeding and preventing early hypothermia in neonates*, Indian J Public Health, 2014, 58, 22-26. Winston R, & Chicot R. (2016). *The importance of early bonding on the long-term mental health and resilience of children.* London journal of primary care, 8(1), 12–14. https://doi.org/10.1080/17571472.2015.1133012.

[40] Howard K, Martin A, Berlin LJ, & Brooks-Gunn J. (2011). *Early mother-child separation, parenting, and child well-being in Early Head Start families.* Attachment & human development, 13(1), 5–26. *https://doi.org/10.1080/14616734.2010.488119.* Howard K, Martin A, Berlin L. J, & Brooks-Gunn J. (2011). *Early mother-child separation, parenting, and child well-being in Early Head Start families.* Attachment & human development, 13(1), 5–26. *https://doi.org/10.1080/14616734.2010.488119.* Ahn SY et al. (2008). *The effect of rooming-in care on the emotional stability of newborn infants.* Korean Journal of Pediatrics, 51(12), 1315–1319.

accept and “channel”.

For this reason, it is necessary that all health personnel caring for women in pregnancy and childbirth have received specific training to listen and support women, first and foremost, and couples.

Pregnant women’s anxiety is revealed by the most immediate question about the child’s health.

The increasing number of intrauterine diagnostic and therapeutic techniques may lead women to ask for them in order to monitor the development of the foetus, or these may be proposed directly by the specialist.

From this point of view, pregnancy (especially the first few months), with the intensification of diagnostic tests, is marked by a culture increasingly linked to a medical-predictive approach. Therefore, the couple (and above all the mother) lives this experience in a predominantly medical light, amidst anxiety and concern.

In this context, it is essential that the doctor and the medical staff they trust provide the woman and the couple with useful and comprehensive information to clarify the appropriateness of the various investigations on the basis of scientific protocols, by clearly illustrating the relationship between expected benefits and risk factors involved in the diagnostic or therapeutic procedures and the real predictive capacities.

If they choose an invasive procedure or genetic tests, which are particularly complex because of their ethical and psychological implications, the woman and the couple should be directed to specialist centres able to provide appropriate counselling before and after the procedure[41].

During the delicate and complex experience of pregnancy, and particularly during puerperium, which is the most delicate time, when there is an increasing risk of developing the so-called “postpartum depression”[42], women must be able to count on the constant presence and support of their trusted health professionals and of their loved ones, who are fundamental to them.

Good care and “holistic” support in pregnancy, based on trust, can limit risk or promptly prevent the worsening of depression.

To this end, midwives are fundamental, as a point of reference to prepare for birth and for the way in which the mother will have to take care of the newborn baby.

The moment immediately following childbirth is also important, when the parents (and in particular the mother) are informed of the baby's (sometimes not optimal) condition.

Adequate training of medical staff is essential to facilitate acceptance of the child and to prevent emotional shocks and feelings of guilt, which can trigger strong tensions within the couple.

[41] See Chapter 2: **“Prenatal tests for diagnostic and therapeutic purposes”.**
[42] For the definition see **Annex 5: “Glossary”.**

The return home with the newborn baby is the most delicate and critical moment for women, who will have to manage the care of the baby at a fast pace, which does not allow an adequate period of rest and tranquillity.

In this phase, the affectionate yet discreet support of the father and any family members, or the external support of social assistants, is crucial.

This is confirmed by recent literature, which has shown that the pandemic-related isolation and the consequent physical restrictions between the woman and her child and in terms of family and social relationships have exacerbated anxiety, especially during pregnancy[43], and worsened stress-induced reactions[44], depression, irritability and insomnia, up to an increased risk of suicide[45].

In the initial period of the pandemic, the separation between the infected mother and her newborn child at the time of birth was particularly negative. Many hospitals recommended that the child should be exposed to the minimum risk of infection by being cared for by other professionals[46] or through separation screens in the room, distancing the cot from the mother's bed, making the mother wear a mask at all times and recommending hand washing before breastfeeding[47].

Indeed, these measures adopted during the pandemic have contradicted all scientific evidence on the need for early contact with the mother's breast[48] and on the importance of the immediate relationship between mother and child, consisting of olfactory, tactile and visual stimuli[49], which is indispensable for the harmonious and stable development of the infant[50].

At the same time, the experiences of isolation and separation further confirmed the data on the negative effects on women's psychological and physical health and on the mother-newborn relationship.

Finally, some international studies report the worrying trend of a significant increase in foetal and

---

43 Brooks SK et al. *The psychological impact of quarantine and how to reduce it: rapid review of the evidence.* Lancet 2020;395(10227):912-20. Corbett GA, Milne SJ, Hehir MP, Lindow SW, O'connell MP. *Health anxiety and behavioural changes of pregnant women during the COVID- 19 pandemic*. Eur J Obstet Gynecol Reprod Biol 2020;249:96-97.

44 Di Giovanni C et al. *Factors influencing compliance with quarantine in Toronto during the 2003 SARS outbreak.* Biosecur Bioterror 2004; 2(4):265-72.

45 Gunnell D et al. *Suicide risk and prevention during the COVID-19 pandemic.* Lancet Psychiatry 2020;7(6):468-71.

46 Dotters-Katz SK et al. *Considerations for Obstetric Care during the COVID-19 Pandemic.* Am J Perinatol 2020;37:773–779.

47 CDC. *Interim Guidance on Breastfeeding for a Mother Confirmed or Under Investigation For COVID-19.* http://www.e-lactancia.org/media/papers/Interim_Guidance_on_Breastfeeding_for_a_Mother_COVID-19-CDC-2020.pdf. Last accessed 4/3/21.

48 Pérez-Escamilla R et al. (2016). *Impact of the Baby-friendly Hospital Initiative on breastfeeding and child health outcomes: A systematic review.* Maternal & Child Nutrition, 12(3),402–417. Renfrew MJ et al. (2020) *Sustaining quality midwifery care in a pandemic and beyond.* Midwifery, 88, 102759. https://doi.org/10.1016/j.midw.2020.102759.

49 Ong S. 2020. *How face masks affect our communication.* BBC Future, 9 June. https://www.bbc.com/future/article/20200609-how-face- masks-affect-our-communication. As early as 1872, Charles Darwin stated that the ability to read facial expressions represents an evolutionary advantage in terms of capacity to interact, overcome conflicts and misunderstandings, experience and generate emotions and behave appropriately in the society through a code of communication based not only on gestures, body language and voice tones, but also on facial expressions and even sudden blushes…. Ong S. 2020. *How face masks affect our communication.* BBC Future, 9 June. https://www.bbc.com/future/article/20200609-how-face-masks-affect-our-communication. Last accessed 5/3/21. For example, from birth, newborns are able to recognise photographs of their mothers and, when confronted with various choices, they linger longer on their mothers' virtual images than on those of other women (LoBue V. 2016. *Face time: here's how infants learn from facial expressions.* Conversation. https://rb.gy/clftox) and in just a few days they learn to distinguish expressions of happiness, sadness or surprise (Farroni T et al. 2007. *The perception of facial expressions in newborns*. Eur. J. Dev. Psychol. 4 (1), 2–13. Palama A et al. 2018. *Are 6- month-old human infants able to transfer emotional information (happy or angry) from voices to faces? An eye-tracking study.* PLoS One 13 (4), e0194579. https://doi.org/10.1371/journal.pone.0194579

50 Ahn SY et al. (2008*). The effect of rooming-in care on the emotional stability of newborn infants.* Korean Journal of Pediatrics, 51(12), 1315– 1319. Brown A, Shenker N. *Experiences of breastfeeding during COVID-19: Lessons for future practical and emotional support.* Matern Child Nutr. 2021;17:e13088. doi.org/10.1111/mcn.13088.

neonatal mortality rates during the pandemic, due to social restrictions and health care disruptions, which affected access to routine prenatal care.

Therefore, it has been demonstrated that the impediments caused by the pandemic to protect pregnant women and their babies from COVID-19 unintentionally caused a spike in mortality of both infants and women (mostly related to heart diseases and diabetes)[51].

The hope is that lessons will be learned from what happened and that health facilities will take measures to ensure constant mother-child contact even in health emergencies[52].

MOTHERHOOD PROTECTION IN THE BIO-LEGAL FIELD

Help for pregnant women and motherhood protection cannot be limited to the family or the health sector but must also be based on the fundamental and effective support of social policies.

Effective recognition of the social role of motherhood, parenthood and the family requires social, health, educational and economic interventions to support single or working women, through early childhood services and adequate maternity and paternity leave.

Indeed, international bodies recognise motherhood as a "social function"[53].

The Council of Europe calls on States to protect motherhood through legally binding instruments, starting from the **European Social Charter**[54], which devotes a specific article to the protection of women workers in case of maternity[55], to the **Istanbul Convention**[56], aiming to protect women and their children from violence, in particular domestic violence[57].

Among the non-binding documents of the Council of Europe, particularly relevant and innovative is the **Parliamentary Assembly Resolution on obstetrical and gynaecological violence**[58], which calls on all States to raise awareness and inform public opinion about a form of violence that has long been hidden and is still too often ignored.

---

51 Watson C. *Stillbirth rate rises dramatically during pandemic*. Nature. 2020 Sep;585(7826):490-491. doi: 10.1038/d41586-020-02618-5. PMID: 32934376; Kc A, Gurung R et al. *Effect of the COVID-19 pandemic response on intrapartum care, stillbirth, and neonatal mortality outcomes in Nepal: a prospective observational study.* Lancet Glob Health. 2020 Oct;8(10): e1273-e1281. doi: 10.1016/S2214-109X(20)30345-4. Epub 2020 Aug 10. PMID: 32791117; PMCID: PMC7417164; Kilby MD, Gibson JL, Ville Y. *Falling perinatal mortality in twins in the UK: organizational success or chance?* BJOG. 2019 Feb;126(3):341-347. doi: 10.1111/1471-0528.15517. Epub 2018 Nov 26. PMID: 30358075; Ullah MA et al. *Potential Effects of the COVID-19 Pandemic on Future Birth Rate*. Front Public Health. 2020 Dec 10;8:578438. doi: 10.3389/fpubh.2020.578438. PMID: 33363080; PMCID: PMC7758229.

52 The CSB has dedicated a special document to the dehumanisation of care caused by the pandemic (including in paediatric wards). See ***"Humanisation of care and end-of-life support in the event of pandemics"*** (12 May 2021)

53 **UN Convention on the Elimination of all Forms of Discrimination against Women** (18 December 1979). Art. 5: *"States Parties shall take all appropriate measures: b) to ensure that family education includes a proper understanding of* ***maternity as a social function*** *and the recognition of the common responsibility of men and women in the upbringing and development of their children, it being understood that the interest of the children is the primordial consideration in all cases".*

54 Council of Europe, **European Social Charter**, adopted in Turin in 1961 and revised in Strasbourg in 1996. The European Social Charter was signed by the Republic of San Marino on 18 October 2001.

55 Ibidem, Art. 8: *"Employed women, in case of maternity, have the right to a special protection in their work".*

56 Council of Europe, **Convention on preventing and combating violence against women and domestic violence**, adopted in 2011 and entered into force in 2014. San Marino issued a specific law (no. 57 of 6 May 2006) entitled **"Rules adjusting San Marino legal system to the provisions of the Council of Europe Convention on preventing and combating violence against women and domestic violence (Istanbul Convention)".**

57 Ibidem. On motherhood protection, see in particular: Art. 37, "*Forced marriage"* and Art. 39 "*Forced abortion and forced sterilisation*".

58 Council of Europe Parliamentary Assembly**,** **Obstetrical and gynaecological violence**, Resolution 2306 (2019).

This document explicitly mentions inappropriate or non-consensual acts, including sexual abuse, taking place in the privacy of a medical consultation or childbirth[59]. In this regard, worth mentioning is that, already in 2017[60], the World Health Organization (WHO) had strongly criticised the disrespectful mistreatment that women can suffer during childbirth in hospitals.

Today, prevention and fight against gynaecological and obstetrical violence are not yet considered priorities, but caring and compassionate practices must be promoted in order to ensure humane, respectful and dignified reception of and support for patients and women about to give birth[61], including through access to pain relief therapies during labour and childbirth[62].

Considering the specificity and innovative nature of the above-mentioned document, the CSB considers it useful to explore possible ways to:

- raise awareness among citizens about motherhood and parenthood through public meetings;
- undertake studies to investigate the epidemiological and socio-health aspects of motherhood and parenthood;
- verify whether, compared to previous generations, men are now able to play a more responsible and protective role towards their pregnant partners;
- collect data on medical procedures applied during childbirth and on cases of gynaecological and obstetrical violence through trained personnel;
- organise training courses specifically aimed at raising awareness among midwives, gynaecologists and nurses on gynaecological and obstetrical violence, paying special attention to the relationship between health workers and patients, and in particular vulnerable and disabled people;
- develop specific and accessible complaint procedures for victims of gynaecological and obstetrical violence, inside and outside hospitals, including through close cooperation with ombudsmen;
- offer a support service, which includes specific assistance to victims of gynaecological and obstetrical violence.

National legal systems also pay particular attention to the protection of motherhood and the family.

In the Republic of San Marino, motherhood is protected by its fundamental constitutional law, the so-called **Declaration on the Citizens' Rights**. The first paragraph of Article 12 of the Declaration reads as follows: *"The Republic shall protect the institution of the family, based on moral and legal equality of spouses. Mothers shall be entitled to assistance and protection by the community".*

[59] Ibidem, Art. 3.
[60] https://www.who.int/reproductivehealth/topics/maternal_perinatal/mistreatment-during-childbirth/en/
[61] Ibidem, Art. 7
[62] Ibidem, Art. 8.7

The protection provided by the State of San Marino is basically expressed in the legislation dealing with pregnant workers. Reference is made in particular to Law no. 137/2003 entitled **"Measures to support the family"**[63] and Delegated Decree no. 116/2008, which regulates in more detail the protection of pregnant workers, workers who have recently given birth and workers who are breastfeeding, both in the private and in the overall public sector[64].

Also, during the health emergency and the fight against the spread of the COVID-19 epidemic, pregnant women were not forgotten. Indeed, under Article 10 of **Decree-Law no. 14 of 29 January 2021**, pregnant workers are entitled to early leave from work in cases where it is not possible to work from home, or if the doctor cannot certify the absence of risks of contagion.

[63] Law no. 137/2003 grants pregnant women an economic allowance for a period of 150 days, and working women are entitled to leave from work. This Law also introduced a ban on dismissal. Working women are also entitled to a post-partum leave of 16 months (or, alternatively, to a 2-hour paid leave per day).

[64] The Delegated Decree introduces a ban on exposure to hazardous physical, chemical and biological agents and extends protection and prevention measures to self-employed women.

PRENATAL TESTS FOR DIAGNOSTIC AND THERAPEUTIC PURPOSES

Technical and scientific developments make it possible to support pregnancy with a series of instrumental and laboratory investigations aimed at monitoring the foetus' state of health with regard to some diseases[65] or pathological conditions, as well as enabling intrauterine therapeutic interventions.

The purpose of this Chapter is not to thoroughly examine all types of diagnostic/therapeutic tests available[66], but to illustrate the bioethical issues generally associated with them.

Prenatal diagnosis makes it possible to identify some characteristics regarding the unborn child (number of foetuses, sex, genetic characteristics, malformations, etc.) and, when possible, to comprehensively inform parents about possible health interventions and to properly assist them, including through information and psychological support, or to plan the time, place and manner of delivery assistance.

In the context of prenatal examinations, **genetic testing** is a series of analyses of specific genes, their product or function, as well as any other type of investigation of DNA or chromosomes, aimed at detecting or ruling out mutations (i.e., modifications) likely to be associated with genetic diseases already present or likely to occur in the future.

These examinations involve the most critical bioethical issues, since they are aimed at detecting not so much the presence of a characteristic considered problematic, but rather the "risk", **"susceptibility"** and/or **predisposition** to the onset of complex multifactorial diseases, with consequent prognostic indications that differ from those of any other diagnostic examination.

Sometimes, the detection of a "risk" of a future disease may not turn into certainty, as the result of investigations may not always be confirmed by other independent clinical or instrumental signs. In this case, the prediction will only be confirmed by the onset of the disease.

Moreover, the wide-ranging diagnostic capacity is currently not matched by a similar therapeutic capacity, both before and after birth.

Finally, invasive diagnostic techniques can pose risks to the foetus and the mother[67].

In the light of all the above considerations, women and couples have to make crucial choices, for which it is often difficult to have certain information that can support truly informed decisions, all the more so if these concern reproductive choices and the resulting ethical options.

The first bioethical assessment must involve a careful **risk-benefit analysis**, which is particularly

---

[65] These are diseases caused by DNA abnormalities, chromosome alterations, infectious diseases contracted during pregnancy (rubella, toxoplasmosis), and the taking of drugs that can lead to malformations. With regard to some congenital defects, for example of the kidneys and urinary tract, surgery should be carried out immediately after the child's birth to prevent irreversible damage.

[66] For an illustration of the various types of tests, see **Annex 2: "Prenatal tests".**

[67] For the risks and methods of performing invasive diagnostic techniques, see **Annex 2: "Prenatal tests".**

complex due to the predictive value of investigations, which often lack absolute certainty.

The burden of the choice concerning these tests cannot be solely on the mother and the couple but must be shared between several specialised professionals with various competences, whose main reference point is the geneticist. This must be part of a correct and in-depth **counselling** carried out in specialised facilities, in order to provide all the necessary scientific and psychological support.

In order for counselling to be a correct scientific, informative, psychological and ethical support, it must guarantee:

- Appropriate application of the **therapeutic principle**, verifying the appropriateness of the indications for diagnosis and identifying the method that is most appropriate and least risky for the life and health of the mother and foetus;

- Comprehensive information on the nature of characteristics that are considered abnormal or raise suspicion of a disease, the level of complexity, prognosis, the existence of effective therapy, magnitude of risk, meaning of possible results, possibility of receiving false positive/negative results;

- A probabilistic approach to diagnosis;

- Informed and complete consent, also thanks to the involvement of experts outside the health sector[68].

Counselling support is also essential in the delicate and complex phase following the test, for correct communication in the event of a positive result, aimed at helping the mother and the couple to understand the meaning of susceptibility to the disease and the predictivity of the result, or the nature of the abnormal characteristic identified, its possible transmission in the family, the management of the disease, prospects of therapeutic success and the possible options in family planning.

Given the complex and delicate role played by the team, counselling professionals must guarantee specific training and proven technical, scientific, ethical and psychological skills, aimed, on the one hand, at allowing free and responsible choices by the woman and the couple in the interests of the mother and the foetus and, on the other, thanks to comprehensive and impartial information, at avoiding directivity of counselling.

The numerous bioethical issues related to genetic testing concern the assessment of principles and rights that directly involve two human beings, the mother and the child, and that may conflict, thus forcing the parties concerned to make painful choices.

The first bioethical assessment must concern the clinical appropriateness of the diagnostic tests, in order to identify the reasons why the woman and the couple request the tests, and whether the

[68] In the case of genetic characteristics that lead to pathological conditions and/or physical malformations of the unborn child, people with expertise in the specific condition (associations, experts, etc.) should be involved, in order to provide comprehensive information on what it means to live with that condition.

purpose of the tests is consistent with these reasons. Indeed, the legitimacy of any intervention involving risks is related to the expected benefit and any diagnostic act must have a therapeutic or preventive purpose.

Prenatal diagnosis is preventive for the child if it allows the correction of the detected anomaly shortly after birth or in the uterus, in order to avoid further (including fatal) damage[69].

In some cases, early diagnosis and intervention may be essential to guide the choices of the woman and the couple.

A diagnosis which, having detected a genetic abnormality or a predisposition to develop a disease, leads to the termination of a pregnancy cannot be classified as prevention.

In these cases, it is essential to clarify that a genetic alteration leading to an increased risk of disease in adulthood cannot be classified as a malformation.

Even when foetal malformations are diagnosed, they can take on very different characteristics, not necessarily associated with a low quality of life.

[69] Some examples of preventive tests may be intrauterine ultrasound of intestinal obstruction, diagnosis of hydrocephalus, as well as of urological, cardiac and diaphragmatic malformations.

MEDICALLY ASSISTED PROCREATION

Procreation is the act that brings into being a new, unique and unrepeatable individual.

As the Western world is currently suffering from a worrying increase in male and female infertility conditions, the development of reproductive "assistance" methods to treat these complex conditions has been welcomed.

Therefore, the term "assisted" implies a reference to a technical intervention by a doctor to treat female or male infertility, thus making conception by means other than sexual intercourse possible.

The various medically assisted procreation/fertilisation (MAP)[70] techniques are characterised by their complexity, degree of technical invasiveness, origin and mode/place of gamete encounter (homologous or heterologous and in utero or in vitro MAP respectively).

The CSB will not make an ethical assessment of MAP, since the latter encompasses within its definition numerous techniques based on scientifically proven but different mechanisms, for which a specific document would be needed.

In the light of the above, the CSB recognises, first and foremost, that these methods have offered a viable solution to many couples, who would otherwise be unable to procreate children and therefore would feel relatively inferior to those with proven fertility. However, for the purposes of this document, the CSB will dealt with the aspects of MAP that present the most critical bioethical issues and are not given due attention in the public debate, which mainly focuses on the social and psychological needs of couples.

In this regard, the first consideration concerns the **principle of beneficence/non-maleficence** in relation to the primary **right to health**, which should be examined in depth from the point of view of all stakeholders: woman, unborn child, embryos, supernumerary embryos, other family members.

Indeed, MAP primarily has an unavoidable effect on the health of women, who are subject to ovarian hyperstimulation in order to increase their chances of conceiving or offering their own ova (donation/sale). The possible complications relating to pharmacological induction, including extrauterine pregnancy (hyperstimulation syndrome[71], possible foetal malformations, asynchronous endometrium/embryo development), must extensively contribute to the judgement of clinical appropriateness and be the subject of correct and comprehensive information for the woman (first and foremost) and her partner, who intend to undertake this practice as a couple.

Another critical bioethical issue is the guarantee of the health of the woman and the unborn child in cases of extrauterine and multiple pregnancies, the incidence of which is higher than in natural

[70] For the main MAP techniques, see **Annex 3: "Medically assisted procreation techniques".**
[71] See **Annex 5: "Glossary".**

pregnancies[72].

The right to life, even before the right to health, of supernumerary embryos cannot be ignored. After having been intentionally generated, they could indeed be suppressed for socio-economic reasons, in open contrast with the legal prohibition on the instrumental use of human life as an inalienable asset for both pharmacological/therapeutic and experimental purposes[73].

In case of heterologous fertilisation, the health of the unborn child must be protected in the event of hereditary or genetic diseases.

Finally, with regard to the psychological health of all stakeholders (future mother, future father, future child), reference should be made to specific literature[74]. Every choice made in the present time will have repercussions on the future of everyone involved. From a psychological point of view, one of the factors to be taken into account is the "sense of guilt", i.e., the negative judgement concerning a specific act[75].

Moreover, the **principle of equality** and the protection of **human dignity** take precedence over some practices of gamete manipulation to choose the sex (with the exception of cases where the aim is to prevent genetic diseases related to the expression of traits/genes linked to sex chromosomes) or other superfluous characteristics, which represent eugenic selection instruments. These practices are aimed at obtaining the "perfect" child or, in any case, one that meets as much as possible the wishes of the "biological or social parents".

In addition to the issues highlighted above and relating to MAP as a whole, the CSB also considers it necessary to emphasise an initial ethically relevant distinction between homologous fertilisation, which involves gametes from both members of the requesting couple, and heterologous fertilisation, which involves a person from outside the couple.

Indeed, the specific bioethical critical issues of heterologous MAP are much more relevant than those of homologous MAP, as they affect various areas of individual, family and social life.

With reference to the principle of **beneficence/non-maleficence** vis-à-vis the woman receiving the

---

72 For bibliographical references on MAP-related risks, see the Chapter **"Surrogate motherhood"** hereunder.

73 The ban on the use of human embryos and foetuses in scientific research is contained in **Council of Europe Recommendation 1100 (1989),** according to which: *"In accordance with **Recommendations 934** and **1046**, investigations of viable embryos in vitro shall only be permitted for applied purposes of a diagnostic nature or for preventive or therapeutic purposes, if their non-pathological genetic heritage is not interfered with".* The same ban applies to experimentations on foetuses implanted in utero, on post-implantation embryos and on live foetuses outside the uterus. Similar provisions can be found in the **Resolutions of the European Parliament A2-327/88 and A2-372/88.** According to the latter, *"The European Parliament (...) recognizes the value of life and more especially the human being's rights to protection and therefore expresses its concern at the "waste" of embryos which "in vitro" fertilization can entail; hopes that techniques and practices will be employed to eliminate this risk".*

74 *Examples include: Special Interest Group Psychology and Counselling of ESHRE ((European Society of Human Reproduction and Embryology)-National Board of Italian Psychologists, Guidelines for Infertility Counseling. 2004. See also: Covington SN and Hammer- Burns L. Pregnancy after infertility, in: Hammer Burns L and Covington SN. (eds.). Infertility counselling. A comprehensive handbook for clinicians (PP. 425-447), Parthenon, London and New York. 1999. Galhardo A, Moura-Ramos M, Cunha M, Pinto-Gouveia J. The infertility trap: how defeat and entrapmentr affect depessive symptoms,* Human Reproduction, Epub. 17 December 2015. McNaughton-Cassill ME, Bostwick JM, Arthur NJ, Robinson RD, Neal GS. *Efficacy of brief couples support groups developed to manage the stress of in vitro fertilization treatment*. Mayo Clinic Proceedings. 2002. McWhinnie AM. *Euphoria or despair? Coping with multiple births from ART: what patients don't tell the clinics.* Hum. Fert. 2000, 3, 20-25. Sewall G. *Involuntary childlessness. Deciding to remain "childfree".* In: Burns LH and Covington SN. (eds.), *Infertility counselling. A comprehensive handbook for clinicians.* (pp. 411–422), Parthenon, London and New York. 1999.

75 Klein M. *Aggression, anguish, guilt.* Bollati Boringhieri, 2012 (translation A. Guglielmi); Canosa M. *Etica del rimorso.* Altrimedia, 2018

man's gamete and the conceived child, it is necessary to verify the psycho-physical health of the person providing the sperm or ova in order to avoid the immediate risk of transmitting infectious and hereditary diseases or the transgenerational risk of various genetic predispositions. It is therefore essential to carry out specific genetic tests not only in the provider of the sperm but also in the recipient, or in all the recipients if the ova of the same woman are used to fertilise several women, in order to prevent a disease induced by the combination of maternal chromosomes with those of the provider with similar connotations[76].

The CSB also notes the critical issue of identifying the provider's psychological suitability and therefore considers it essential to identify the psychological characteristics useful for this purpose. In this regard, careful consideration could be given to the absence of psychotic symptoms or other psychological disorders, which are difficult to identify among the wide-ranging and complex psychiatric diseases.

Moreover, in terms of physical health, among the bioethical critical elements, particularly relevant is the possibility, on the one hand, of carrying out a family medical history of the person providing the sperm or ovum, correlating it with known diseases in the recipient's family of origin and fulfilling the duty to inform third parties (couple and future child) for health reasons, and, on the other hand, of interfering in this way with the right to privacy.

Similarly, it is a bioethical issue to identify who should establish *a priori* the parameters for the provider's psychic suitability (a doctor, a medical team, the recipient woman, the couple?). Indeed, the possible presence of latent psychic diseases is mostly due to a combination of several independent variables (environmental, genetic, psychological and relational) than to an isolated genetic cause.

The CSB believes that considerations of psychological wellbeing should not only involve the provider, but also the stakeholders in terms of couple dynamics. In this regard, the latter should be assessed in advance, even before being told of the problems that may arise when a third party arrives and disturbs a delicate balance, exacerbating a previous psychological asymmetry between the partners in terms of the value attached to the conception of a child with a genetic link.

In the case of sperm donation, *«Very important and worthy of attention are the references to the negative repercussions that gamete donation can have on both the father and the couple»*[77], since the child has no genetic, and therefore biological, link with the "legal" father. Excluded from the generative relationship, men can feel a multiplicity of emotions, which may include different forms of psychic distress[78] and lead to the affirmation of their lack of responsibility towards the "non-child".

It is not uncommon for the intended father to refuse to recognise the child, who is perceived as a stranger. Indeed, under some legislations, access to heterologous MAP must be preceded by the

[76] With regard to bioethical considerations relating to genetic testing, see the specific Chapter entitled **"Prenatal tests for diagnostic and therapeutic purposes"**.

[77] Flamigni C. *La procreazione assistita.* Il Mulino, Bologna 2002.

[78] *«Another psychological contraindication is the presence in the "legal" husband of a major neurosis and especially of paranoia with interpretative tendencies. […] Most of these men perceive the donor as a rival against whom feelings of inferiority and jealousy can be triggered, not to mention a persecution delirium»* (Pasini W, Mori G. *Nuove armi per superare l'infertilità*, Franco Angeli, Milan 2015).

partners signing a document attesting to their willingness to recognise the unborn child, while other legislations automatically attribute paternity to the partner resorting to this technique[79].

It is clear that, in such contexts, the written informed consent given by the couple cannot be equated with any other consent relating to diagnostic or therapeutic practices. Indeed, the information provided should also cover all aspects relating to possible genetic, sociological, legal and psychological consequences that involve the relationship between the partners and between the latter and the unborn child.

This information should be provided to applicants in the framework of a preliminary and specific counselling[80], which also allows to assess the real intentions of the applicants and their psycho-physical capacity to face both the procedures related to this practice and its consequences in the above-described areas.

The multiplication of parents, which characterises heterologous MAP, and which can generate internal conflicts, affects and determines the constitutive relationship (whether positive or negative) that unites all human beings with their parents and is a fundamental element in the construction of their identity.

In a bio-legal context, the CSB considers it necessary to emphasise that, although up to now they have mostly been justified on the basis of alleged altruism and generosity, those who make gametes available[81] do not "donate" an object or a mere biological material comparable to blood or organs, but rather germ cells, i.e. a genetic heritage, which is an essential part of their identity and which, through MAP, will be passed on to the child they generate and to future generations.

The CSB also points out that, behind the sugar-coated image of "donation", there is a real and flourishing market in gametes, including through specialised websites that allow providers to be selected on the basis of photos and details of their qualities and characteristics[82].

CHILDREN'S RIGHT TO KNOW THEIR ORIGINS

Respect for gamete donors' right to anonymity conflicts with what is recognised as a fundamental human right, i.e. **children's right to know their identity**, which is based on health as well as

[79] In Italy, for example, Articles 8 and 9 of Law no. 40/2004 establish the legal status of the unborn child, stating that *«Children born as a result of the application of medically assisted procreation shall have the status of children born in wedlock˟ (a term that replaced the word "legitimate" in 2014 D.L. 154/13) or children recognised by the couple who have expressed their willingness to use such techniques pursuant to Article 6»* (Art. 8), and prohibit the father's disavowal of paternity and the mother's anonymity, requiring that
«In case of recourse to heterologous medically assisted procreation (in breach of the prohibition laid down in Article 4, paragraph 3 - unconstitutional under judgement 162/2014 of the Constitutional Court), the spouse or cohabiting partner whose consent can be inferred from conclusive acts shall not bring an action for disavowal of paternity in the cases provided for by Article 235, first paragraph, numbers 1) and 2) of the Civil Code, nor lodge an appeal as referred to in Article 263 of the same Code. 2. The mother of a child born as a result of the application of medically assisted procreation may not declare her wish not to be named under Article 30, paragraph 1 of the regulation referred to in Decree no. 396 of the President of the Republic dated 3 November 2000». Medically assisted procreation is not regulated in the Republic of San Marino. The Social Security Institute authorises prenatal testing and also provides reimbursement for a maximum of two cycles of assisted procreation at authorised Italian facilities.

[80] For the characteristics of proper counselling, see the Chapter entitled **"Prenatal investigations for diagnostic and therapeutic purposes"**.

[81] The national rules governing the donation or buying and selling of gametes are different and range from absolutely free of charge, to forms of reimbursement of expenses, compensation or paid leave, to the sale through special contracts in specific banks.

[82] See, for example, *Nw Cryobank*. For other examples, see next Chapter entitled **"Surrogate motherhood".**

psychological grounds, as it is unavoidable for diagnostic and therapeutic purposes (discussed hereunder).

The primary motivation behind anonymity is to protect the confidentiality and balance of the sperm donor's family, which might otherwise be subject to external interference.

Similarly, it should be considered that the right to know one's origins must include the consent of the biological mother, i.e. the one who donated the ovum, to withdraw the choice of anonymity that she may have made at the time of birth.

For an appropriate bioethical assessment of the risk/benefit balance between opposing rights, it is therefore necessary to examine the fundamental principles.

The **principle of beneficence/non-maleficence** requires respect for the unborn child's overriding interest in knowing his or her biological identity. Indeed, for health reasons, in line with any medical practice, all persons have the right to know their origins in order to better identify their health conditions, both physical (in relation to the possibility of defining the real presence and the potential extent of the risk - personal and of future descendants - of some diseases) and psychological (all human beings must be guaranteed the right to construct their own personal identity). In other words, **the right to know one's origins** is an essential expression of the right to personal identity. Indeed, the **balanced development of individual and relational personality** is achieved above all through the **construction of one's identity, both external**, of which the name and the legally relevant and recognisable descendants are essential elements, **and internal**, and often requires the knowledge and acceptance of one's **biological descendants** and closest relatives.

Moreover, this right also entails a plurality of dialectical elements, such as the right to know the truth about one's personal history and the right to preserve the pre-existing construction of one's own identity and that of any third parties involved.

Right does not correspond to obligation. Indeed, the right to know one's own history, although essential, does not necessarily entail an obligation to do so or a predefined strategy to bring the relevant information to light. Indeed, not all persons who know they were born through MAP may feel the need to know their origins. Others may notice even at an early age that they have different physical characteristics from their parents and feel the need for confirmation of their identity.

There is no better time to talk about origins than when the individual asks specific questions.

Individual resources, life experiences, relationships and medical needs are just some of the variables that come into play in the life of a person conceived through MAP.

Precisely for this reason, there is no possibility of expecting from this person one behaviour rather than another. However, from the outset, it must be clear to the future parents that it is important to inform their children, answering any questions they may have and meeting their needs in their life's changing circumstances.

Also from a legal point of view, attempts are made to reconcile and balance the various rights at stake, providing full protection for the rights of the unborn child.

The Italian Court of Cassation prohibits the withdrawal of consent by the parent if embryo treatment has already begun. Also relevant is the prohibition on bringing an action for disavowal of paternity. Indeed, the child would otherwise be deprived of one of the two parents and of the related emotional and care relationship, given the impossibility of establishing the real paternity due to the use of semen of unknown origin.

There are many possible forms of protection with different, often conflicting aspects, which make it very difficult to find a solution suitable for the many cases that can be examined.

For example, in the case of multiple offers of sperm by the same individual, consideration must be given to the children's need to know their genetic origins, in order to avoid any unwitting union between blood relatives, the consequences of which are not yet fully known.

The CSB acknowledges that this risk, although it appears minimal, is increasing over time in parallel with the exponential increase in the recourse to heterologous MAP. This increase is due to the progressive postponement of western couples' decision to become parents and the consequent increased risk of infertility.

Therefore, in addition to the strictly personal and identity-related aspects of the child, the CSB notes that heterologous MAP also entails further difficulties in social terms concerning the confidentiality of data, family equilibria and numerous unsolved and difficult-to-balance critical issues, including the ease with which semen/ova sellers can access the market and the large number of procreations that are possible in various countries thanks to each semen sample[83]/ova collection[84].

This risk has led international bodies to express their doubts about the supply of gametes on several occasions and to call for caution about the unconditional use of the heterologous technique[85].

Moreover, the right to anonymity violates **the principle of justice.** Indeed, on the basis of a contract entered into without the consent of the person concerned (the unborn child), it entails a serious discrimination, since only persons conceived through such techniques are prevented from knowing their biological parents.

If the request to know the truth is not met by those who have the power to fulfil it, this would constitute an undue form of oppression, a real violence.

The desire to know one's origins is so strong that the children born after MAP, who have become

[83] It is estimated that each semen sample may be sufficient for 3-6 vials, each of which is used with a profit margin for the banks of more than 500% (Spar D. *Baby Business,* Sperling & Kupfer, Milan 2006).

[84] Bridge M. *Son of "super" sperm donor learns he has 1.000 siblings*, The Times, 29/9/2018.

[85] **Resolution A 2-372/88 of the European Parliament on artificial insemination "in vivo" and "in vitro":** *"(The European Parliament) considers that heterologous "in vivo" or "in vitro" insemination is not desirable; this applies to the donation of sperm or egg and frozen storage thereof; considers that, should this principle not be accepted in a Member State, the following conditions should be met: (…) (including) verified irreversible sterility or certified serious risk of malformation of a naturally conceived child"* (page 45).

adults, are now pressing the issue of finding their biological identity by creating numerous sites where people can enter personal details and photographs, in order to be identified by their biological parents[86].

The CSB also points out that, not least because of the constant advances in diagnostic tools, the right to anonymity is difficult to defend over time, and that late or accidental knowledge of the truth may have unpredictable consequences on the identity of the child and on the balance of the families involved.

Therefore, the CSB believes that the parents' choice to disclose to their child the methods of conception is a rightful one but, at the same time, must be supported by specific psychological counselling involving all stakeholders, useful for revealing the truth with criteria of proportionality and progression appropriate to the child's age.

A statistically suitable moment has not been and can never be identified in a generalised manner. Indeed, each person is different, with different experiences and a different education. For this reason, it is fundamental to pay the utmost attention to respecting the time of the whole family.

Finally, the CSB considers that, if this is absolutely required due to the child's health, the doctors involved in the treatment process should be aware of how conception took place and, where necessary, should ask the parents for permission to access the registers and data of the clinics used for MAP. However, in the event of refusal by the parents, given the overriding interest of the child's health, they should have access to the necessary data through the intervention of the competent authority.

CRYOPRESERVED EMBRYOS

The CSB also considers it essential to carry out a bioethical examination of the use of embryos that are not implanted because they are planned and produced in excess of real needs in order to address the high incidence of miscarriages in the planned procedures.

Extracorporeal fertilisation techniques - such as IVF[87] and ICSI[88] - provide for the possibility of freezing embryos at the earliest stage of cell division when a number of embryos in excess of that useful for transfer has been produced, or in cases where the woman is no longer willing to carry out the procedure due to physical or psychological impediments, including her withdrawal from the project.

At present, embryo preservation[89] does not allow to provide unambiguous information on the duration necessary to ensure the vitality[90] and viability[91] of the embryo.

[86] Among the many sites, examples include **Anonymous Us, Searching for my sperm donor father**
[87] For the definition see **Annex 5: "Glossary".**
[88] For the definition see **Annex 5: "Glossary".**
[89] Storage, or cryopreservation, is carried out in liquid nitrogen at -196°.
[90] Possibility of embryo implantation.
[91] Possibility that the embryo ensures the continuation of pregnancy.

The assessment of viability is based on the detection of morphological qualities such that the embryo can be expected to develop cell division, growth and differentiation in an integrated manner.

Similarly, survival rates after unfreezing depend on a number of criteria, among which the stage at which the embryo was cryopreserved and the fertilisation technique are particularly important.

Therefore, the bioethical concerns about the possibility of embryo loss due to the cryopreservation technique are compounded by those relating to the destination of embryos that are no longer usable for implantation. At the current state of knowledge, alternative solutions are only:

- voluntary destruction or natural extinction of embryos[92];
- the use of embryonic cells for research purposes or for the collection of stem cells[93];
- embryo adoption, or prenatal adoption.

This last solution is a desirable act of solidarity, since it enables the realisation of the right to birth. However, besides appearing complex, it does not eliminate the risk of embryo loss due to the unfreezing procedure[94] and implies, in any case, that the mother is subject to hormonal over-stimulation in preparation for implantation, and therefore to the associated health risk.

Indeed, among the most relevant consequences in this respect, although infrequent, are severe ovarian hyperstimulation syndrome (OHSS)[95], ectopic pregnancy (EP)[96], pelvic infection (PI)[97], abdominal bleeding (AB) and perforation of the iliac vessels (PIV)[98].

PI, AB and PIV related to ultrasound-guided oocyte retrieval, although presenting very low frequencies (0.6%, 0.07% and 0.04%, respectively), may require urgent hospitalisation with possible laparoscopic surgery.

Finally, transferring more than one embryo into the uterus exposes the woman to the risk of multiple pregnancies, with a high risk of caesarean section[99] for preterm delivery, premature rupture of

---

92 In the current state of scientific knowledge, it is not possible to determine the moment of natural extinction of a frozen embryo.

93 https://www.europarl.europa.eu/sides/getDoc.do?pubRef=-//EP//NONSGML+TA+P6-TA-2006-0265+0+DOC+PDF+V0//IT
https://eur-lex.europa.eu/LexUriServ/LexUriServ.do?uri=COM:2006:0803:FIN:IT:PDF
https://eur-lex.europa.eu/legal-content/IT/TXT/PDF/?uri=CELEX:32006D0973&from=EN

94 The percentages vary widely from case to case, but full-term pregnancies with frozen embryo transfer are about 10% more than with fresh embryos (Roeca C et al. *Birth outcomes are superior after transfer of fresh versus frozen embryos for donor oocyte recipients.* Hum Reprod. 2020 Dec 1;35(12):2850-2859.).

95 OHSS, the frequency of which is 0.5% to 2%, represents a real surgical emergency. Indeed, it involves alterations in the hydroelectrolytic and haemocoagulative balance and is associated with an abnormal increase in the volume of the ovaries, with peritoneal and pleural effusion and the possible appearance of acute thromboembolic phenomena. Timmons D, Montrief T, Koyfman A, Long B. *Ovarian hyperstimulation syndrome: A review for emergency clinicians*. Am J Emerg Med. 2019 Aug;37(8):1577-1584

96 The risk of developing EP is about the same as for OHSS, depending on the presence or absence of a tubal infertility factor. Carusi D. *Pregnancy of unknown location: Evaluation and management*. Semin Perinatol. 2019 Mar;43(2):95-100. doi: 10.1053/j.semperi.2018.12.006. Epub 2018 Dec 20.; Chang HJ, Suh CS. *Ectopic pregnancy after assisted reproductive technology: what are the risk factors?* Curr Opin Obstet Gynecol. 2010 Jun;22(3):202-7.

97 Sowerby E, Parsons J. *Prevention of iatrogenic pelvic infection during in vitro fertilization--current practice in the UK.* Hum Fertil (Camb). 2004 Jun;7(2):135-40.

98 Azem F, Wolf Y, Botchan A, Amit A, Lessing JB, Kluger Y. *Massive retroperitoneal bleeding: a complication of transvaginal ultrasonography- guided oocyte retrieval for in vitro fertilization-embryo transfer*. Fertil Steril. 2000 Aug;74(2):405-6

99 Lavender T, Hofmeyr GJ, Neilson JP, Kingdon C, Gyte GM. *Caesarean section for non-medical reasons at term*. Cochrane Database Syst Rev. 2012 Mar 14;2012(3):CD004660. doi:

membranes, diabetes mellitus, high blood pressure, preeclampsia[100].

Each of the solutions presented entails different assessments, some conflicting and some partly overlapping. However, they unequivocally reveal the fact that this topic is extremely delicate and complex and leads to deep bioethical reflections both among those who recognise the *status* of the embryo as a "human person" from the moment of fertilisation, and among those who postpone this *status* to later stages.

Ultimately, the solution of embryo adoption implies unanimous bioethical acceptability for the possibility of guaranteeing a chance of life to remaining embryos.

The Italian Constitutional Court has also addressed the issue of embryos and the ban on experimental research on them. The issue, among others, dealt with the conflict between the right of science (and the advantages of research linked to it) and the right of the embryo, from the point of view of the protection due to it by reason and to the extent of the degree of subjectivity and anthropological dignity accorded to it.

The dignity of the embryo, as an entity that has the principle of life in itself, is a constitutionally relevant value, the protection of which is not diminished by the mere fact that the embryos in question are affected by genetic diseases. However, like any other constitutional value, also the protection of the embryo must be balanced with other values, such as the protection of the need for procreation and of women's health.

Italy, however, prohibits the donation of human embryos for scientific research, since it has made a legislative choice between the conflicting fundamental values in favour of protecting the embryo[101].

In conclusion, the CSB believes that, in the case of non-implanted embryos, there should be a register of embryos, together with a formal assurance from the woman or the couple that they wish to proceed with implantation.

In the event of a declaration of embryo abandonment or renunciation of any future parental project, the embryos in excess could be used for embryo adoption, for which specific counselling for the woman and the couple should be envisaged in a specific regulation.

Such counselling is necessary in order to illustrate in a specific and detailed manner both the medical procedure and the risks involved, as well as the psychological and legal implications of this form of adoption for all stakeholders, as a result of equating the *status* of the conceived child with that of a legitimate or natural child.

However, in no case does the CSB consider any form of marketing or, even less, destruction of embryos to be ethically acceptable, since the right to life and physical integrity are absolute, inviolable and

[100] https://www.generaumbria.it/rischi-per-donna-e-nascituro-legati-alla-pma/
[101] Judgement no. 84 of 13/04/2016 passed by the Italian Constitutional Court.

inalienable rights.

It is unacceptable for parents or doctors to claim that they are the “owners” of the embryos they have generated, as if they were biological material and not children, and that one “donates” (even if only for scientific research purposes) “something” but does not donate “someone”, even in an embryonic state.

SURROGATE MOTHERHOOD

Surrogate motherhood refers to a group of medically assisted procreation practices whereby the conceived child is carried in the womb of a woman who is not the legal (or intended) mother[102].

The previous Chapter illustrated the maternal-foetal bond, which begins in the uterus and continues after birth, and which involves a multiplicity of closely related and intertwined elements (physiological, genetic, psycho-affective, cultural, legal), responsible for the complex and delicate synergy between parenthood and the child's psychological development.

Data concerning the technique of surrogate motherhood (whether commercial or altruistic) are still insufficient to identify the long-term consequences of such a radical intrusion of technology into the complex biopsychosocial dynamics of human generation.

From a bioethical and bio-legal perspective, the "sale" or "offer", depriving children of their rights in order to make them the object of others' rights, transforms a child into an "available" human being, in open violation of the protection of universal human rights[103].

Similarly, the woman's uterus cannot be downgraded to a mere biological incubator, since the uterus is the physical expression of the woman's capacity to receive the conceived child and interact therewith, in a unique and unrepeatable *continuum*.

Even the lexical choice of deleting the definition of "mother" and replacing it with the term "surrogate"[104] marks the reification and consequent annulment of every right of the woman who gives birth[105].

Indeed, surrogate motherhood is part of a huge global market for the purchase of human beings, through specific commercial contracts that reify both the children and the woman's body, with a clear conflict between the national laws that allow this practice, the international agreements that permit the adoption of children purchased in other countries (so-called reproductive tourism to low-income countries[106]) and the international rules providing for the protection of children's rights[107].

This market starts with the so-called "reproductive buying and selling" of gametes (sperm and ova), moves on to the renting out of wombs, and ends with the sale of newborn babies, in blatant violation of the ethical and legal principles contained in international documents such as the **Charter of Nice** (Articles 1 and 3) and the **Oviedo Convention** (Art. 21), on the inviolability of human dignity and the

---

102 For the definition of surrogate motherhood, see **Annex 5: "Glossary"**.

103 The **Universal Declaration of Human Rights**, approved on 10 December 1948 by the United Nations General Assembly, includes in its first articles, specifically in Article 3: *«Everyone has the right to life, liberty and security of person»*. San Marino Declaration on the Citizens' Rights does not specifically include the right to life but considers all human rights to be inviolable (Art. 5).

104 For the definition of "surrogate" and the difference with "intended mother", see **Annex 5: "Glossary".**

105 van Niekerk A, van Zyl L. *The ethics of surrogacy: women's reproductive labour*. J Med Ethics, 1995; 21: 345-349; Ber R. *Ethical Issues In Gestational Surrogacy*. Theor Med Bioethics 21: 153–169, 2000.; Aznar J, Peris MM. *Gestational Surrogacy: Current View*. Linacre Quarterly 2019, Vol. 86(1) 56-67.

106 Deonandan R, Green S, van Beinum A. *Ethical concerns for maternal surrogacy and reproductive tourism.* Journal of Medical Ethics 2012;38:742-745.

107 Smolin DM. *The One Hundred Thousand Dollar Baby: The Ideological Roots of a New American Export.* Cumberland Law Review 2019.

inadmissibility of any form of commodification of the human body or individual parts thereof.

The human being - be it the gamete seller, the expectant mother, or especially the child - is essentially reified, made an object and a means to satisfy others' desires.

We are witnessing a worldwide market that exploits vulnerabilities for individual needs in the guise of reproductive freedom and is supported by an ever more pressing media advertising campaign about clinics and agencies that promise certain results (for the intended parents) and easy money (for the genetic and/or gestational mother[108]), with pictures and photos of the children and the relevant prices.

Advertisements for oocyte "donation", for example, attract young women through philanthropic messages not only for money, but also with the persuasion that this practice is a duty towards less fortunate women.

The involvement of these "donors" takes place without any supervision or rules, without any prior examination to identify any pre-existing diseases and risks to their health, or even their lives[109]. In this regard, international literature has repeatedly called for a regular examination of the legal aspects of the whole phenomenon[110].

It is difficult to foresee how these women might react to the thought of having a biological child somewhere in the world or even next door: depression, post-traumatic disorder, psychosomatic diseases, are just some of the possible problems that may affect more sensitive donors.

The latest frontier of this market, in chronological order, is the proliferation of specific groups on social networks[111], in which one can write or reply to advertisements and receive immediate replies, without any filter.

Similarly, there is an increasing number of applications that can be downloaded directly onto one's mobile phone to make it easier to find sperm and oocyte sellers and women willing to rent out their wombs[112].

The CSB is deeply concerned about the use of such commercial advertisements and the consequences of such commercial operations, in which the stakeholders demonstrate a lack of

---

108 For the definition see **Annex 5: "Glossary"**.

109 Initial contacts are established via the Internet or by telephone, and in most cases, a kit is delivered to the home with detailed instructions that the "donors" must follow carefully in order to start taking the hormones that stimulate the ovaries. As no monitoring is deliberately planned, there are no data available on the health consequences for these women.

110 Drabiak K et al. *Ethics, Law, and Commercial Surrogacy: A Call for Uniformity*. J Law Med Ethics Summer 2007;35(2):300-9.; James S et al. *Avoiding legal pitfalls in surrogacy arrangements*. Reproductive BioMedicine Online (2010) 21, 862– 867; Casella C et al. *Ethical and legal issues in gestational surrogacy*. Open Med. 2018; 13: 119-121.; Crockin SL et al. *Legal principles and essential surrogacy cases every practitioner should know*. Fertil Steril. 2020 May;113(5):908-915.; González NI. *Legal and ethical issues in cross-border gestational surrogacy.* Fertil steril. 2020 May;113(5):916-919.

111 Examples of some of the groups currently present on Facebook include *Usa Sperm donation* (with over 18,000 members), *Sperm Donation USA* (with 15,000 members), *Surrogate mothers provider* (9 thousand members).

112 Examples include the app called *Just a baby,* whose keywords are *swipe-match-connect* and whose name underlines the absolute reification of the child and the purely commercial intent of the operations. On these applications, interested parties can browse through photos and profiles to find the right person for their needs, even at the right distance from their home, since, among the search filters, there is also one that allows finding the maximum distance from one's home.

awareness and rejection of any form of responsibility for actions aimed at the birth of a human being.

However, we are witnessing a tacit acceptance of this market by an ever-increasing segment of public opinion, conditioned by a constant and mendacious advertising, which is gradually leading people to consider what is inadmissible in bio-legal terms as normal and even praiseworthy.

SURROGATE MOTHERHOOD AS A VIOLATION OF HUMAN RIGHTS

Surrogate motherhood is increasingly recognised across the board as a serious human rights violation.

The request to the EU Member States to acknowledge *«the serious problem of surrogacy which constitutes an exploitation of the female body and her reproductive organs»* starts from the European Parliament, with the **2011 Resolution** to fight violence against women[113], and continues in 2015 with the strong *«condemnation of the practice of surrogacy, which undermines the human dignity of the woman since her body and its reproductive functions are used as a commodity; considers that the practice of gestational surrogacy which involves reproductive exploitation and use of the human body for financial or other gain, in particular in the case of vulnerable women in developing countries, shall be prohibited and treated as a matter of urgency in human rights instruments»*[114].

This condemnation was reiterated in 2016, when the Parliamentary Assembly of the Council of Europe rejected the Report of the Committee on Social Affairs[115], which recommended the development of Guidelines for the safeguarding of the rights of the child in case of conventions relating to surrogate motherhood. The aim was to avoid the risk of legitimising this practice even if only by suggesting guidelines to protect children born through this technique.

However, there is no legal provision in international and European law that universally prohibits surrogate motherhood. The types of surrogate motherhood recognised vary from country to country. European legislators have limited competence in family law and there are no international regulations or minimum standards that States are required to comply with.

Therefore, in the context of the protection of human rights, an increasing number of appeals and petitions were submitted to international institutions by organisations and groups to ban surrogate motherhood[116,117] , starting with the Council of Europe, where all member States have ratified the UN

---

113 **European Parliament Resolution of 5 April 2011 on priorities and outline of a new EU policy framework to fight violence against women**, Art. 20.

114 **European Parliament Resolution of 17 December 2015 on the Annual Report on Human Rights and Democracy in the World 2014 and the European Union's policy on the matter**, Art. 115.

115 *Human Rights and ethical questions related to surrogacy* (or *De Sutter Report*, named after the Belgian gynaecologist and rapporteur Petra De Sutter.).

116 More than 54 feminist and human rights associations have taken a stand for the abolition of surrogate motherhood in Europe and worldwide (see the list here). Worth mentioning are, *inter alia*: http://www.abolition-gpa.org (CoRP - **Co**llectif pour le **R**espect de la **P**ersonne); *Appel à rassemblement pour l'abolition de la GPA devant le Conseil de l'Europe*, 21 sept. 2016 (C.L.F. – Coordination Lesbienne en France); *Stop Surrogacy Now* (an association founded in the USA, which brings together more than 160 personalities and associations from 18 countries around the world, of different ethnic, religious and cultural backgrounds, and which opposes the exploitation of women and the trafficking of children through surrogate motherhood) promotes the international petition for a global ban on surrogate motherhood: https://www.stopsurrogacynow.com/

117 In 2015, the Council on General Affairs and Policy of the Hague Conference established a group of experts to study private international law issues in relation to commercial surrogate motherhood agreements concerning the legal parenthood of children in the relations among the various countries. The Report is available at: 2019: Report of the October/November 2019 meeting of the Experts' Group on Parentage / Surrogacy (6th meeting). In 2019, *StopSurrogacyNow* submitted a Statement to the UN Special Rapporteur on the sale and sexual exploitation of children to call for a ban on surrogate motherhood as it is an abuse of the human rights of women and children.

Convention on the Rights of the Child, thereby committing to safeguarding children's rights and not endorsing new forms of exploitation and alienation.

The numerous petitions submitted worldwide identify some elements, which characterise surrogate motherhood and which were outlined at a recent international conference[118]:

- **Power.** It is exercised by some people (the intended parents) over others (the surrogates) according to a logic of eugenics in the choice of children to be purchased.

- **Classism.** Surrogate motherhood is reserved for the wealthier social classes[119].

- **Racism.** The countries where this practice is permitted are mostly in South East Asia[120] and involve poor women who are considered inferior[121]. In the US States where surrogate motherhood is permitted, surrogate women are mostly African-American and Hispanic, or, if Caucasian, they are very often poor[122].

- **Ableism.** Surrogate motherhood allows intended parents, by contract, to specify the genetic characteristics of the child, and to require foetal reduction or abortion in cases of disability. This is a eugenic drift that leads to the elimination of children deemed "imperfect"[123].

- **Misogyny.** The risks and consequences of surrogate motherhood fall exclusively on women[124], namely the oocyte donor, the surrogate, the intended mother.

- **Rights.** In contrast to a claimed right to have a child, there is the violation of the rights of women who are pushed to commodify their bodies out of necessity, the rights of children with disabilities, who are rejected because of a different idea of perfection, the rights of children rejected or aborted (and of the surrogate mother who at that moment opposes abortion) at the request of the intended parents, the rights of children not to be commodified, to know their origins, to be raised by their parents and not to suffer the trauma of a deliberate and sudden interruption of the mother-child relationship.

The justification for surrogate motherhood is based on a hypothetical "right to filiation", which is totally different from the "right to procreation". The latter is indeed a natural human right, intangible

---

118 *Broken Bonds and Big Money: an International Conference on Surrogacy*. 15-16 March 2019. Melbourne, Australia.

119 The documents on which the petitions are based mention, as examples of power and classism, the cases of celebrities and showbiz personalities who can obtain one or more children by paying large sums of money.

120 Saravanan S. *A Transnational Feminist View of Surrogacy Biomarkets in India*. 2018. *DOI: 10.1007/978-981-10-6869-0.*

121 *Lahl J. Gestational Surrogacy Concerns: The American Landscape.* In E. Sills (ed.), *Handbook of Gestational Surrogacy: International Clinical Practice and Policy Issues (pp. 287-295).* Cambridge: Cambridge University Press. 2016. doi:10.1017/CBO9781316282618.038.

122 Ibidem.

123 An example is the 2014 case of baby Gammy, born in Thailand through surrogate motherhood, together with a twin sister. The Australian intended parents only took his sister Pipah with them, rejecting Gammy because he had Down's syndrome. He now lives with his surrogate mother (http://www.asianews.it/notizie-it/La-gemella-di-baby-Gammy-rimarr%C3%A0-in-Australia.-Anche-se-il-padre-ha-trascorsi-da-pedofilo-37235.html. https://www.abc.net.au/news/2017-06-29/baby-gammy-starts-kinder-amid-tensions-over- donations/8585596). Following these cases, on 30 July 2015 Thailand passed the "Act to Protect Babies Born through Assisted Reproductive Technologies". Also in Australia, where only not-for-profit surrogate motherhood is allowed, there is an ongoing debate about the implications of this practice (see the 2016 Full Report and the Inquiry into the proposed amendment to the law on surrogate motherhood).

124 Support for surrogate motherhood is not consistent with feminist principles. Indeed, in renting out their womb, women relinquish their reproductive rights and there is nothing progressive about exploiting women on the basis of poverty, ethnicity, gender or disability. For the risks of women involved in surrogate motherhood, see the paragraphs **"Risks for the surrogate mother"** and **"Surrogate motherhood as exploitation of women"**

even with respect to rules[125].

On the contrary, the "right to filiation" or "right to a child" cannot be conceived, since it is an imponderable event, related to biological conditions, which, even if it were conceivable, having as its object the child, would constitute a legal contradiction. Indeed, considering the unborn child as the "object of the right" would de facto violate the latter's legal status as the "subject of the right".

Indeed, if the freedom to give life is translated into the recognition of an absolute right to be parents, the child is inevitably downgraded to the object of an individual need of adults and the profound meaning of being a person is irreparably compromised.

Paradoxically, at a time when new individual rights are being demanded, we are witnessing the downgrading of human beings to consumer goods, deprived as they are of the most basic right, namely to be desired and accepted as a gift and not purchased through a contract.

Surrogate motherhood gives rise to a new generation of children conceived to be taken away at birth, with repercussions in terms of psycho-emotional and physical development. The first objective data concerning these repercussions are beginning to be gathered in the literature126.

Therefore, the deep desire for parenthood finds in human rights the guide to identify its limitations as a serious form of exploitation of women and children and a blatant violation of the prohibition of commodification of the human body127.

This form of exploitation remains inadmissible even in cases where there is an intention to attribute

---

125 Suffice it to think, for example, of the laws imposing a maximum number of children allowed for a couple.

126 Australian Human Rights Commission, *Bringing them home: The "Stolen Children" report*. 1997. Julia Gillard on behalf of Australian Government, *National Apology for Forced Adoptions*. 2013.

127 The main international documents where such desire conflicts with surrogate motherhood include:

- **Oviedo Convention** (1997). Chapter VII – Prohibition of financial gain and disposal of a part of the human body. Article 21: "Prohibition of financial gain": *The human body and its parts shall not, as such, give rise to financial gain.*
- **UN Convention on the Rights of the Child** (1989) Art.9: 1). *States Parties shall ensure that a child shall not be separated from his or her parents against their will, except when competent authorities subject to judicial review determine, in accordance with applicable law and procedures, that such separation is necessary for the best interests of the child. (..) States Parties shall respect the right of the child who is separated from one or both parents to maintain personal relations and direct contact with both parents on a regular basis, except if it is contrary to the child's best interests.* Art. 24 e): *To ensure that all segments of society, in particular parents and children, are informed of child health and nutrition, the advantages of breastfeeding (...)* Art. 35: *States Parties shall take all appropriate national, bilateral and multilateral measures to prevent the abduction of, the sale of or traffic in children for any purpose or in any form.*
- **UN Slavery Convention** (1926). Art. 1: *Slavery is the status or condition of a person over whom any or all of the powers attaching to the right of ownership are exercised.*
- **Charter of Fundamental Rights of the European Union** (or Charter of Nice. 2000). Art. 3 (Right to the integrity of the person): 2. c) *the prohibition on making the human body and its parts as such a source of financial gain.*
- **Universal Declaration on Bioethics and Human Rights, UNESCO**, 2005. Art. 3: "Human dignity and human rights". *1) Human dignity, human rights and fundamental freedoms are to be fully respected.*
- ***Convention on the Rights of Persons with Disabilities-CRPD*** *(UNO 2006): Art. 7.2. In all actions concerning children with disabilities, the best interests of the child shall be a primary consideration. Art. 16.1. States Parties shall take all appropriate legislative, administrative, social, educational and other measures to protect persons with disabilities, both within and outside the home, from all forms of exploitation, violence and abuse, including their gender-based aspects. Art. 17. Every person with disabilities has a right to respect for his or her physical and mental integrity on an equal basis with others. Art. 23.4. States Parties shall ensure that a child shall not be separated from his or her parents against their will, except when competent authorities subject to judicial review determine, in accordance with applicable law and procedures, that such separation is necessary for the best interests of the child. In no case shall a child be separated from parents on the basis of a disability of either the child or one or both of the parents. Art. 18.2. Children with disabilities shall be registered immediately after birth and shall have the right from birth to a name, the right to acquire a nationality and, as far as possible, the right to know and be cared for by their parents.*

to this practice the characteristic of gratuitous solidarity[128].

Behind the apparent act of solidarity for those who wish to have a child, surrogate motherhood is in many countries, especially the poorest ones, a social scourge for families and social ties129.

Nor is it admissible to invoke the principle of autonomy as the basis of a choice made due to poverty, coercion or violence, or as a form of survival, since human rights imply respect for the dignity of every human being.

Finally, surrogate motherhood violates the therapeutic principle underlying medical ethics, which takes the form of an essential assessment of the risk-benefit ratio. Both practice and clinical trials are based on this assessment, which makes an intervention lawful if, in the light of foreseeable risks, it entails a greater benefit for the health and life of the person involved than the damage caused by the possible occurrence of such risks.

Indeed, in the case of surrogate motherhood, the genetic mother and the surrogate mother are involved in medical practices, which have an exclusively economic and non-therapeutic purpose, and which involve numerous risks to health and life arising from the medical treatments involved.

In clinical trials, stakeholders must be informed in a detailed and truthful manner of the foreseeable risks and expected benefits, in order to be able to provide and withdraw free and informed consent at any time and without any consequence or retaliation130. All interventions in humans must have passed specific pre-clinical tests, which support their safety. High standards are guaranteed for the protection of the confidentiality of each person involved. Financial incentives are not allowed, except for healthy volunteers, which, in any case, must not exceed amounts intended to cover expenses131.

Finally, in order to protect participants, all experimentations must be assessed and approved in advance by ad hoc Ethics Committees.

None of these principles is applied in surrogate motherhood.

Surrogate motherhood cannot be regarded as a treatment for infertility. Indeed, even where infertility is the result of a disease, the birth of a child through surrogate motherhood does not occur following a therapy, nor does it lead to the recovery of the pathologically infertile person.

Surrogate motherhood cannot be compared to organ transplants, since in the latter case donors are

---

[128] This solidarity is declared to be free of charge but often conceals remuneration in the contracts under the headings of reimbursement of expenses and coverage of medical costs, which in any case represent an economic advantage for those who receive them (the pregnant woman and the fertility clinics).

[129] Violations of the human rights of surrogate women and of children are increasingly reported in Ukraine by the Ombudsperson for Children's Rights, Lyudmila Denisova, the President of the Commission for Children's Rights, Mykola Kuleba, and Ukrainian women who are Members of the European Parliament.

[130] Since the **Nuremberg Code** (1946), this informed consent, free from any form of coercion, has been the first requirement for ethically acceptable experimentation.

[131] On the contrary, a surrogate mother can earn up to £30,000 - $40,000, which can increase for additional surrogate pregnancies or if she is willing to carry more embryos. (See the following site as an example: https://www.westcoastsurrogacy.com/surrogate- program-for-intended-parents/surrogate-mother- cost#:~:text=The%20average%20cost%20of%20surrogacy,cost%20may%20be%20slightly%20higher).

never allowed to receive any form of financial compensation. The absolute ban on buying and selling human organs and bodies is a guarantee of protecting the life and health of those in poverty or need, and no informed consent can ever provide a legal or ethical character to this practice.

Similarly, surrogate motherhood cannot be compared to adoption. Indeed, adoption gives a new family to a child who has already been born and has no opportunity to be raised and educated by the biological family, whereas surrogate motherhood entails the abandonment of the child from the outset and, as a direct consequence, prevents the surrogate from exercising any rights at any time thereafter.

Surrogate motherhood practices do not make it possible to verify whether the newborn child, especially a disabled one, is registered immediately after birth and is entitled from birth to a name, to acquire a nationality, and, as far as possible, to know his or her parents and be raised by them.

Case-law and bioethics were established to protect those who cannot defend themselves because they are more vulnerable and need others to assert their rights.

On the contrary, surrogate motherhood eliminates even fundamental rights for the weakest (to the health and life of the child and the surrogate woman). These fundamental rights are overridden and annulled by the force of desires, which are transformed into rights and imposed by the force of money.

SURROGATE MOTHERHOOD AS EXPLOITATION OF WOMEN

Surrogate motherhood is based on the exploitation of the woman's body through unfair transactions involving low remuneration, coercion, insufficient medical care, as well as serious short-and long-term health risks for those who accept this practice by signing a fictitious “informed consent” because they are mostly partially or completely uninformed[132].

Publicly available data on surrogate motherhood are limited and do not provide a snapshot of the state of this technique in terms of the number of gestations for others, of surrogate women, of surrogate pregnancies repeated by the same woman, of children carried at the same time by a woman and born, and of abandonments, or even the ways in which children, as they grow up, cope psychologically, socially and physically with their condition as products of surrogate motherhood.

However, the studies that are beginning to be published clearly show that there is a close connection between poverty, gender, human rights violations and indignity in the surrogate motherhood market[133].

In some developing countries, biotechnology creates “reproductive objects” of certain female bodies, promoting an image of absolute freedom which, in reality, conceals a serious form of “reproductive

[132] Orfali K, Chiappori PA. *Transnational Gestational Surrogacy: Exploitative or Empowering?* Am J Bioethics, 14: 33–50, 2014.

[133] These studies and surveys include: Saravan S. *A Transnational Feminist View of Surrogacy Biomarkets in India.* Springer Singapore, 2018. Bindel J, *Outsourcing pregnancy: a visit to India's surrogacy clinics.* The Guardian, 1 April 2016. Rose K, *Book Review: Surrogacy: A Human Rights Violation by Renate Klein. Dignity: A Journal of Analysis of Exploitation and Violence*. 2018. Vol. 3: Iss. 1, Article 6. DOI: 10.23860/dignity.2018.03.01.06.

injustice"[134].

Documented evidence[135] shows that in many of these countries, including those where a ban or restriction on surrogate motherhood has been introduced, serious violations of human rights and medical ethics continue to be perpetrated. Indeed, many of the women who agree to become surrogate mothers are detained in clinics against their will, restricted in their personal and dietary habits and subject to the transfer of up to five embryos into the uterus. This leads to selective abortions imposed by the preferences of the intended parents, or the abandonment of the "imperfect" born child to the surrogate mother, who is still in need of money and with a child that often requires special and expensive care[136].

There are also cases of simultaneous transfer of embryos to two surrogate mothers for the same customers, in order to increase the "success" rate for the intended parents or customers, who pay one or the other mother, depending on the "results".

Women are selected on the basis of their class, age, skin colour, religion and caste, and the remuneration varies according to these categories.

Countries that have banned or restricted this practice have experienced deaths of mothers and oocyte donors, battles over custody of babies and/or abandonment of disabled and unwanted ones, and exploitation of women through the same illegal networks that traffic in girls for prostitution.

Even in its "altruistic" version, in patriarchal contexts, this practice is imposed on women through family persuasion.

For all these reasons, the call for a ban on surrogate motherhood as a universal violation of human rights in terms of reproductive justice is becoming increasingly widespread, and the surgical technique of uterine transplantation, which is extremely difficult from a technical point of view, is being developed, not only from a deceased donor but even more so from a living one.

With regard to the latter solution, some authors consider it acceptable to choose a blood-related donor who has already had children and decides autonomously in a truly altruistic way. The surgical risk, which is never equal to zero, and the pregnancy risk (for the mother and the foetus), which is linked, *inter alia*, to the proposed immunosuppressive treatment, besides requiring further specific bioethical reflection, suggest extreme caution[137].

Therefore, from a bioethical perspective, **surrogate motherhood violates the principle of justice and**

---

134 Developing countries that have restricted or proposed a ban on commercial surrogate motherhood after experiencing numerous human rights violations include Nepal, India, Thailand, Mexico and Cambodia. New developing countries practising this technique include Malaysia, Kenya, Nigeria, Ghana, South Africa, Argentina and Guatemala.

135 Broken Bonds and Big Money International Conference on Surrogacy. *Melbourne, 15-16 March 2019.*

136 Frydman T. *Surrogacy: yes or no?* http://dx.doi.org/10.1016/j.fertnstert.2016.04.017.;

137 Grynberg M et al. *Uterine transplantation: a promising surrogate to surrogacy?* Ann. N.Y. Acad. Sci. 1221 (2011) 47–53.; Robertson JA. *Other women's wombs: uterus transplants and gestational surrogacy*. J Law Biosci, 2016 Mar 21;3(1):68-86.; Brännström M et al. *Uterus Transplantation: A Rapidly Expanding Field.* Transplantation 2018;102: 569–577.

equal access to reproductive health and care.

However, this practice is not only allowed in poorer countries, but is also permitted in some richer and more developed States[138], where women may be involved either for economic reasons or out of a feeling of compassion for those who, despite wishing to do so, cannot have children.

However, in both cases the consent given is not free from those constraints that undermine the full freedom of the decision. In one case there is the state of economic need, without which the woman would not undergo the risks of this procedure. In the other case there is the mistaken prospect of performing an altruistic and solidarity act, without being fully aware of all psychological and physical implications that this entails both for the surrogate mother and for the unborn child.

Therefore, in the light of the above, there is a **violation of the principle of autonomy**, which is necessarily at the basis of an informed consent, truly free from all psychological and economic coercion, from which any really autonomous choice derives.

In any case, the essence of surrogate motherhood remains the transformation of a woman's body into a tool to achieve a dual purpose, namely the fulfilment of a parenthood desire for others and financial gain for those who manage this fertility industry.

Worth noting is that in all cases and in all countries, the relationship between the intended parents and the surrogate mothers is often non-existent and is completely interrupted at birth, when some women are even forbidden to see the children's faces, while others are required to breastfeed the newborn until he or she is collected by the “intended parents”.

The separation of the child from the surrogate mother must take place as soon as possible to prevent the child from developing the attachment that has been studied by generations of developmental psychologists and child psychiatrists, who have carried out studies and shown that this is fundamental for the proper psycho-affective and cognitive development of the child and future adult.

Finally, it should be pointed out that even the intended mother may, after some time, show psycho-affective imbalances arising from a sense of guilt, frustration and inadequacy, which could give rise to resentment not only towards the surrogate mother, but also towards the child.

THE SURROGATE MOTHERHOOD CONTRACT AND ITS REAL SUBJECT

Any legislation regulating surrogate motherhood contracts cannot exclude abuses to the detriment of surrogate women.

In the contractual models that are publicly available[139], some common features emerge. These deprive

[138] For the list of countries where surrogate motherhood is permitted, see Piersanti V, Consalvo F, Signore F, Del Rio, A, Zaami S. *Surrogacy and “Procreative Tourism”. What Does the Future Hold from the Ethical and Legal Perspectives?* Medicina 2021, 57, 47. https://doi.org/10.3390/medicina57010047

[139] Reference is made, by way of example, to the model contract in force in the State of California. Allen AA. *Surrogacy and Limitations to Freedom of Contract: Toward Being More Fully Human. Harvard Journal of Law & Public Policy,* 2018.

the surrogate woman of all rights over the child[140], the real subject of the contract, the sale or transfer of whom, however, is explicitly denied because it is in clear violation of the rules of any State[141], of any international human rights Treaty, and especially of the Optional Protocol to the Convention on the Rights of the Child on the sale of children, child prostitution and child pornography[142].

Some of the most worrying clauses are those detailing the wishes of the intended parents, who can control the details of the surrogate's private life until the moment of birth, including physical exercise, lifestyle, diet, travel, and in some cases, they can ask the woman and her husband, if she has one, for an explicit commitment not to establish any parental relationship with the child.

The contracts also include detailed information about the woman's sexual life, in serious violation of the very personal right to sexuality, requiring the surrogate not to have any sexual or intimate relations with anyone, or to have them only with a partner who undergoes certain medical tests and after the approval of the intended parents.

These contracts also allow for a constant violation of all confidentiality rules regarding information on the surrogate woman's personal health, both physical and psychological, with direct access for the intended parents to all of her medical records, even in countries with strict regulations on this matter.

Another recurring clause concerns the termination of the contract and the absolute right of the intended parents to demand an abortion without the need of any justification. This right may also be exercised to choose the sex and, more frequently, in the case of genetic abnormalities or malformations in the unborn child and in the case of supernumerary embryos.

In the event of an inauspicious or fatal pregnancy outcome, the intended parents have the right to decide on the possibility of keeping the woman alive (if her vital functions depend on a machine) for as long as the foetus needs to have the necessary chance of survival, leaving the family the right to decide on any further intervention on the woman only after the birth of the child.

If she breaches the contract, in whole or in part, the woman is required to return any payment received and to pay compensation for all damages[143].

It follows that the surrogate motherhood contract concerns two objects, and more precisely two subjects that are, *de facto*, reified: the woman's entire body for the whole duration of the pregnancy, which becomes an incubator, and the child, who becomes an object of sale or “donation”.

The children, therefore, become an asset that is “available” before (through the right to selection or

---

[140] The term “mother” does not appear on any of the forms and the surrogate must declare that she is fully informed and that she does not intend to assert any parental rights; she must agree to undergo the numerous medical and psychological tests and screenings.

[141] In the California example, sections 181 and 273 of the Criminal Code prohibit the sale of children or coercion to hand over one's child to another person.

[142] **Optional Protocol to the Convention on the Rights of the Child on the sale of children, child prostitution and child pornography**, (concluded in 2000 and approved by the Federal Assembly in 2006). *Art. 1: States Parties shall prohibit the sale of children, child prostitution and child pornography in accordance with the provisions of this Protocol. Art. 2: For the purposes of this Protocol, a) “Sale of children” shall mean any act or transaction involving the transfer of a child from one person or group of persons to another person or group of persons in return for payment or for any other service.*

[143] These expressly include damages for breach of the contract, compensation for the costs of assisted procreation techniques, intermediaries fees, drugs and travel expenses, as well as all costs for the care and upbringing of children until they reach the age of majority.

suppression) and after birth (through their "transfer" from the persons who conceived them, from the persons who carried them in the womb, to the persons who commissioned them[144]), without any form of legal protection and at the mercy of the wishes of the intended parents who, in fact, decide on their life or death.

What has just been described is also part of a difficult interweaving of different cultural backgrounds between the intended mother and the surrogate, which often condition the entire relationship, beyond the complex contractual aspects on which it seems to be based in the eyes of a rational and "neutral" observer, not directly involved in the two mothers' painful choices and therefore emotionally unbiased and detached.

There are indeed values that influence the existence, thoughts and choices of each of the two women, and go well beyond the simple scientific aspects. Therefore, these values do not allow to separate the cultural and ideological aspects underlying the concepts of motherhood, parenthood, rights, justice, fairness, equality, free choice and contractual duties with an agency[145].

RISKS FOR THE SURROGATE MOTHER

Scientific literature provides data on the consequences for the woman involved in the various

[144] The child may have up to five "parents", none of whom are fully parents in the proper sense: the "intended" parents, the biological parents from whom the fertilised ovum and the spermatozoon came, and the surrogate mother, who gave birth to the child. There are also cases where the intended parents may order twins born from two different fathers (https://www.dailymail.co.uk/femail/article- 6636879/Baby-twins-two-DIFFERENT-fathers.html).

[145] This is made clear in an interesting examination of the problem recently published by Swedish and Latvian authors (Payne JG et al. *Surrogacy relationships: a critical interpretative review*. UPSALA J MED SCI 125: 183–191, 2020), which, among other things, was able to simplify this particularly complex framework summarising it in the table below:

RELATIONSHIP	CONTACT	EXPECTATIONS	EXCHANGE	CONTEXT
Open	Regular, caring, intense, spontaneous, based on repeated face-to-face meetings, with few or no intermediaries.	Fulfilled by both parties.	Exchange of emotions (love, solidarity, experiences, joy, friendship), as well as gifts or money.	Mostly (but not exclusively) in contexts where power disparities are absent.
Restricted	No contact or sporadic contact, except where the surrogate lives with the intended parents.	Low expectations, sometimes due to lack of interest in the relationship by the surrogate mother, other times due to the intended parents' wishes.	Monetary compensation, with no space for renegotiating the terms.	Defined by power inequalities or structural conditions of surrogacy industry and reinforced by diverging cultural narratives.
Structured	Planned at regular intervals by phone/postcard during pregnancy and from time to time after birth.	Fulfilled to a large extent, based on contractual frames but relatively low, since the beginning, as to emotional and relational aspects.	The contract is structured as labour, which needs to be compensated with limited possibilities for renegotiation.	It has a strong cultural basis but, even more, a contractual one.
Enmeshed	Characterised by a tendency to expand the boundaries established in contract through a frequent, highly emotional relationship.	At least partially unfulfilled because they are divergent and/or based on a different cultural environment in terms of parenthood and surrogate motherhood.	Divergent visions of what is being exchanged: the surrogate mother expects much more for the "gift of life" from the intended mother, who is unable to understand or accept the cultural basis of such "extra-contractual obligations".	Based mostly on power inequalities and profound cultural differences.

surrogate motherhood procedures[146].

The first way in which the woman is involved is by selling her gametes (oocytes). This usually involves young women who are physiologically capable of ovulating and who receive high doses of exogenous gonadotropins, the possible complications of which (ovarian hyperstimulation syndrome[147]) are now documented in the literature[148]. In this regard, there are no absolute criteria for identifying patients at risk yet, nor preventive measures other than the suspension of the cycle. In addition to these, there are the risks associated with the oocyte retrieval procedure[149] and the long-term consequences for future fertility.

All of the above is normally presented to women, who are about to undergo an assisted procreation procedure that will lead them to have a child of their own, in authoritative medical centres that can guarantee constant monitoring and that provide correct and exhaustive information, based on which it is possible to give a conscious informed consent. On the contrary, the same does not apply to women involved in the sale of oocytes, who are induced to accept the fees promised by agencies or intermediaries without any real awareness of the possible consequences.

There are several risks for the surrogate mother.

First of all, it should be borne in mind that also natural pregnancy is subject to risks that are underestimated by most people, and especially by the pregnant woman, because of the strong motivation behind conception[150], and serious complications can occur during pregnancy (e.g. pulmonary embolism, pre-eclampsia or gestational diabetes) or during the delivery (e.g. haemorrhage or sepsis). The in vitro fertilisation technique also entails an inherent risk of pre-eclampsia[151], aggravated by the fact that the father's sperm is not “known” to the mother's intimate environment[152], and of ectopic pregnancy[153], especially if more embryos are implanted to increase the success rate[154].

The risks for the mother are also linked to other potentially harmful elements in the preparation for pregnancy through hormone therapies that can have long-term consequences[155], in repeated prenatal

---

146 Risks described in the literature include: Ovarian Hyperstimulation Syndrome (OHSS), ovarian torsion, ovarian cysts, chronic pelvic pain, premature menopause, loss of fertility, cancers of the reproductive system, thrombosis, kidney failure, stroke and, in some cases, death. Women who carry a pregnancy with other women's oocytes have a higher risk of pre-eclampsia and hypertension.

147 For the definition, see **Annex 5: “Glossary”.**

148 Abramov Y et al. *Severe OHSS: an ‘epidemic’ of severe OHSS: a price we have to pay?* Hum Reprod 1999;14:2181–2183.; Vassiliadis A, Schillaci R, Sciacca GR, Catalano G. *La Sindrome Da Iperstimolazione Ovarica*, Rivista Italiana di Ostetricia e Ginecologia, 2006; Dobrosaljevich A, Rakic S. *Risk of gestational hypertension in pregnancies complicated with ovarian hyperstimulation syndrome.* J Pak Med Assoc. 2020 Nov;70(11):1897-1900.; Wei L et al. *Strangulated internal hernia following severe ovarian hyperstimulation syndrome: a case report.* Gynecol Endocrinol. 2021 Jan;37(1):93-96.

149 Aragona C et al. *Clinical complications after transvaginal oocyte retrieval in 7,098 IVF cycles*. Fertil Steril. 2011 Jan;95(1):293-294.; Liang T et al. *Impact of class III obesity on outcomes and complications of transvaginal ultrasound-guided oocyte pickup.* F S Rep. 2020 Aug 27;1(3):270- 276.

150 For example, in Finland, maternal mortality, although it has decreased over time, is still around 28 cases per 100,000 pregnancies (Karalis E et al. *Decreasing mortality during pregnancy and for a year after while mortality after termination of pregnancy remains high: a population-based register study of pregnancy-associated deaths in Finland 2001-2012.* BJOG. 2017 Jun;124(7):1115-1121).

151 Shevell T et al. *Assisted Reproductive Technology and Pregnancy Outcome* (2005) 106 (5 Pt 1) Obst Gynecol 1039–45.; Blázquez A et al. *Is oocyte donation a risk factor for preeclampsia? A systematic review and meta-analysis*. J Assist Reprod Genet. 2016 Jul;33(7):855-63.

152 Hodson N et al. Removing Harmful Options: *The Law And Ethics Of International Commercial Surrogacy*. Med Law Review. 27(4): 597–622, 2019.

153 Smith LP et al. *Risk of Ectopic Pregnancy Following Day-5 Embryo Transfer Compared with Day-3 Transfer.* (2013) 27(4) Reprod Biomed Online 407–13.

154 Charles S and Shivas T. *Mothers in the Media: Blamed and Celebrated – A Examination of Drug Abuse and Multiple Births.* (2002) 28(2) Pediatric Nursing 142–45.

155 Gökçe M et al. *Long term effects of hormone replacement therapy on heart rate variability, QT interval, QT dispersion and frequencies of arrhythmia.* Int J Cardiol. 2005, Vol.99(3), p.373-379.

tests during pregnancy, in multiple pregnancies (due to the insertion of multiple embryos), which increase the risk of morbidity and mortality in proportion to the number of foetuses, foetal reduction surgeries[156] (where requested by the intended parents) and caesarean section[157], which is normally used in surrogate motherhood (under the contract).

In addition to these physical risks, the surrogate mother must also deal with psychological traumas[158], which are equally serious and are increasingly being studied in the scientific literature: the "surrender" and definitive loss of the child carried throughout the pregnancy, the suppression of natural feelings, such as maternal instinct and desire[159], the obligation to carry out foetal selection or to abort if the product of conception does not comply with the demands of the intended parents are the causes of serious depressive psychiatric diseases, with possible suicides, which the woman mostly ends up facing alone.

According to perinatal psychologists and obstetricians, the main psychological problem for the surrogate mother is that of "dissociated personality": on the one hand, the woman plans a medical intervention in order to improve her financial situation, and on the other hand, she feels like a pregnant woman who loves her unborn child and does not want to surrender him or her.

The psychological suffering of surrogate women is not explained by cultural reasons, but by the natural bond originating from hormonal chemistry and favouring an attachment between the mother and the child, milk secretion and, as a natural consequence, the survival of the species[160].

This natural bond, which is the foundation of life itself, is not present in surrogate motherhood and entails entirely new consequences in the legal sphere, subverting the principle of "*mater semper certa*", according to which the woman who gives birth is the mother, and thus separating filiation from birth.

This contradiction in terms gives rise to an increasing number of disputes over the attribution of motherhood in cases of uterus for rent.

In this context, there is a general legal issue as to whether there is a **blood relation** between surrogate children born from the ova of the same woman or the sperm of the same man and the surrogate child and the natural children of the surrogate mother.

The biological basis of blood relations is the shared genetic identity, which is biologically transmitted by the gametes and allows to identify the owners thereof (whether known or unknown) as first-degree

156 Evans MI et al. *Fetal reduction: 25 years' experience.* Fetal Diagn Ther. 2014;35(2):69-82.

157 Hovav A. *Cutting out the surrogate: Caesarean sections in the Mexican surrogacy industry*. Soc Sci Med.2020 Jul;256 113063. doi: 10.1016/j.socscimed.2020.113063. Epub 2020 May 19.

158 Psychological conditions of stress and tension increase the likelihood of developing gestational diabetes, high blood pressure and/or placenta praevia. Douglas AJ. *Mother-offspring dialogue in early pregnancy: impact of adverse environment on pregnancy maintenance and neurobiology*, Prog Neuropsychopharmacol Biol Psychiatry. 2011 Jul 1;35(5):1167-77.

159 Perinatal psychologists refer to the "nesting syndrome" as the period of pregnancy when there is a strong desire to prepare the house (the nest) for the imminent arrival of the babies, projecting them into the environment that will host them. The surrogate mother will therefore have to struggle with the awareness of the duality of the situation and come to realise the loss she will have to bear.

160 The Hague Conference estimated that 50 percent of surrogates are illiterate and accept surrogate motherhood unconsciously or under the pressure of family men, for economic reasons. When the baby is taken away, they sometimes go mad, as documented by human rights NGOs, and are often never readmitted to the villages. HCCH, *A preliminary report on the issues arising from international surrogacy arrangements* March 2012.

blood relatives of the newborn child, and any other children born from gametes of at least one of the biological parents as second-degree blood relatives.

In the case of partial surrogate motherhood (pregnancy commissioned by the intended mother through the use of her husband's sperm with the surrogate's ovum) there is a blood relationship between the surrogate and the child, because the surrogate is, *de facto*, also the biological mother of the newborn child.

The case of gestational surrogate motherhood is different, because there is no specific genetic relationship with the newborn child. However, the close and very special maternal-foetal relationship, of which science has shown the profound influence on both the mother and the child, cannot be considered irrelevant either since it leaves its traces in the unborn child as a kind of psychic *imprinting*.

With regard to the unborn child, the surrogate woman cannot be compared to a simple incubator because, through conscious and unconscious maternal bonds, she will be decisive in the process of psycho-physical development of the newborn child. Therefore, although the "gestational mother" cannot be defined as a "genetic mother" or a consanguineous mother, she plays a typically parental role and can be described as a "non-consanguineous mother".

With the surrogate motherhood contract, unlike the case of a sperm donor - who, with a clear inequality of roles based on gender, is recognised as the biological father - the mother, whether she is a partial surrogate or a gestational surrogate, suffers the cancellation of her function, and therefore she is granted no legal protection.

For these reasons, suffering and emotional destabilisation are for women inseparably correlated to the surrogate motherhood experience.

In order to overcome this psychological distress, specialised clinics adopt a professional approach aimed at avoiding any stress or negative emotion that might pose a risk to the surrogate's health and the pregnancy itself[161].

Therefore, from a bioethical perspective, the surrogate motherhood techniques clearly violate the founding principles of **beneficence/non-maleficence** and of **justice.**

RISKS FOR THE CHILD

Also with regard to the risks for the child, the real subject of the contract, the literature provides scientific support for identifying the heavy burden of risks and complications arising from surrogate motherhood[162].

[161] Stress and negative emotions cause an increase in adrenaline in the blood: its excess can cause tachycardia, high blood pressure and uterine hypertension (the main cause of miscarriage and preterm birth).

[162] Risks reported in the literature include premature birth, intrauterine death, insufficient weight, foetal malformations and high blood pressure (Woo I et al. *Perinatal outcomes after natural conception versus in vitro fertilization (IVF) in gestational surrogates: a model to evaluate IVF treatment versus*

The most serious risk concerns life itself, because of foetal reduction, whether spontaneous or at the request of the intended parents[163], preterm births or possible suppression in the event of malformations that make the child "no longer purchasable".

Moreover, in the current generalised legal vacuum, in the fertility centres of some countries[164] preimplantation genetic tests can be carried out to ensure that intended parents get the product they require, mostly in terms of sex, *de facto* "customising" the child to be purchased.

Due to the separation of the child from the mother who gave birth to him or her and with whom he or she has established a deep maternal-foetal bond (*cross-talk[165]*) since conception, which we have already extensively described, at birth the child suffers a state of psycho-physical stress that will have repercussions on his or her future harmonious development[166].

Indeed, as children grow up, they experience a documented "identity fragmentation" of their own "unity". Indeed, they perceive themselves as the result of a project that, since the beginning, does not involve a *continuum* between two persons and personalities physically and affectively close to them, but as an "assembly" of biological material from different individuals and at least kept partly separate from the children and from each other, represented by the biological parents (gamete donors), the intended parents - recently, sometimes even represented by two fathers requesting twins conceived with the sperm of each of them[167] - and the surrogate mother.

In addition, some forms of psychological distress may appear due to the surrogate mother's feelings of abandonment after delivery, as well as to the "purchase" by the intended parents[168].

In any case, it is clear that, sooner or later, the child will become aware of the violation of his or her dignity, of having been reified, i.e. downgraded to a mere object of a contractual and private relationship, devoid of any legal protection independently from the will of the intended parents.

Other cases, which are psychologically disruptive and humanly deplorable but at the same time sadly documented, are those in which the child is abandoned in the event of divorce of the intended

---

maternal effects. Fertil Steril. 2017 Dec;108(6):993-998). Further literature shows that assisted reproduction procedures have the potential to affect embryo quality and that their negative impact is unlikely to be overcome with a healthy uterine environment: Roseboom TJ, Eriksson JG. *Children conceived by ART grow differently in early life than naturally conceived children but reach the same height and weight by age 17. Reassuring? Not so sure.* Human Reproduction, Vol.36, No.4, pp. 847–849, 2021. There are also risks in terms of failure and success of extracorporeal fertilisation in the preimplantation phase, when embryos are placed in the endometrial cavity and not in the tube, in a site where *cross-talk* cannot take place. Such difficulties increase in the case of surrogate motherhood, being the oocyte completely foreign because it comes from a third-party donor (Simopoulou M et al. *Risks in Surrogacy Considering the Embryo: From the Preimplantation to the Gestational and Neonatal Period.* Biomed Res Int. 2018 Jul 17;2018:6287507. doi: 10.1155/2018/6287507. PMID: 30112409; PMCID: PMC6077588.).

163 Rejection of a foetus or baby by the intended parents can be motivated by a wide variety of reasons, ranging from any form of "imperfection" deemed as such, to malformations or diseases, to gender, even to lack of resemblance to one of the biological parents (see surveys published on this subject, including one by Samantha Hawley for ABC News (https://www.dw.com/en/surrogacy-a-murky-business/av-17841486; https://tvblackbox.com.au/page/2019/08/13/2019-8-14-foreign- correspondent-investigates-surrogacy-exploits-in-the-ukraine/)

164 One of these is California.

165 For the maternal-foetal bond, see the relevant paragraph of the chapter "**Motherhood and Parenthood**".

166 Golombok S, Blake L, Casey P, Roman G, Jadva V. *Children born through reproductive donation: a longitudinal study of psychological adjustment.* Journal of Child Psychology and Psychiatry. 2013 Jun;54(6):653-60. doi: 10.1111/jcpp.12015. Epub 2012 Nov 23. Bergman NJ. *The neuroscience of birth and the case for Zero Separation,* Publimed – National Center for Biotechnology Information, 2014.

167 https://www.dailymail.co.uk/femail/article-6636879/Baby-twins-two-DIFFERENT-fathers.html

168 Mackieson P. *Adoption Deception: A Personal and Professional Journey*. Melbourne. Spinifex Press. 2015.

parents[169] or has been deliberately "purchased" to be abused of[170].

A further health problem, which is often underestimated in the contractual context but important in legal and social terms, stems from the possibility that, if the intended parents do not reveal their rigins[171], the children may be deprived of valuable information[172] concerning their health and the possibility of treatment, thus incurring unknown or deliberately undisclosed health risks.

This would be a clear violation of all fundamental bioethical principles[173].

LEGAL PROTECTION OF THE CHILD

The legal protection of the child born through surrogate motherhood is a very important issue in case-law and international law.

The recognition of the newborn child and legal parenthood are currently debated[174], especially within the European Institutions.

Indeed, since 2015, the Permanent Bureau of the Hague Conference on Private International Law (HCCH)[175], supported by a geographically representative group of experts, has been studying private international law issues relating to the legal parenthood of children and the provisions on international surrogate motherhood, also with a view to preparing a future Convention on this subject[176]. The main common standpoints of this work include the desire to prevent abduction, sale or trafficking in women and children in the context of surrogate motherhood, in the light of the **UN Convention on the Rights**

169 Parks JA, Murphy TF. *So not mothers: responsibility for surrogate orphans*. J Med Ethics 2018;44:551–554.

170 Bucci N. *Man pleads guilty to sexually abusing his twin surrogate babies*. The Sydney Morning Herald, 22 April 2016; Hawley S. *Australian charged with sexually abusing twins he fathered with Thai surrogate*. ABC News, 2 September 2014.

171 This is an intangible right since it concerns one's own identity. The *UN Convention on the Rights of the Child* (1989) recognises the right of every child to know their parents and be raised by them (Art. 7) and the right to preserve their identity (Art. 8). The Italian Court of Cassation (judgement no. 6963 of 20 March 2018) has stated principles of law regarding adoption, which are absolute and must be considered valid and applicable also for those born by means of Medically Assisted Procreation and Surrogate Motherhood techniques: *«The right to know one's origins is an essential expression of the right to personal identity. The balanced development of individual and relational personality is \achieved above all through the construction of one's own identity, both external, of which the name and the legally relevant and recognisable descendants are essential elements, and internal. This last aspect, which is more complex, may require the knowledge and acceptance of one's own biological descendants and closest relatives. The primary importance of the legal recognition of personal identity and the awareness of the wide variety of elements, including dialectical ones, of which it is composed, such as the right to know the truth about one's own personal history and the right to preserve the pre-existing construction of one's own identity and that of any third parties involved, has been the subject of the attention and incisive intervention of national and supranational Supreme Courts»*. It is worth noting that even in the most successful adoption cases, children often feel the need to know their roots in order to alleviate the pain of having been abandoned (although blamelessly) by the biological parent(s).

172 A distinction should be made between anonymity and secrecy: secrecy concerns the concealment of the techniques used for fertilisation, whereas anonymity consists in concealing the identity of those involved in the process of generating the newborn child (e.g. gamete sellers, surrogate mother, etc.). The right to know one's own biological origins can certainly be exercised in order to overcome anonymity, but is more problematic with regard to secrecy, given the repercussions that can be observed in the context of family relations.

173 In some countries, including the USA, unlike adoption applications, for which the birth parents are required to undergo screening and health checks, surrogate motherhood applications do not require any checks for the biological parents and, once born, the child has no way of knowing who donated the sperm, or the ovum, or who rented out their womb. The need to provide children with information about their biological parents is supported by some studies: McGee G, Brakman SV, Gurmankin AD. *Gamete donation and anonymity: disclosure to children conceived with donor gametes should not be optional.* Human Reproduction, 2001 Oct;16(10):2033-6. doi: 10.1093/humrep/16.10.2033

174 O'Callaghan E. *Surrogacy reform and its impact on the child's right to birth registration*. Reprod Biomed Soc Online. 2021 Jun 17;13:46-50. doi: 10.1016/j.rbms.2021.06.001. PMID: 34258448; PMCID: PMC8256001.

175 Hague Conference on Private International Law.

176 The Permanent Bureau of the Hague Conference on Private International Law has received this mandate from the Council for General Affairs and Policy of the Hague Conference. Latest report of the works: 2019: Report of the October/November 2019 meeting of the Experts' Group on Parentage / Surrogacy (6th meeting).

of the Child (1989) and its Additional Protocols[177].

The problem is not easy to solve because of the conflict between two interests that both deserve protection under the legal system: on the one hand, there is the child's right to be protected by legal recognition of parenthood, regardless of the method of conception and birth; on the other hand, there is the need to discourage and prohibit the practice of surrogate motherhood in order to protect the dignity of the woman and the newborn child from a new form of exploitation.

The risk of indirectly legitimising this practice through the recognition of children, which has also been feared by HCCH in its works, is at the basis of some decisions against the transcription of birth certificates referring to the parenthood of children born through surrogate motherhood in foreign countries.

Even the European Court of Human Rights does not impose the automatic recognition of any foreign judicial measures recognising dual parenthood for the members of the couple (heterosexual or homosexual) who have resorted to surrogate motherhood abroad[178].

There is therefore a need to assess and balance all the relevant constitutional rights and possible consequences.

In the context of bio-legal considerations, the CSB considers it particularly important to highlight, on the one hand, the fact that the protection of the "best interests of the child" cannot be used as an expedient to *de facto* legitimise or encourage reproduction practices prohibited by law. On the other hand, parental intention at the moment of conception cannot be enough to guarantee automatisms to be translated into new legal protections.

It is certainly up to the legislator to find an appropriate solution to put an end to the “impunity” often enjoyed by those who "commission" a child abroad, by avoiding the prohibitions of their own country[179].

Undoubtedly, it must be emphasised that the plurality of the above-mentioned abuses inherent in surrogate motherhood can be considered as undeniable prerequisites for presuming the parental unsuitability of the intended parents.

However, the role of the juvenile judge remains essential. He shall be responsible for assessing each

---

[177] In particular, the Additional Protocol to the United Nations Convention against Transnational Organised Crime to Prevent, Suppress and Punish Trafficking in Persons, Especially Women and Children (**“Palermo Protocol”**), 2000. See also the *Proposal for a Directive of the European Parliament and of the Council on combating sexual abuse, sexual exploitation of children and child pornography, repealing Framework Decision 2004/68/JHA, 2010.*

[178] A significant judgement, in this regard, comes from the Grand Chamber of the European Court of Human Rights - ECHR (24 June 2017. Paradiso and Campanelli v. Italy), which provided a final ruling on the appeal brought by the Italian State following proceedings, originally initiated by two spouses, concerning decisions adopted by Italian courts on surrogate motherhood. The case brought to the Court concerned the Italian authorities' failure to recognise the transcription of the birth certificate attributing the paternity of a child to two spouses who had resorted to surrogate motherhood. On this occasion, the Court found that, as demonstrated by the Italian authorities, there was no biological link between the child and the applicants in the case in question, and established the need for a basic biological link or legal adoption for the legal existence of a parent-child relationship.

[179] At present, the discrepancy between EU competences on citizens' right to freedom of movement and national competences on family law has worrying repercussions precisely in the field of transnational surrogate motherhood. There is indeed a real risk that the right to freedom of movement will oblige a Member State to recognise a situation deemed illegal by its own legal system, thereby *de facto* normalising the repeal of domestic laws and giving rise to two parallel legal systems.

situation on a case-by-case basis, in order to identify the one that truly guarantees all the relevant conditions for the child's balanced growth, from personal care to moral assistance, from health to education, from protection of financial interests to identification of the child as a member of a family, from emotional continuity to assumption of responsibilities.

Fundamental to this end is the 2014 UN Resolution on the protection of the family and its members, which recognises that the family has the primary responsibility for the nurturing and protection of children and that children, for the full and harmonious development of their personality, should grow up in a family environment and in an atmosphere of happiness, love and understanding, in the conviction that the family, as the fundamental group of society and the natural environment for the growth and well-being of all its members and particularly children, should be afforded the necessary protection and assistance, so that it can fully assume its responsibilities within the community[180].

These elements, guaranteed by a condition of family stability as part of the responsibility to support, educate and bring up the child, are the basis of the assessments in favour of the child's "best interests" that the Juvenile Judge makes in all other adoption applications.

Aware, therefore, that the claim of parenthood is not enough to ensure the good growth of the child, the CSB believes that all the above mentioned forms of protection should not represent *sic et simpliciter* any means for an *a priori* recognition of parental intention in the context of surrogate motherhood in the event that anyone, in an attempt to establish a sort of automatism between intentional and actual parenthood, intends to equate them with instruments legitimising what is formally prohibited and sanctioned.

In conclusion, the CSB hopes that action will be taken in all the appropriate fora, especially legislative and judicial, to recognise and protect in a uniform manner in national and international legal systems the rights of women and children who are subject to exploitation and commodification, in order to stop this modern disguised form of slavery.

[180] The **UN General Assembly Resolution on the protection of the Family and its members** (23 June 2014) has reaffirmed that: *«the family, as the fundamental group of society and the natural environment for the growth and well-being of all its members, and particularly children, should be afforded the necessary protection and assistance so that it can fully assume its responsibilities within the community».*In the WHO report Family as Centre of Health Development (March 2013) it is stated that *«Early childhood development, including social/emotional and language/cognitive domains, are determined by family conditions, and subsequently influence health. Adopting a life-course perspective directs attention to how social determinants of health operate at every stage of development - early childhood, childhood, adolescence, adulthood and on age - to both immediately influence health as well as provide the basis for health or illness during later stages of the life-course».*

VOLUNTARY TERMINATION OF PREGNANCY

The complex and delicate theme of voluntary termination of pregnancy[181], or elective abortion, is one of the most debated and controversial topics because of its many implications in every sphere[182], be it scientific, social, cultural, historical or moral. This theme can be approached from such a wide range of perspectives that it is difficult to cover it in a single, all-encompassing chapter.

The CSB has therefore chosen to highlight certain aspects of this theme, to which less attention is paid by public opinion and in the bioethical debate.

Moreover, the CSB has taken a purely bioethical approach to this subject, while respecting all the different opinions within society and the Committee itself, by identifying the fundamental principles underpinning the various perspectives, which are sometimes conflicting and sometimes reconcilable.

Indeed, Bioethics teaches us that a different distribution of its founding principles from a hierarchical point of view has different effects on choices.

In the first chapter of this document, the CSB described the concept of the human embryo starting from the biological aspect and ending with its ontological meaning. It pointed out that, although all philosophical and bioethical approaches recognise that the human embryo is not merely biological material but an organism belonging to the human species in the substantial sense, it is precisely the attribution of the status of person at different times that determines the strength of the moral obligation to respect and protect the human embryo.

The different positions concerning abortion derive precisely from whether or not this status is recognised from fertilisation or at other stages of embryonic development.

The ontological conception attributes to human life a value per se, independent of any other attribute, including age, quality of existence or capacity to exercise one's own rights.

The non-ontological conception, on the other hand, attributes to life a relative value, which is linked to the real capacity to make choices of individuals that are able to exercise their rights.

This first, fundamental element of assessment must be accompanied by that of the bioethical principle, which each individual chooses to place at the top of the value pyramid.

---

[181] It should be noted here that there is a difference between "voluntary termination of pregnancy" and "termination of pregnancy" understood as preterm birth, which may involve the survival of the child. In the event that, even following an elective abortion, the foetus has the possibility of independent life, in accordance with the **principle of beneficence/non-maleficence**, the doctor carrying out the procedure must take every appropriate measure to protect the life of the foetus, which should be eligible for adoption if the mother refuses to recognise it. On the subject of preterm birth and the bioethical issues of the perinatal end-of -life care, see the document **"Guide on the decision-making process regarding medical treatment in the end-of-life"** (2019), to which the CSB has dedicated a specific chapter (**"Perinatal palliative care"**).

[182] As regards the existing legislation in the Republic of San Marino on voluntary termination of pregnancy, worth mentioning is the Criminal Code in force, which, in Articles 153 and 154, considers abortion as a crime. Therefore, a propositive referendum to introduce and regulate voluntary termination of pregnancy in San Marino was recently held on 26 September 2021. The legislator will now have to amend the current criminal legislation and establish rules and modalities for the voluntary termination of pregnancy.

If the terms of the laws in force were to apply and **the principle of autonomy** prevailed, the woman would exercise her right to choose freely.

This position would therefore be very clear, since it would not lead to conflicts in the exercise of the principle itself, and any conflicts with other principles would also be resolved by giving priority to the principle of the woman's free decision[183].

If, on the other hand, **the principle of beneficence/non-maleficence** or **the principle of justice** prevailed, also the embryo would have to be taken into consideration, in addition to the woman, if the embryo was granted the status of person: this would result in a conflict between two right-holders.

In the case of the **principle of beneficence**, a choice is made between the health and life of the mother over the life and health of the child, if the two are incompatible.

In this case, it would be a “therapeutic abortion”, as the only means of saving the mother's life, since continuing the pregnancy would either lead to certain death of the mother or of both the mother and the child, or to a permanent worsening of the mother's health.

In this case, the ontological conception of human life *de facto* accepts the termination of pregnancy as the only means of saving the mother's life.

However, the concept of "therapeutic abortion" is often used with improper meanings, even when such as a tragic choice between the two lives is not made, and raises many bioethical issues inevitably linked to the subject of persons with disabilities[184], to which the CSB has devoted constant attention.

ABORTION AND PERSONS WITH DISABILITIES

In the last few decades, pregnancy has been increasingly experienced as a health risk situation, both for mothers and for the foetus. For this reason, the forms of protection for this period in women's lives are today nearly always provided in the health context.

Such an approach contributes significantly to a perception of pregnancy as a “period of health risk” for the mother and the unborn child, which, as a logical consequence, must end with the “production” of a “healthy” child.

As a consequence, upon taking charge of the pregnant woman, checking the foetus' health has become an established diagnostic practice and a family, medical and social expectation.

[183] In this regard, it is ethically appropriate to highlight the frequent conceptual error of referring to the use of abortion as a couple's autonomous choice, considering voluntary termination of pregnancy as one of the contraceptive systems, which actually use methods or devices designed to prevent conception, and, by extension, among birth control or fertility methods designed to prevent pregnancy (or to prevent implantation of the embryo after conception). This clear misunderstanding probably originates from a superficial examination of the consequence of an abortion, i.e. the non-birth of the child. On the other hand, it seems obvious to point out that the abortion choice, since it is only made after conception, cannot technically be considered a contraceptive method in any way. This clarification seemed necessary here in order to comply with the mandate to contribute to the promotion of a culture on this subject by attributing authentic meanings to human procreation and removing any distorting factors.

[184] See, in particular, the CSB document **“The bioethical approach to persons with disabilities”** (2013).

In other words, the conviction that all prenatal tests should be aimed primarily at detecting any foetal “malformations” has become firmly established in everyone's mind, and special legislation has been introduced to justify the possibility for the mother to terminate the pregnancy as a ''therapeutic abortion''.

The concept of malformation (present in many national legislations) has an inherent negative meaning, is extremely generic, in many ways arbitrary and discriminatory, and, as such, it covers a range of situations characterised by very diverse psycho-physical conditions.

The prediction of genetic anomalies, which indicate a variation in the components of DNA that produce effects or may produce effects, is something different.

If we consider the increased ability of prenatal testing to detect the genetic characteristics of the unborn child, we realise that levels of prediction about the future child have become an essential element of genetic counselling.

Unfortunately, with the exception of cases of detection of serious malformations (e.g. lack of head development), the level of prediction often provides generic information about the presence of a particular genetic anomaly, but fails to provide details about how the anomaly will interact with other characteristics of the unborn child.

One example among many[185] in this respect is offered by Stephen Hawking, which is particularly illuminating, since he was the most important cosmologist of the last 100 years[186].

This paradigmatic case highlights the fact that prediction cannot be based solely on health information relating to anomalies in the foetus, but must clearly indicate the elements that can guarantee the unborn child a high-quality life involving strong participation.

This example could be extended to numerous genetic anomalies which, thanks to correct, adequate information/training of parents and technical, technological and social support, do not prevent the person from facing life and gradually building a satisfactory future in a welcoming and supportive environment.

In addition to this consideration, particular attention must also be paid to epigenetics, a branch of science which in recent years has shown that a newborn child's genetic predispositions are not necessarily destined to fully develop if adequate preventive lifestyles are adopted[187].

It follows that, in the situations just described, the definition of "therapeutic abortion" is appropriate only in the case of a physical risk to the woman's health. It is, on the other hand, not applicable to the

[185] Other examples include several famous personalities, such as the painter Henry de Toulouse-Lautrec or Vincent Van Gogh, musicians such as Petrucciani, scientists such as John Nash Jr, to name but a few.

[186] Affected by ALS in adulthood, which is now predictable with diagnostic tests, he continued to work, got married and had children. In the last period, his functional limitations had become severe. He had a personal assistant 24 hours a day (he could no longer use his limbs for his personal autonomy), a joystick operated wheelchair (he could not move independently), and a computer controlled by eye movement (he could not communicate by voice).

[187] De Rosnay J. *The symphony of living. How epigenetics will change your life*. Vicenza, Neri Pozza editore, 2019.

cases in which it is not possible to treat the foetus but only to eliminate it.

The CSB believes that it is necessary for adequately trained personnel to guarantee appropriate and complete information, not only health information, in order to reduce the risk of stigmatisation of the unborn child on the basis of a limited and biased view of his/her characteristics[188].

The acceptance of a person with functional limitations who becomes disabled due to the barriers, obstacles and discrimination that society has created so far and continues to create is the theme that led to the approval of the **Convention on the Rights of Persons with Disabilities** (CRPD, 2006) by the United Nations General Assembly to «*promote, protect and ensure the full and equal enjoyment of all human rights and fundamental freedoms*».

Article 3, which identifies the principles on which CRPD implementation is based, emphasises that it is necessary to ensure «*respect for difference and acceptance of persons with disabilities as part of human diversity and humanity*»[189].

Article 10 emphasises that «*every human being has the inherent right to life*» and therefore institutions «*shall take all necessary measures to ensure its effective enjoyment by persons with disabilities on an equal basis with others*».

The discriminatory element is clear: although testing can be accurate (tests do not always ensure a precise diagnosis), the information provided to parents is almost always oriented, since it is based on a medical opinion of the issue, regardless of the concrete kind of functional diversity the unborn child may have.

In this respect, information is often provided to the mother or the couple in a very short time, and is already strongly oriented by purely medical contextualisation, without any further information that would allow a complete and realistic understanding of the foetus' future life condition.

A correct and complete form of counselling should also include the presence of parents and/or members of associations who are competent and trained in the specific functional diversity of that foetus and who are able to supplement the information provided by the doctor[190], thus enabling the woman or couple to give truly informed consent to the termination of pregnancy.

For this to happen, however, it is necessary to identify and complete an appropriate training process to develop the necessary bioethical competence of a sufficient number of individuals selected by the associations of persons with disabilities and their families.

The decision to terminate a pregnancy presupposes that all possible choices have been taken into

---

188 Article 3, paragraph b of the **Charter of Nice** ("Right to the integrity of the person") stipulates «*the prohibition of eugenic practices, in particular those aiming at the selection of persons*».

189 On this subject, the reference articles in the CRPD are: Article 3 - *Principles*, Article 10 - *Right to life*, Article 25 - *Health* - Paragraph 1 letters a), b) and d).

190 Barbuto R, Ferrarese V, Griffo G, Napoletano E, Spinoso G. *Consulenza alla pari (da vittime della storia a protagonisti della vita).* Comunità Edizioni, 2006.

account, bearing in mind not only the repercussions at the time of the abortion but especially the inner conflict that is often generated in the parents, first by the choice and then by the sense of guilt.

It is not possible to foresee with absolute certainty the psychological and social repercussions that a woman who makes such a tragic choice will have to face: personal and family resources, cultural and developmental level, past and future experiences are just some of the factors that cannot be defined with absolute certainty and that will affect her life following the decision to terminate a pregnancy.

The value of motherhood is the essential starting point to help women to make an informed choice that, as such, is more effective in achieving an overall healthier outcome of conception.

Therefore, the CSB considers it essential that society protects the fundamental values of motherhood and parenthood by supporting women (and families) through the elimination of as many social, economic and psychological obstacles as possible (including doubts, insecurity about the future, shame, etc.), which could lead to the termination of pregnancy.

VOLUNTARY TERMINATION OF PREGNANCY IN MINORS IN RELATION TO DECISION-MAKING CAPACITY

The minor's decision-making capacity in voluntary termination of pregnancy has several legal, psychological, social and bioethical implications.

The issue concerns, indeed, the application of the **principle of autonomy**.

Despite being classified as medical treatment, abortion inevitably entails treatment of the foetus' body, which leads to its suppression. Hence, by analogy with other situations such as disability or mental disorders, from which the specific condition of “minor” differs significantly, it is fundamental to raise the question of whether the decisions taken by a pregnant minor can be considered fully reliable.

For the purposes of this document, the CSB cannot provide an in-depth and exhaustive analysis of the matter, which, by its very nature, would require a necessarily extensive specific examination. It will therefore refer to San Marino legal system, according to which a child shall be subject to parental authority until the age of majority.

Parental authority is exercised by mutual agreement by both parents and, in the event of conflict on particularly important matters, either parent may resort to the judicial authority.

The Judge, in turn, has the possibility of hearing the minor over the age of fourteen and expressing a useful opinion in the latter's interest. The Magistrate can decide to attribute decision-making power to the parent that he considers most suitable[191].

This rule is part of an international context increasingly oriented towards the gradual acquisition of

[191] Art. 81 of **Law no. 49 of 26 April 1986** (**"Reform of family law"**), Republic of San Marino.

maturity and, therefore, of the minor's possible capacity to consent to medical treatment. The minor's opinion is therefore taken into account as an increasingly decisive factor in relation to age and capacity of discernment[192].

However, even within the same legal systems, different considerations emerge in practical application, which assign to the minor's will, to a variable extent, the value of a simple but reliable opinion or of a true and proper consent, or consider it complementary to that of the parents, or, finally, as exclusive. This shows that case-law continues to reflect the evolution of social opinion regarding the minor's capacity in the health sector, even within clear coordinates that, unfortunately, are still considerably wide-ranging.

The current pandemic has shown that, more and more often, in cases of disagreement between minors and their parents on treatment and, in particular, on vaccination, the minor's will has been recognised as preeminent, because, on the basis of scientific evidence, it can ensure the application of the **principle of beneficence**.

If this complexity of decision-making is evident for health treatments, it is even more evident for the termination of pregnancy, especially in cases where continued pregnancy is not incompatible with the health and life of the mother.

In case of conflict between the minor and the person exercising parental authority or guardianship, the judge shall not only examine, through qualified professionals, the actual maturity of the minor in terms of decision-making, but also make sure that all stakeholders are provided with exhaustive information on the consequences of each decision, not only from the physical but also psychological and legal point of view. He shall present the various options, such as the possibility of fostering and adoption[193], in the event that the final decision is to carry the unwanted pregnancy to term, in accordance with the **principle of beneficence and justice**, as an opportunity of life for the foetus.

THE ROLE OF THE FATHER

From the outset, the CSB has focused this document on the woman and emphasised that parenthood is the culmination of an adult's psychosexual development, a process which generates the capacity to create, protect, nurture, love, respect and experience pleasure for a being other than oneself. For women, pregnancy is one of the most challenging and indelible experiences in terms of physical, psychological, social and relational involvement, as it enables human beings to have another human being within them, and to establish an extraordinary intimate and caring relationship therewith.

It follows that the woman is the first person called upon to decide whether to bring to a successful conclusion an event which, taking place within her body, substantially changes not only many organic functions but also her self-image and her future life prospects.

[192] See the Convention on Human Rights and Biomedicine or Oviedo Convention, Art. 6 *"Protection of persons not able to consent"* and the UN Convention on the Rights of the Child, Art. 12.

[193] See footnote 181 for this information.

It is understandable, therefore, that the mother is mostly considered the sole right holder in this respect, on the basis of the **principle of autonomy**.

As noted above, the CSB's aim in this document is to explore the various aspects of parenthood, which is a broader concept than motherhood.

In this light, the mother should not be left alone when facing complex choices and situations that differ from case to case: also the father should always be involved and help the woman to face the extremely difficult decision on the future of the unborn child.

Indeed, since the circumstances in which conception took place are the precise responsibility of both parents, it would be extremely reductive and ethically unacceptable not to involve the father in the choices regarding the future of a life that he contributed to generating.

However, in the event of conflicting choices between the parents, the woman's will must prevail, beyond the considerations made at the beginning of this chapter on the different opinions linked to an ontological or non-ontological vision of life, on which the CSB has deliberately chosen not to open a discussion, in the awareness of the difficulties of reconciling convictions that are at times very strong and very different.

Men’s perspective on abortion has been fully incorporated into international recommendations and, on the basis of in-depth analyses, some authors suggest, among other things, the importance of offering emotional and educational support to fathers in the process of preparation for voluntary termination of pregnancy[194].

This approach has been fully transposed into the international obstetrics and gynaecology guidelines on pregnancy of adolescents, being the latter the most fragile subjects in relation to abortion, both in terms of pregnancy complications and of relatively poor affective and sexual maturity.

Indeed, based on clinical experience and expert opinions, international guidelines emphasise that the father should be involved as much as possible in the process of supporting the pregnancy and everything related to the health and survival of the unborn child[195].

However, while suggesting that the man should be present at some of the stages of the relevant medical or surgical procedure, the nursing services dedicated to voluntary termination of pregnancy remain almost entirely woman-centred[196].

However, the fact of not becoming parents unfortunately has a considerable emotional impact on both man and woman.

Since fatherhood, in particular, triggers a series of personal and social changes in the man that can

[194] Rodrigues MML, Hoga LAK. *Aborto espontâneo e provocado: sentimentos vivenciados pelos homens*. Rev Bras Enferm. Jan-Feb 2006;59(1):14- 9.
[195] Fleming N et al. *Adolescent Pregnancy Guidelines*. J Obstet Gynaecol Can. 2015 Aug;37(8):740-756.
[196] Lipp A. *Supporting the significant other in women undergoing abortion*. Br J Nurs. 2008 Oct 23-Nov 12;17(19):1232-6.

possibly lead to inner conflicts, he may experience abortion as the killing by the woman of a significant part of himself and thus be violently brought back to the anxieties of childhood and feelings of castration that sometimes result in anxious-depressive syndromes with a persecutory background and a variable psychosomatic expression. In fortunately rare cases, this can lead to real depression or serious behavioural disorders[197].

Indeed, abortion has a considerable impact on a man's self-image and on his relationship with his partner, due to the intervention of intrapsychic rather than family and biological factors, which have proved to be independent of the cultural context or the use of contraceptives.

The resulting unexpected emergence of ambivalent desires and conflicting needs would create tensions and conflicts within the couple[198].

Indeed, ambivalence is the most common response that emerges from the various studies on this subject, due to a mixture of pride and fear, happiness and dread, anxiety and excitement, which women and men share. When he perceives abortion as a wrongdoing that he cannot oppose, the man experiences a feeling of helpless pain, mixed with shame and depressive attitudes of isolation, lack of interest in the outside world and lack of future prospects[199].

Normally, the woman who decides to have an abortion should experience her dilemma not as a bilateral relationship between herself and the foetus but as a three-way interaction with the father, although the latter is often ignored by the entire social system.

In the light of the above, the **bioethical principle of the woman's autonomy** cannot disregard respect for the father, namely the other subject to whom the same principle applies.

It almost seems that the fact that the man is unaccustomed to freely expressing his feelings is at the basis of a totally female choice, but the danger that this cultural attitude entails is twofold: this means, on the one hand, passing the buck to the woman for an irreversible event, and, on the other hand, forcibly excluding the man from choices that will condition his social and personal life[200].

CONSCIENTIOUS OBJECTION

Among the many critical issues relating to the voluntary termination of pregnancy, the CSB consders it necessary to mention conscientious objection[201] for health professionals.

---

197 Benvenuti P et al. *Abortion and the man. Psychological and psychopathological manifestations in the face of lost fatherhood.* Riv Patol Nerv Ment. Nov-Dec 1983;104(6):255-68.

198 Naziri D. *Man's involvement in the experience of abortion and the dynamics of the abortion and the dynamics of the couple's relationship: a clinical study*. Eur J Contracept Reprod Health Care. 2007 Jun;12(2):168-74.

199 https://www.liberopensiero.eu/31/10/2017/attualita/societa/aborto-padre/; Kero A et al. *The male partner involved in legal abortion.* Hum Reprod. 1999 Oct;14(10):2669-2675.

200 Harris GW. *Fathers and fetuses.* Ethics. 1986 Apr;96(3):594-603.

201 Conscientious objection means, in the strict sense, a refusal to act positively against one's own opinions, and not a refusal not to act. The objection may arise from moral or religious reasons: moral objection is motivated by a precept of reason (*dictamen rationis*) with the exclusion of any religious precept (or of worship) and is the consequence of a judgement of conscience on the very nature of the act to which it refers; religious objection derives from a

Like any freedom, freedom of conscience has a positive aspect (guaranteeing the freedom to act) and a negative aspect (guaranteeing the freedom not to act).

In European international law, the right to conscientious objection is implicitly guaranteed as an aspect of freedom of conscience and religion in its negative dimension[202] and is recognised as a way of exercising freedom of conscience with respect to domestic legal systems, provided that «*the existence of a sufficiently close and direct nexus between the act and the underlying belief must be determined on the facts of each case*»[203].

In bioethics, the foundation of conscientious objection is the **principle of equality**, which is integrated by the **principle of non-discrimination[204].**

Conscientious objection, as is well known, may legitimately be used by a doctor who wishes to immediately stop participating in practices of voluntary termination of pregnancy, except in cases where the woman's life is in imminent danger.

The National Health Service is in any case required to ensure that this practice can be carried out in the various hospital facilities designated for this purpose. Therefore, if the staff recruited is entirely constituted by objectors, this shortage must be tackled in order to guarantee the service, in accordance with the procedures deemed most appropriate by the Health Directorates.

Moreover, the status of objector does not exempt the health professional from providing assistance before and after the intervention.

In the event of a massive presence of conscientious objectors, the residing citizens may find it difficult to have certain services provided. In this case, it is envisaged that national and international guarantee bodies institutionally intervene to ensure compliance with the rights that are threatened or not respected.

This is an example of the dual possibility of interpretation concerning the application of a principle. Indeed, if, on the one hand, respecting the right to abortion implies recognising the woman's right to exercise her freedom, on the other hand, respecting conscientious objection also implies respecting the same right to freedom of expression of a free choice, which in this case, however, concerns the

religious precept (or of worship) and implies an act of faith, it is not based on justice, but on the freedom of the person to comply with his/her own religious convictions. The State's obligations derive from this distinction: when the objection is moral, because it concerns an asset and opposes a derogation from a right or freedom, society must absolutely respect it; when the objection is religious or ideological, the State's obligation is to respect religious freedom.

202 The main references are to the **International Covenant on Civil and Political Rights** (Art. 18) and to the **European Convention for the Protection of Human Rights and Fundamental Freedoms** (Art. 9). These instruments guarantee «*Freedom of conscience and religion, which implies the freedom to have or follow a religion or belief of one's choice, to change it, as well as the freedom to manifest one's religion or belief*». The final act of the **Helsinki Conference** (1975) is explicit in the part that guarantees the right to act "*in accordance with the dictates of his own conscience*»: «*The participating States will respect human rights and fundamental freedoms, including the freedom of thought, conscience, religion or belief, for all (...) Within this framework the participating States will recognize and respect the freedom of the individual to profess and practice, alone or in community with others, religion or belief acting in accordance with the dictates of his own conscience*».

203 ECHR, *Eweida and Others v. the United Kingdom, § 82.*

204 When the refusal to act damages a third party, a person's beliefs, even if in the minority, must not be treated differently in the effective enjoyment of human rights.

operator and is opposed to the preceding one.

These two apparently contradictory elements need to be balanced by public authorities in the delicate task of conciliating conflicting rights, so that they can co-exist and be fully respected.

GENERAL BIBLIOGRAPHY

Piotrowska K, Zernicka-Goetz M. *Role for sperm in spatial patterning on the early mouse embryo*. Nature. 2001; 409(6819): 517-521.

Gardner RL. *Specification of embryonic axes begins before cleavage in normal mouse development*. Development 2001; 128; 839-847.

Pearson H. *Your destiny from day one*. Nature. 2002; 418(6893): 14-15

Bose et al. *Purified human early pregnancy factor from preimplantation embryo possesses immunosuppresive properties*. Am. J. Obstet. Gynecol. 1989; 160: 954-960.

Fazeli A et al. *Maternal communication with gametes and embryos: a complex interactome.* Brief Funct Genomic Proteomic. 2008; 7: 111-118.

Jaquet et al., *Dynamic change in adiposity from fetal to postnatal life is involved in the metabolic syndrome associated with reduced fetal growth*. Diabetologia. 2005; 48: 849-855.

Carbillon L et al., *Fetal placental and decidual-placental units: role in endocrine and paracrine regulations in parturition*. Fetal Diagn. Ther. 2000; 15:308-318.

Tyzio R et al., *Maternal oxytocin triggers a transient inhibitory switch in GABA signaling in the fetal brain during delivery*. Science. 2006; 314(5806):1788-92

Aceti F, Aveni F, Baglioni V et al., *Perinatal and postpartum depression: from attachment to personality.* A pilot study. J Psychopathol. 2012; 18: 328-334.

Raccomandazioni per l'assistenza alla donna vittima di violenza sessuale https://www.aogoi.it/media/6030/raccomandazioni-per-assistenza-alla-donna-vittima-di-violenza-sessuale.pdf

Mencacci C, Anniverno R*. La depressione post partum in Italia: fotografia del problema*. Documents of the National Conference of the Italian Society of Gynaecology and Obstetrics (SIGO). Rome, 2 April 2008.

https://www.fondazionegraziottin.org/ew/ew_articolo/Mencacci-Anniverno.pdf

Williams C et al. *Overcoming postnatal depression. A five areas approach* (edited by Mencacci C, Anniverno R.). CIC Edizioni internazionali. Rome. 2011.

Council of Europe, *Texts of the Council of Europe on bioethical matters.* Vol. II (DH-BIO/INF (2014) 5.

Flamigni C, Vegetti Finzi S. e Mengarelli M. *Volere un figlio: La nuova maternità fra natura e scienza*. Mondadori. Milan. 1997.

Flamigni C. *Avere un bambino. Come inizia una vita: dal concepimento al parto.* Mondadori. Milan. 2001.

Valentini C. *La fecondazione proibita*. Feltrinelli. Milan. 2004.

Ahmari Tehran H, Tashi S, Mehran N, Eskandari N, Dadkhah Tehrani T. *Emotional experiences in surrogate mothers: A qualitative study.* Iran J Reprod Med. 2014 Jul;12(7):471-80. PMID: 25114669; PMCID: PMC4126251.

Douglas AJ. *Mother-offspring dialogue in early pregnancy: impact of adverse environment on pregnancy maintenance and neurobiology*, in Progress in Neuro-Psychopharmacology and Biological Psychiatry, Volume 35 – Issue 5, Elsevier Inc. 2011.

Perucchietti E. *Utero in affitto, la fabbricazione dei bambini, la nuova forma di schiavismo.* rEvoluzione Edizioni. 2016.

Lahl J. *Eggsploitation*. Documentary by The Center for Bioethics and Culture Network. 2010.

Lahl J. *Breeders – A Subclass of Women?* Documentary by The Center for Bioethics and Culture Network. 2014.

Bergman NJ. *The neuroscience of birth and the case for Zero Separation.* Publimed – National Center for Biotechnology Information. 2014.

Allen AA. *Surrogacy and Limitations to Freedom of Contract: Toward Being More Fully Human, Harvard Journal of Law & Public Policy*. 2018.

Olza I**.** *Si quieres ser padre o madre por gestación subrogada necesitas esta información* (*Stop Surrogacy Now*).

Corea G. *The Mother Machine: Reproductive Technologies from Artificial Insemination to Artificial Wombs*. New York. Harper & Row. 1985.

Gheaus A. *The normative importance of pregnancy challenges surrogacy contracts*. *Analize—Journal of Gender and Feminist Studies*. New Series. Issue. 2106. No. 6. pp. 20-31.

Gillard J. 'National Apology for Forced Adoptions'. 2013.

Hawthorne S. *Medical wars against the less than perfect: The politics of disability*. Forthcoming in *Vortex*. Mission Beach. Spinifex Press. 2020.

Klein R. *Infertility: Women Speak Out about Their Experiences of Reproductive Medicine*. London. Pandora Press. 1989.

Klein R. *Surrogacy: A Human Rights Violation*. Mission Beach. Spinifex Press. 2017.

Lahl J, Tankard Reist M and Klein R. (eds.) *Broken Bonds: Surrogate Mothers Speak Out*. Mission Beach. Spinifex Press. 2019.

Laing L. 'Baby "twins" have two different fathers after gay couple were both able to fertilise an embryo of a surrogate mother'. *Daily Mail*. 27 January 2019.

Mackieson P. *Adoption Deception: A Personal and Professional Journey*. Melbourne. Spinifex Press. 2015.

Place F. *Portrait of the Artist's Mother: Dignity, creativity and disability*. Mission Beach. Spinifex Press. 2019.

Raymond JG. *Women as Wombs: Reproductive Technologies and the Battle over Women's Freedom*. Mission Beach. Spinifex Press. 1995/2019.

Rowland R. *Living Laboratories: Women and Reproductive Technologies*. Sydney. Sun Books. Available from Spinifex Press. 1992.

Saravanan S. *A Transnational Feminist View of Surrogacy Biomarkets in India*. Singapore. Springer. 2018.

Solis R. 'Los Vientres de Alquilar: La cara mas brutal del '"Gaypitalismo"'. Paralelo 36 Andalucía. 25 March 2017.

Taylor M. 'Gay parenting 'boot camp' moves to Asia to meet growing demand from China'. *Essential Baby*. 22 February 2019.

Wilson R, and Dodson M. *Bringing Them Home Report: Report of the National Inquiry into the Separation of Aboriginal and Torres Strait Islander Children from Their Families.* Australian Human Rights Commission. 1997.

Smolin DM. *The One Hundred Thousand Dollar Baby: The Ideological Roots of a New American Export.* Cumberland Law Review. Bepress. 2019.

Bindel J, and Powell G. 'Gay Rights and Surrogacy Wrongs: Say "No" to Wombs-for-Rent'. Stop Surrogacy Now. 2018.

Daily Mail Reporter. 'Last of the big spenders! Elton John 'paid £20,000' to surrogate mother for giving birth to second son Elijah.' 21 January 2013.

Ekman KE. *Being and Being Bought: Prostitution, Surrogacy and the Split Self.* North Melbourne. Spinifex Press. 2013.

Fisher L. 'Kim Kardashian West explains why she chose a surrogate for her third child'. ABC News. 14 March 2018.

Corradi L. *Nel ventre di un'altra.* Castelvecchi. Rome. 2017.

Corradi L. *Odissea embrionale.* Mimesis edizioni. Sesto San Giovanni, Milan. 2019. Rodotà S. *Utero affittasi.* Article published in *Panorama* on 5 November 1986.

ANNEX 1: THE CONCEPT OF "PERSON"

In contemporary philosophy, the notion of **person** is as varied and mutable as ever, so that it is rare to see it used in a univocal way. It ranges from the rejection of the very concept of person in naturalistic reductionism to the strong use of the category of person in ontological personalism.

In Latin, "persona" derives from *per-sonas*, "sounds through": it was the name of the theatrical mask that was also used as an amplifier, like a sort of megaphone (as in Japanese Noh theatre).

Stoicism used this term to indicate the man who, by a will of fate, must fulfil a role in the world.

In Roman law, the term "persona", as opposed to "res", was used to refer to man as a subject of rights, whereas things (including slaves) were not.

In Greek, the term comes from *pros-opon*: "looking towards", meaning that the person has always a perspective. This etymology indicates that every person is "prospective" vis-à-vis another one. A person is a face, and a face is a face only if it is "facing" another face. Person indicates a relationship with persons other than oneself.

Reflection on the person has therefore been carried out throughout the entire history of philosophy, but has imposed itself in a new way with the birth and development of bioethics.

The fundamental questions of existence (Who is a person? What constitutes a person? When does a being become a subject of rights?) are intertwined with the needs of scientific progress. In particular, the various discussions on the concept of person are related to the so-called **issue of the ontological status** of the embryo. In bioethics literature, this issue is based on three main models: the sensist approach, the anti-naturalist approach and the personalist approach, which is in turn divided into **functionalist-actualist** personalism and **ontological-substantialist** personalism.

SENSIST APPROACH

Some authors, such as Peter Singer, deprive the category of person of meaning because they believe that a person is only worthy of respect and protection when he or she is able to feel pleasure and/or pain.

This position has clear references to empiricism and in particular to the anthropology of David Hume, Jeremy Bentham and the eighteenth-century sensists.

Since conscious sensitivity requires the existence of the central nervous system, the supporters of the **sensist approach** recognise certain rights to adult animals, insofar as they are sentient, but not to human embryos, insofar as they do not yet have a central nervous system.

Singer's position goes so far as to affirm that persons with disabilities who require more support (considered "subhuman") do not belong to the human race, to the extent of considering their suppression to be legitimate.

ANTI-NATURALIST APPROACH

The various **anti-naturalist** approaches do not consider biological data relevant for defining the ontological status of the embryo, and they doubt that its ethical status can be based on empirical data.

Great importance is instead attached to the **existential meanings** that people give to the phenomena of their daily lives: these meanings do not come from the natural phenomena intended as they are, but are by definition cultural, i. e. the result of human action in contact with natural phenomena, which are processed in different ways by individual interpretation.

FUNCTIONALIST-ACTUALIST APPROACH

The functionalist-actualist approach aims at defining the person on the basis of the *signa personae*, i.e. some of his/her actions that are considered to be particularly qualifying.

Indeed, starting with Cartesian identification of personal reality with the thinking function performed by *res cogitans*, and even more so after Kant's critique of the philosophical category of substance (what exists in itself), there has been in modern philosophical thought a progressive shift from a substantial notion of the person in favour of the qualities that characterise him/her: thought, consciousness, freedom and relationship.

The *noumenon* is revealed only in the *phaenomenon* and the idea of substance il thus reflected in the idea of function[205].

In this perspective, the right to life starts from zero, it grows with the embryological development of the foetus, it reaches a peak after birth until maturity and before old age, and then declines together with the psychological changes of the elderly.

ONTOLOGICAL-SUBSTANTIALIST APPROACH

Ontological personalism seeks a substantial rather than an actualistic determination of being a person.

According to this approach, the *signa personae* are not ignored, but it is believed that the fact of being

[205] The distinction between "human being" and "person" becomes decisive for the regulatory conclusions: on the basis of the assumption according to which the person is identified by the presence of self-reflective capacities and a minimum moral sense that characterise his or her integrity, it follows that some human beings, such as persons with mental disabilities, embryos and patients in an irreversible coma are not persons. Conversely, one can imagine persons who are not human beings, such as God, angels and perhaps some species of higher mammals. See: Engelhardt HT. jr. *The Foundations of Bioetichs*, 126: *«Not all human beings are persons. Foetuses, infants, the profoundly mentally retarded and the hopelessly comatose provide examples of human non-persons. Such entities are members of the human species.*

a person, or even of becoming a person, cannot be discussed on the basis of empirical facts, but within an idea of the being and of the degrees of perfection reached by the latter.

This follows the classic line, which is not satisfied with a nominal or conventional definition of what the person is, nor with a description of his or her operations, but which seeks to grasp the constituent element thereof, to reach his or her ultimate truth and essential root.

The person possesses his or her *actus essendi*, which makes him or her ontologically incommunicable, and at the same time possesses an intentional communicability in the order of operating, that is to say, a transcendental openness to knowing, to loving, to engaging in dialogue, to Everything.

Ontological personalism does not ignore the somatic level (and therefore genetic and embryogenetic), but instead presupposes it, since the human individual substance is also corporeal: the biological individuality, starting from the moment at which it is established (at conception or later), begins to constitute the personal individuality of the *individuum subsistens*.

Ontological personalism manages to perceive the largest and most intimate aspects of the simple biological human being, since it sees the depth of the person as being rooted in biological individuality.

In this way of conceiving the person, the **human** being (understood in a biological sense) cannot be dissociated from being a **person** (the **human** being in a metaphysical sense), while respecting the distinctions between the various levels or strata of concrete existing.

One can speak of a **biological personalism** or better of an **ontobiological personalism**, in which the biological horizon is integrated by a relational ontology, so that what constitutes the essence of man as a person is coextensive, in his earthly experience, with the whole history of his vital organism.

THE NOTION OF POTENTIAL PERSON

In the approach of ontological personalism, it is possible to observe the distinction between **person** and **personality**, the latter meaning the progressive acquisition, from an operational point of view, of qualities that come from the essence of the person.

Becoming a person intended as the posession of one's ontological status is not a process, but an event. It means acquiring one's own *actus essendi*. The development and functional manifestation of one’s personal being is instead a process.

In Aristotle's metaphysics, **becoming**, precisely by virtue of the combination of potency and act, does not imply a passage from one reality to another, but is characterised by continuity, and potency is never indeterminate (see *Metaphysics* IX, 5, 1047b). An entity is potential (*dynamis*), when it is still lacking its own level of perfection or determination.

The notion of potential person is legitimate within the Aristotelian view, but it becomes incomprehensible and misleading in a different philosophical field. As Aristotle teaches, becoming is real, things change, and therefore what is ongoing is also potential, even if under a different aspect from the one for which it is ongoing. For this reason, every element of reality can become different from what it is.

Everyone can become other merely because, according to the simple law of continuous becoming, everything is transformed.

BIBLIOGRAPHY

Engelhardt HT. jr. *The Foundations of Bioethics.* Il Saggiatore. Milan 1999.

Esposito R. Le *Persone e le cose.* Einaudi, Turin, 2014.

Faggioni M. *La vita nelle nostre mani.* EDB. Bologna. 2016.

Maritain J. *The Rights of Man and Natural Law*. Vita e Pensiero. Milan. 1977.

Maritain J. *The person and the common good*. Morcelliana. Brescia. 2009.

Melchiorre V. *Corpo e persona.* Marietti 1820. Genova. 1991.

Palazzani L. *Il concetto di persona fra bioetica e biodiritto*. Giappichelli. Turin. 1996.

Singer P. *Practical Ethics*. Liguori. Naples. 1989.

ANNEX 2: PRENATAL TESTS

Most newborns (97%) do not have congenital anomalies, i.e. physical abnormalities present at birth. Some of these congenital anomalies are caused by chromosomal abnormalities, such as Down's syndrome.

As maternal age increases, the likelihood of chromosomal abnormalities also increases.

In order to detect such diseases before birth (prenatal diagnosis), two methods are used to diagnose with certainty whether the chromosomal set-up of the unborn child is normal or whether there are abnormalities, such as trisomy 21 ("Down's syndrome", three chromosomes 21 instead of two) or trisomy 18 ("Edwards' syndrome", three chromosomes 18 instead of two) and other chromosomal disorders. The first method consists of the sampling of chorionic villi (villocentesis) from the 11th week, the second one consists of the sampling of amniotic fluid (amniocentesis) from the 15th week.

Prenatal tests are recommended in the following cases:

- advanced maternal age (≥ 35 years);
- previous child with a chromosomal abnormality;
- previous child with physical abnormalities and unknown chromosomal make-up;
- partner carrying a balanced structural chromosomal abnormality;
- partner carrying a supernumerary chromosome marker;
- partner with chromosomal mosaicism;
- sex chromosome aneuploidies of either partner;
- foetal abnormalities and predictive ultrasound evidence;
- maternal serum biochemical tests that suggest an increased risk of chromosomal disease in the foetus;
- family history of genetic disease;
- family history of neural tube defects (such as spina bifida);
- other high-risk situations;
- consanguinity;
- failed pregnancies (recurrent miscarriage, intrauterine foetal death);

- maternal pathologies;
- teratological indications (drug intake, infectious diseases, exposure to radiation);
- infectious diseases occurring during pregnancy.

As already mentioned, the risk increases with maternal age.

For this reason, the National Health System gives women who are 35 years of age or older at the time of delivery the opportunity to undergo villocentesis or amniocentesis in public facilities free of charge.

It is clear that a chromosomal disease diagnosis does not allow any treatment to be carried out, but only informs the woman thereof, and she can terminate the pregnancy.

As these tests are invasive (ultrasound-guided insertion of a needle into the uterine cavity), there is a slight possibility (1% for amniocentesis and 2% for villocentesis) of miscarriage, even if correctly performed.

Prenatal diagnostic techniques can be invasive or non-invasive.

Non-invasive or **screening tests** do not pose any risk to the foetus or the woman, but only indicate the percentage probability of certain chromosomal abnormalities, in particular trisomy 21 (or Down's syndrome), trisomy 13 or trisomy 18 and sex chromosome abnormalities.

Invasive or **diagnostic tests**, on the other hand, allow the presence of DNA and chromosome-related abnormalities to be identified, but pose risks to the foetus and, in some cases, to the woman.

Non-invasive tests (ultrasound tests included)

- **Screening tests** are a series of examinations carried out on the population at low-risk for diseases. They are used to detect the presence in the population of signs that may change the risk factor.

  For example, in the case of screening tests for chromosomal abnormalities, a 20-year-old woman, who has a low risk level of foetal chromosomal abnormalities, might change her risk group following screening tests, and thus have the same risk level as an older woman. In this case, this 20-year-old woman is offered a free prenatal test (amniocentesis or villocentesis), which will either confirm or refute the suspicion of foetal disease.

- **Ultrasound**: a technique which makes it possible to monitor the development of the embryo and the foetus. It can be used as a guide for the sampling procedure carried out during invasive prenatal tests, as well as to detect the presence of malformations of extracardiac origin.

- **Nuchal translucency**: this new screening method was introduced a few years ago to assess the risk of chromosomal abnormalities and certain heart diseases. Nuchal translucency consists of an ultrasound scan carried out from the 11th to 14th week. During the ultrasound, a small layer

of fluid located behind the foetus' neck, between the skin and the underlying tissues, is measured. The thicker this layer is, the greater the possibility of a chromosomal disease (Down's syndrome) or of a heart disease or skeletal malformations. At the of the ultrasound scan, the result of the test will provide a statistical percentage of risk (e.g. 1 possible case out of 1000 or 1 possible case out of 100). Nuchal translucency can identify about 75-80 % of affected foetuses and has a false positive rate of 5% (for every 30 positive examinations, one is actually not affected). When the translucency measurement exceeds a threshold value of 2.5 mm, the patient can be referred to a level II prenatal diagnostic centre for further investigations (foetal echocardiography, morphological ultrasound). During the ultrasound scan, the presence of the foetus' nasal bone is also assessed. The presence of the nasal bone is an important factor that is included in the risk calculation and improves the sensitivity of screening tests (sensitivity about 90%).

- **Foetal echocardiography:** ultrasound examination to rule out simple or complex foetal heart diseases.

- **Biochemical analyses of the mother's blood** (*combined test, foetal DNA*): these tests allow to identify a possible risk of disease. The *combined test* also includes an ultrasound scan to assess the thickness of the *foetus' nuchal fold*, which, together with the results of the blood test, makes it possible to estimate the risk of certain chromosomal abnormalities.

- **Combined test**: this is a blood test that measures two substances (free βeta-HCG and PAPP-A). The result is entered into a programme and a risk level for Down's syndrome is calculated. The *BI TEST* (ultratest), combined with the nuchal translucency test, improves the sensitivity of the tests, and about 90% of affected foetuses are detected, with 5% false positives. The patient can have her blood taken for the *BI TEST* on the same day as the nuchal translucency ultrasound scan.

- **Foetal DNA:** During pregnancy, some fragments of foetal DNA circulate in the maternal blood. Cell-free foetal DNA consists of short DNA fragments (~145/200 bp) present in plasma in varying percentages, depending on the gestational period, and derived from placental trophoblasts. This DNA is detectable from the 5th week of gestation; its concentration increases in the following weeks and disappears immediately after delivery. The amount of foetal DNA circulating from the 9th to 10th week of gestation is sufficient to ensure the high specificity and sensitivity of the test. The test is performed by taking a blood sample from the pregnant woman whose gestational age is at least **10 weeks**. Through a complex laboratory analysis, cell-free foetal DNA is isolated from the plasma component of the maternal blood. Subsequently, through a technologically advanced process of **massive parallel sequencing** (MPS) of the **entire human genome**, using Next Generation Sequencing (NGS) techniques, the chromosome sequences of the foetal DNA are quantified through sophisticated bioinformatic analyses, in order to determine the presence of possible chromosomal aneuploidies (1-2-3-4-5-6-7-8-9-10-11).

What does a positive screening test mean?

The above-mentioned non-invasive screening tests are considered positive if they show a risk greater than 1 out of 350, i.e. there is a probability greater than 1/350 that the foetus will have chromosomal abnormalities. A positive screening test does not therefore imply the actual presence of a disease, but an increased risk index. In such cases, an amniocentesis can be performed, which will confirm or exclude the presence of chromosomal diseases. A negative screening test does not completely rule out the possibility of the foetus being affected by chromosomal abnormalities, but makes it very unlikely.

Congenital defects may also be unrelated to chromosomal disorders and therefore their presence is not detected by non-invasive tests or by amniocentesis and villocentesis. For this reason, foetal morphological assessment by ultrasound scans at later gestational ages (18 - 23 weeks) is essential.

When should a screening test be carried out?

A screening test is recommended:

- if the patient is willing to accept a result of probability and not of certainty;
- if the patient is willing to accept a possible invasive examination should the screening test indicate an increased risk.

A screening test is not recommended if the patient wants to obtain a more certain diagnostic result. In this case, only invasive examinations (villocentesis or amniocentesis) can provide a certain diagnosis.

Invasive diagnostic tests

- **Villocentesis** or chorionic villus sampling: this test is carried out after the 10th week by introducing, under ultrasound control, a needle through the mother's abdomen to collect chorionic villus cells and examine them. It allows early determination of blood group, foetal karyotype, typing of infectious agents and monogenic diseases, as well as possible DNA abnormalities. This procedure poses a risk of miscarriage of 1% to 2% and a risk of preterm birth of up to 4%.

- **Amniocentesis:** it is performed by introducing a needle through the mother's abdomen to collect amniotic fluid containing cells from the foetus. It can be performed very early (12th - 14th week with an indicative risk of 5%), early (16th - 18th week with a risk of 0.2-1%) or late (20th - 26th week with an indicative risk of 2% related to rupture of membranes) in the pregnancy. The examination is aimed at searching for the so-called *karyotype* (chromosome map) in order to detect possible chromosomal abnormalities. Possible risks: miscarriage (between 0.5-1.0%), rupture of membranes, direct foetal damage, neonatal respiratory distress, maternal-foetal transmission of infectious agents, foetal-maternal haemorrhage, amnionitis, uterine contractions, rare blood loss, up to 4% percentage of preterm deliveries.

- **Cordocentesis or funicolocentesis:** it is carried out after the 16th-18th week by inserting a needle into the skin of the mother's abdomen until it reaches the blood vessels of the umbilical cord in order to take a sample of foetal blood. The examination is aimed at assessing congenital haemostatic defects, foetal haematologic diseases (anaemia, thrombocytopenia...), acid–base balance of foetal blood, rapid karyotype, foetal infections. This procedure poses a risk of miscarriage of about 2%, which is higher than that of villocentesis and amniocentesis, and possible additional complications, such as bleeding, foetal bradycardia, infection and foetal-maternal haemorrhage. It can also be used to confirm unclear genetic pictures on both villi and amniotic fluid examination.

- **Foetoscopy**: it is performed after the 18th week by introducing a microendoscope, under ultrasound control, through the maternal abdomen to view small portions of the foetus in the amniotic cavity. Biopsy forceps are used to take biopsies (skin and liver tissue) and blood samples. This procedure poses a risk of preterm birth and miscarriage of about 6%.

- **BIBLIOGRAPHY**

Ribatti D et al. *Medawar and the discovery of acquired immunological tolerance*. Immunol Lett. 2015 October; 167 (2): 63-6.

Bischof P et al. *A model for implantation of the human blastocyst and early placentation*. Hum Reprod Update. 1996 May-June; 2 (3): 262-70.

Hunziker RD et al. *Placenta as a selective barrier to cellular traffic.* Immunol. 1984 Aug;133(2):667-71.

Bianchi DW et al. *Fetal sex chromosome testing by maternal plasma DNA sequencing: clinical laboratory experience and biology*. Obstet Gynecol. 2015 Feb;125(2):375-82.

Bianchi DW et al. CARE Study Group. *DNA sequencing versus standard prenatal aneuploidy screening.* N Engl J Med. 2014 Feb 27;370(9):799- 808.

Rava RP et al. *Circulating fetal cell-free DNA fractions differ in autosomal aneuploidies and monosomy X.* Clin Chem. 2014 Jan;60(1):243-50.

Bianchi DW et al. *Maternal BLood is Source to Accurately diagnose fetal aneuploidy (MELISSA) Study Group. Massively parallel sequencing of maternal plasma DNA in 113 cases of fetal nuchal cystic hygroma.* Obstet Gynecol. 2013 May;121(5):1057-62.

Futch T et al. *Initial clinical laboratory experience in noninvasive prenatal testing for fetal aneuploidy from maternal plasma DNA samples*. Prenat Diagn 2013, 33, 569–574.

Srinivasan et al. *Noninvasive Detection of Fetal Subchromosome Abnormalities via Deep Sequencing of Maternal Plasma*. American Journal of Human Genetics 2013, 92:167-176.

Bianchi DW et al. *Genome-wide fetal aneuploidy detection by maternal plasma DNA sequencing.* Obstet Gynecol 2012; 119:890–901.

Noia G. *Le cure prenatali. Nuovi percorsi di risposte alla diagnosi prenatale patologica.* Falco Editore. 2016.

ANNEX 3: MEDICALLY ASSISTED PROCREATION TECHNIQUES

According to the 2016 *Assisted Reproductive Technology National Summary Report*, 50 million couples worldwide, equivalent to 10-15%, suffer from infertility[206].

The female factor in infertility is important and affects 38% of cases, as opposed to 32% of the male factor (17% of cases depend on both factors and no specific cause can be identified in the remaining 12%).

43% of female causes are represented by a diminished ovarian reserve, 22% by ovulation disorders, 16% by tubal dysfunction/pathology, 11% by endometriosis and 8% by uterine problems.

Male infertility, on the other hand, is due to infections of the urogenital tract (37%), varicoceles (25%) and endocrinopathies (16%), and no specific cause can be identified in 22% of cases[207].

Moreover, even the analysis of the seminal fluid, although it is the standard in this regard, does not allow to reliably predict the likelihood of conception, given that the percentage of normal spermatozoa is usually only 3-4%[208].

What is surprising, however, is that 30% of fathers-to-be do not undergo a proper andrological examination[209] and simple endocrinological tests, which would allow an immediate diagnosis to be made and the problem to be solved at its source with an effective and often only medical treatment[210].

The first case of reproductive technology dates back to 25 July 1978, with the birth of Louise, the "test-tube baby".

Since then, techniques have evolved, reaching a particular sophistication with in vitro fertilisation with embryo transfer, which is useful in cases of tubal disease: the first stage consists of ovarian stimulation, followed by ovarian extraction and fertilisation of the oocytes in a tube (“in vitro”) containing spermatozoa. Several embryos are then formed, a selection of which is made for the subsequent implantation in the uterus.

There is also another technique, ICSI (*Intra-Cytoplasmic Sperm Injection*), which is particularly useful in cases of severe oligozoospermia (a male factor characterised by the impossibility of a very limited number of live and motile spermatozoa to reach the ovum and fertilise it).

Unfortunately, the web is full of advertisement for MAP techniques that promotes the possibility of doubling, and even quadrupling, the spontaneous pregnancy rate in women, who now get married at

---

206 Centers for Disease Control and Prevention, American Society for Reproductive Medicine, Society for Assisted Reproductive Technology. *2016 Assisted Reproductive Technology National Summary Report*. Atlanta (GA): US Dept of Health and Human Services; 2018

207 Milardi D et al. *Male fertility and reduction in semen parameters: a single tertiary-care center experience*. Int J Endocrinol. 2012;2012:649149. doi: 10.1155/2012/649149.

208 https://www.who.int/publications/i/item/9789240030787

209 Eisenberg ML et al. *Frequency of the male infertility evaluation: data from the national survey of family growth*. J Urol. 2013 Mar;189(3):1030- 4.

210 https://emedicine.medscape.com/article/436829-guidelines

later age[211].

This form of advertisement emphasises that the "success" rate depends on the possibility of stimulating the ovary to produce as many ova as possible, so that initial failure can be remedied by using other ova and, thanks to pre-implantation diagnosis, embryos with greater "development potential" can be selected to reach the live birth rate of around 20% of implantation cycles reported by the aforementioned *Assisted Reproductive Technology National Summary Report* (2016).

As a logical consequence, according to the 17th report of ESHRE (*European Society of Human Reproduction and Embryology*), the number of treatment cycles in Europe has continuously increased, which has contributed more and more to raise the birth rate in many countries.

However, precisely for this reason, the same report also suggests the need to standardise national registers and scientifically validate the methods adopted[212]. Indeed, according to data from the Italian Ministry of Health, the actual success rate of the various techniques only ranges between 7 and 13%, depending on the age of the women treated, and is very low (2-3%) in those over 43 years of age[213].

Ovarian stimulation techniques, which are always carried out at particularly high doses in the hope of obtaining the maximum outcome, often involve easily bearable problems for the woman, such as an increase in body weight and visceral adiposity and functional intestinal disorders. However, in addition to sometimes resulting in significant complications, which we have already mentioned in the text, they also increase the risk of gestational diabetes[214], gestational hypertension and placenta praevia[215].

Lastly, it should not be underestimated that immediate risks - such as premature birth, very low weight and even increased perinatal mortality - and late risks - such as abnormalities in glycidic metabolism and generalised vascular dysfunction - have been reported with MAP also for the child[216].

---

211 https://ivitalia.it/?gclsrc=aw.ds&utm_source=google&utm_id=go_cmp-1781987439_adg-126631480777_ad-555163634090_kwd-514037443112_dev-c_ext-_prd-_mca-_sig-CjwKCAjw5c6LBhBdEiwAP9ejG-jkOTlZi9T9quKLVgx_BuRgxQWocaTdci9F_3mrAbo-w7d5lb6TohoCc-kQAvD_BwE&utm_medium=cpc&utm_term=centro%20fertilit%C3%A0&utm_campaign=g%3A%20tratamientos%20-%20ia%20y%20reproducci%C3%B3n%20asistida&utm_content=fertilidad&gclid=CjwKCAjw5c6LBhBdEiwAP9ejG-jkOTlZi9T9quKLVgx_BuRgxQWocaTdci9F_3mrAbo-w7d5lb6TohoCc-kQAvD_BwE; https://ivfcube.eu/it?gclid=CjwKCAjw5c6LBhBdEiwAP9ejG9Np2n1v839SN53NDPFu4nLaCTg0Q4lATMCDY3iVvnKc0OPW4HX8HRoCckQQAvD_BwE; https://www.almares.it/dwqaquestions/?gclid=CjwKCAjw5c6LBhBdEiwAP9ejG3gloiMM9WbMjqB2H8eYPE0yAOQ39L7zVvgpABYbtssk5XqC9h_wtxoCz9AQAvD_BwE

212 Calhaz-Jorge C et al. *Assisted reproductive technology in Europe, 2013: results generated from European registers by ESHRE.* Hum Reprod. 32(10): 1957–1973, 2017

213 https://www.iss.it/documents/20126/0/14+Report_2020_dati+PMA_2018.pdf/75a615ee-3598-80c5-9b19-56939438b3b5?t=1606928964806

214 Bosdou JK et al. *Risk of gestational diabetes mellitus in women achieving singleton pregnancy spontaneously or after ART: a systematic review and meta-analysis*. Hum Reprod Update. 2020 Jun 18;26(4):514-544.

215 Nagata C et al. *Complications and adverse outcomes in pregnancy and childbirth among women who conceived by assisted reproductive technologies: a nationwide birth cohort study of Japan environment and children's study*. BMC Pregnancy Childbirth. 2019 Feb 20;19(1):77. doi: 10.1186/s12884-019-2213-y.

216 Kamphuis EI et al. *Are we overusing IVF?* BMJ. 2014 Jan 28;348:g252. doi: 10.1136/bmj.g252.; Hansen M et al. *Assisted reproductive technology and birth defects: a systematic review and meta-analysis.* Hum Reprod Update. Jul-Aug 2013;19(4):330-53.; Whitelaw N et al. *Epigenetic status in the offspring of spontaneous and assisted conception.* Hum Reprod. 2014 Jul;29(7):1452-8.; Meister TA et a. *Association of Assisted Reproductive Technologies With Arterial Hypertension During Adolescence.* J Am Coll Cardiol. 2018 Sep 11;72(11):1267-1274.

ANNEX 4: THE POSITION OF MONOTHEISTIC RELIGIONS

CATHOLICISM

General concepts on Catholic morality

The starting point of any moral discourse within the Catholic Church is the encounter with God, which takes place in Jesus of Nazareth, the Christ. This event is the foundation of every experience of faith.

The Magisterium of the Church is an indispensable element of the reflections that have been made on the experience of faith throughout the history.

The Magisterium of the Church has the task of preaching the faith to be believed and practised in life. This task also extends to the specific prescriptions of natural law, because their observance is necessary for salvation.

The Magisterium of the Church has always intervened in the field of bioethics. The Second Vatican Council invited all the faithful to *«let them blend new sciences and theories and the understanding of the most recent discoveries with Christian morality and the teaching of Christian doctrine, so that their religious culture and morality may keep pace with scientific knowledge and with the constantly progressing technology»*[217].

For the Christian, *«the decisive answer to every one of man's questions is given by Jesus Christ, or rather is Jesus Christ himself»*[218].

Therefore, Christian morality does not derive from a doctrine but is that inner dynamism that comes from God and attributes a divine purpose to natural ethical action.

Another characteristic element of Catholic morality is conscience.

Conscience is the judgement of reason, by which man assesses whether the action he is about to perform, or has already performed, is good or bad.

It is through conscience that man verifies whether the action he is about to perform or has performed is consistent with the Law, which requires him to live according to reason.

This is where man's personal identity is realised consistently with natural law. *«Conscience is not the source of good and evil; it is the call to conformity that an action must have with regard to a man's intrinsic need, so that man can be true and perfect. It is the subjective and immediate intimation of a law, which we must call natural, despite the fact that today many no longer want to hear about natural law»*[219].

[217] Second Vatican Council. *Pastoral Constitution "Gaudium et Spes",* 62.
[218] Pope John Paul II. *Encyclical Letter Veritatis Splendor*, (6 August 1993), 2.
[219] Pope Paul VI. *Allocution* of 12 February 1969.

Conscience, law and freedom are not opposed to each other, but together they contribute to the realisation of the person according to righteousness and to the promotion of collective justice.

We can therefore define conscience as the attitude and act of knowledge and discernment aimed at evaluating moral actions.

Abortion

The Holy Scriptures never speak of "elective abortion" but always emphasise the relationship between the human being from its very first moments and God the Father: *«Before I formed you in the womb I knew you... ».*

The sacredness and inviolability of human life is based on this personal relationship with God.

Christian tradition has always condemned abortion, and the Church's position has never changed, nor will it change, since the very value of human life is involved.

In his famous encyclical letter *Evangelium Vitae*, Pope John Paul II declared that *«direct abortion, that is, abortion willed as an end or as a means, always constitutes a grave moral disorder, since it is the deliberate killing of an innocent human being. This doctrine is based upon the natural law and upon the written Word of God, is transmitted by the Church's Tradition and taught by the ordinary and universal Magisterium»*[220].

The Pope not only refers to the Church's constant and unchanged tradition, but also bases the condemnation of abortion not only on the Holy Scriptures, but also on Natural Law.

The moral responsibility of those who perform abortion does not fall only on the mother, but also on those persons who influence or even force her, either directly or indirectly: these may be individuals, but also social institutions and/or State laws.

Doctors and nurses who directly carry out the intervention aimed at suppressing life bear a heavy responsibility.

With regard to the moral evaluation of abortion, Church tradition declares that elective abortion, for whatever reason, is always illicit and subject to canonical censure.

A different approach is taken in the case of an abortion that is not directly voluntary but accepted as an indirect and expected consequence of a lawful act. It is justified by the application of the so-called double effect principle.

This principle justifies an action that has two effects, one good and one bad, if the intention of the acting person is to achieve the good effect, if the good effect is not achieved through the bad effect, if there is proportion between the good effect desired and the bad effect tolerated, and if the bad

[220] Pope John Paul II. Encyclical Letter *Evangelium Vitae*, 62

effect cannot be avoided in another way.

Not even the so-called eugenic abortion, i.e. carried out in order not to give birth to a person with any kind of disability or genetic disease, is considered permissible.

Indeed, *«no one, not even the father or mother, can act as its substitute- even if it is still in the embryonic stage- to choose in the child's name, life or death. The child itself, when grown up, will never have the right to choose suicide; no more may his parents choose death for the child while it is not of an age to decide for itself. Life is too fundamental a value to be weighed against even very serious disadvantages»*[221]. Abortion cannot be justified even in the case of conception after rape, as the unborn child is, indeed, completely innocent.

Medically assisted procreation

A child is always a gift and can never be regarded as an object of right, even if the child could solve the parents' human, spiritual and psychological distress.

The moral assessment of medically assisted procreation is based on the ultimate meaning that Christian anthropology attributes to human procreation, namely the inseparable link between the transmission of life and conjugal love as personal, fecund and incarnate.

In this regard, the Congregation for the Doctrine of the Faith declares the following: *«In reality, the origin of a human person is the result of an act of giving. The one conceived must be the fruit of his parents' love. He cannot be desired or conceived as the product of an intervention of medical or biological techniques; that would be equivalent to reducing him to an object of scientific technology. No one may subject the coming of a child into the world to conditions of technical efficiency which are to be evaluated according to standards of control and dominion»*[222].

The procreation of a new person takes place in the context of conjugal love as the fruit and sign of the spouses' mutual self-giving, their love and their loyalty.

The act of procreation is performed by two persons who become, through love, *una caro, una persona coniugalis*, and therefore it can never be downgraded to a purely physical act.

It involves physical, psychic and spiritual dimensions of the person, with desire and acceptance[223].

The Congregation also adds that «a truly responsible procreation vis-à-vis the unborn child must be the fruit of marriage. For human procreation has specific characteristics by virtue of the personal dignity of the parents and of the children: the procreation of a new person, whereby the man and the woman collaborate with the power of the Creator, must be the fruit and the sign of the mutual self-giving of the spouses, of their love and of their fidelity. The fidelity of the spouses in the unity of marriage involves reciprocal respect of their right to become a father and a mother only through each

[221] Congregation for the Doctrine of the Faith. *De Abortu procurato,* 14.
[222] Congregation for the Doctrine of the Faith. *Donum vitae,* II B 4C.
[223] Ibidem, II B 4b

other. The child has the right to be conceived, carried in the womb, brought into the world and brought up within marriage: it is through the secure and recognized relationship to his own parents that the child can discover his own identity and achieve his own proper human development. The parents find in their child a confirmation and completion of their reciprocal self-giving: the child is the living image *of their love, the permanent sign of their conjugal union, the living and indissoluble concrete expression of their paternity and maternity. By reason of the vocation and social responsibilities of the person, the good of the children and of the parents contributes to the good of civil society; the vitality and stability of society require that children come into the world within a family and that the family be firmly based on marriage. The tradition of the Church and anthropological reflection recognize in marriage and in its indissoluble unity the only setting worthy of truly responsible procreation»*[224].

Recourse to artificial means of procreation is permissible only in so far as they are intended solely to facilitate the natural act or to ensure that a normally performed act achieves its natural objective.

All artificial procedures that replace an act, which is and must remain purely personal, and is a manifestation of the whole person, are deemed illicit and immoral.

In particular, in assessing heterologous fertilisation procedures, the condemnation is clear since they break the link between conjugal love and the transmission of life (as in all artificial fertilisation techniques), but also because they undermine the sense of procreation as an expression of the unity of the spouses, since the child originates outside the couple.

For the same reasons, gamete banks are ethically unacceptable. Similarly, surrogate motherhood is also considered immoral, whether or not it is carried out on a non-profit basis, with or without the use of gametes from the surrogate mother. The collection of sperm outside of a conjugal union is also immoral, as it dissociates conception from the embodied love of the spouses.

BIBLIOGRAPHY

Pope John Paul II. Encyclical Letter *Evangelium Vitae* (25 March 1995).

Congregation for the Doctrine of the Faith. *De Abortu procurato* (18/11/1974).

Congregation for the Doctrine of the Faith. Instruction *Donum vitae* (22/02/1987).

Congregation for the Doctrine of the Faith. Instruction *Dignitas Personae on Certain Bioethical Questions* (8/09/2008).

Faggioni MP. *Life in our hands. Manual of theological bioethics*. EDB. Bologna. 2016.

[224] Ibidem, A 1

General concepts on Islamic morality

The Koran (the direct and literal word of God), the *Sunna* (the collection of the Prophet's "sayings") and the *igma* (the community consensus) are the main sources of law and of the Islamic religion, which has no supreme legal-religious authority or magisterium to guide the faithful in situations for which there are no directives in the sacred sources.

When these do not express an opinion on the use of new diagnostic and therapeutic practices and techniques, the faithful are entitled to consult the doctors of Islamic law, who issue legal opinions (*fatawa*) that can be contradicted by other jurisconsults.

Even the rulings of collegial bodies (such as committees, Islamic academies, etc.), although of different legal value (resolutions, recommendations and legal opinions), remain essentially challengeable by other religious bodies.

In the absence of State legislations or rules regulating the use of specific practices and techniques, doctors could refer to legal/religious rulings legitimising or not a specific practice.

States are obviously the ones making the laws and are not obliged (except in a few cases) to transpose the rulings of national or supranational Islamic religious authorities, although these are usually taken into account.

Finally, the rulings of legal currents or schools (e.g. *hanafi*, *shafi*, *maliki* and *hanbali*) cannot be different with regard to the basics of faith, law and worship, but they can be different on everything else.

This may explain the number of disparate positions and assessments on abortion and MAP, of which we present an extremely simplified summary.

Abortion

The Koran and the Prophet's "sayings" contain numerous references to the beginning of human life. The most exhaustive reference is in Koran 63:12-14, which lists seven stages in the evolution of the embryo in the womb from fertilisation.

The last phase contains the expression "a new creation", which legal tradition connects with the infusion by God of the soul into the foetus.

Two phases of foetal development are thus distinguished, the first without a soul, and the second with a soul. Such distinction is relevant to establishing the legal qualification of the different acts of abortion, i.e. whether the act is permitted, blameworthy or prohibited under Muslim law.

The direct word of God (the Koran) does not specify when the infusion takes place. This information

is provided by several *ahadith* (“sayings” of the Prophet) the most authoritative of which is taken from the authentic Bukhari collection and would make the infusion coincide with the 120th day after fertilisation. There are also less authoritative “sayings” with earlier dates, e.g. 40 days.

There has always been substantial agreement among legal currents to prohibit (*haram*) procured abortion after the infusion of the soul (120 days after fertilisation or any earlier date), except in the case of a therapeutic abortion (to save the mother's life), since through the infusion of the soul the foetus acquires characteristics that require greater protection.

On the contrary, prior to infusion, legal positions on procured abortion have historically been conflicting, ranging from authorisation to deterrence to condemnation.

In Muslim law, there are two parallel interpretations of abortion. The first prohibits abortion from fertilisation, with the exception of therapeutic abortion. The second interpretation, which is the most widespread, emphasises the phases of embryonic development that coincide with the progressive increase in the severity of abortion.

The acceptance of therapeutic abortion derives from a specific judgement, shared by the majority of jurists, which considers the mother's value to be above that of the foetus, since she is an already developed life form and possible source of new life.

The law mainly punished the procured abortion of a live foetus (i.e. after 120 days or another date from the reception of the soul) that comes out alive (having shown signs of life) but dies soon afterwards, by means of the total blood money (pecuniary sanction or equivalent compensation), as in the case of murder of an adult individual. On the other hand, if after the infusion the foetus is stillborn, a reduced pecuniary sanction corresponding to 1/10 or 1/20 of the previous one is applied.

In the period prior to infusion, legal experts were more open and tolerant towards abortion, also because there was no agreement even on the obligation to pay blood money by that deadline.

Today, many people criticise the importance given to the notion of infusion. These are doctors inclined towards the radical rejection of abortion. They see abortion as an event that weakens the status of the embryo before infusion.

Under the *Shari'a*, intercourse is only permitted between spouses (up to a maximum of four wives) and between men and concubines. Any carnal relation between the two sexes that does not fall within these limits (i.e. both fornication and adultery) is considered a *zina* act, which is forbidden and for which punishment can be very severe.

With regard to the abortion of a foetus conceived during premarital or adulterous intercourse, or from rape by a Muslim or an infidel on a Muslim woman, legal experts’ opinions widely vary.

It became possible to detect foetuses with serious physical and/or mental disabilities thanks to prenatal diagnosis techniques (amniocentesis, ultrasound, foetoscopy, etc.), which were unknown to classical legal doctrine.

The opinions of today's “scholars” on the abortion of such foetuses ranges between limited approval and strict prohibition.

The laws of Muslim States may restore certain parameters of legal tradition regarding abortion. For example, some States maintain the legal criterion of infusion of the soul on the 120th day and/or earlier. A few countries have reintroduced measures concerning blood money (monetary compensation) to prosecute the termination of pregnancy.

The most controversial, or perhaps absent, aspects in legislations are still the handling of abortion in cases of rape, adultery, foetuses with severe disabilities, and the issue of the woman's and/or husband's consent.

An overview of State legislations reveals a variety of opinions, ranging from countries in which abortion is practically free (at least formally), such as Tunisia, to other where government regulations are strict and not very permissive (again formally), such as Egypt.

Finally, in almost all Islamic nations the scourge of clandestine abortion is present and often widespread.

Medically assisted procreation

The issue of procreation is still strongly inspired by Koranic family law.

According to the Koran, offspring are considered a divine blessing and procreation is one of the main purposes of marriage.

A woman's social role has always been conditioned by her ability to procreate, therefore infertility damages her position to the point of damaging her self-esteem.

According to Shari'a, the husband can choose to repudiate his spouse if she is infertile. On the other hand, when it is the husband who is infertile, Muslim law does not allow the woman to repudiate him.

However, in many of the legislations in force in Muslim States, since marriage remains a private contract, the woman may include clauses in her favour in the contract in order to obtain separation from an infertile spouse.

If they cannot procreate, the spouses cannot resort to adoption, as it is forbidden by the Koran 33:4-5: *«Allah has never put two hearts within one person's body; nor has He made your wives, whom you compare to your mothers' backs (zihar), your true mothers; nor has He made those whom you adopt as sons your own sons.These are only words that you utter with your mouths. But Allah proclaims the Truth and directs you to the Right Path! Call your adopted sons after their true fathers; that is more equitable in the sight of Allah. But if you do not know their true fathers, then regard them as your brethren in faith and as allies... »* (the term *zihar* indicates one of the modes of repudiation).

Only adoption as a reward or “testamentary” adoption is accepted. According to this, a family can

bring up a child, without, however, considering him or her as its own child, since he or she remains permanently linked to the family of origin.

Although the Koran prohibits legal adoption (today present in some States, e.g. Tunisia and Iran), at the same time the Word of God encourages the upbringing and education of orphans. Despite this, there is still a strong reluctance to opt for this humanitarian solution in societies.

Like contraceptive practices, which could only stop the procreative process if God wants it, also a pregnancy with means other than natural ones may not be considered an obstacle to divine creation.

Juridically, the term *zina* includes both fornication and adultery (both severely punishable), and at present *zina* acts include all heterologous artificial procreation techniques in which a stranger to the couple provides sperm, ova, embryos, uterus, etc., for whatever reason and at whatever time. Conversely, homologous practices both *in vivo* and *in vitro* are tolerated or accepted.

Since, according to Islam, the only legitimate filiation is related to the father, children born from intercourse between an individual and a woman who is not his wife (*zina* relationship) have no ties with the father and no right to the latter's inheritance. The illegitimate child has ties only with the mother and the maternal family.

This traditional approach has been modified in some contemporary legislations where a more important role is attributed to the legal mother.

The use of sperm banks is one of the disguised forms of adultery (*zina*) with the difference that the adulterer is unknown.

Even the use of human milk banks, with donations by different and unknown women, seems unlawful, since the infant would become related to unknown mothers.

Muslim “scholars” and doctors (with notable exceptions) generally agree on other specific issues: the donation of and trade in male and female gametes are prohibited; the transfer of the fertilised ovum to a “surrogate mother” is also prohibited in a polygamous context; the number of embryos transferred into the uterus must not exceed 3-4; excess fertilised ova can be cryopreserved, they belong to the married couple and can be transferred to the wife; research on pre-embryos should be limited to therapeutic research with the consent of the partners; research aimed at modifying the hereditary characteristics of the foetus is prohibited, including research aimed at choosing the sex of the foetus; Islam tolerates the reduction of a multi-foetal pregnancy when the chance of success is increased by the reduction of embryos or if the woman's health is at risk to complete a multi-foetal pregnancy.

The ban on the donation of sperm and ova by strangers to the married couple also prevails in *Shia* Islam (which includes about 15% of Muslims worldwide, especially in Iran, Iraq and Lebanon). However, some authoritative Iranian legal experts have considered the donation of female gametes lawful.

In a legal-religious context where positions are often far from those prevailing in the majority Sunni Islam, this led to the approval by the Parliament of the Islamic Republic of Iran of the donation of embryos by married couples to other married but infertile couples.

In the meantime, the Parliament has prohibited the donation of male gametes.

Surrogate motherhood is practised in the Islamic Republic and ova and embryos donation programmes have been set up in most clinics where IVF is carried out. The consequences include a commercial transaction with few rules and poor controls on donors and donation.

Essentially, the *Sunni* prohibition on the donation by a third party is weakened by the possibility of resorting to heterologous practices in *Shia* Islam.

The use of micromanipulation, especially the technique known as intracytoplasmic sperm injection (ICSI, microinjection of a spermatozoon directly into the oocyte through micropipettes), remains essential in Muslim States in cases of severe male infertility, as it is generally illegal to use sperm donors. The technique is supported by religious authorities and is regulated by law and/or practised in several countries.

BIBLIOGRAPHY

Atighetchi D. *Islamic Bioethics: Problems and Perspectives*. Springer. Dordrecht. 2007, pp. 375, ISBN: 1-4020-4961-7

Atighetchi D. *Islam e Bioetica*. Armando Editore. Rome. 2009, pp. 318, ISBN: 978-88-6081-334-3

Atighetchi D. *L'Inizio della vita nel diritto islamico*. In Atighetchi D. - Rabello AM. - Milani D. *Intorno alla vita che nasce. Diritto ebraico, canonico e islamico a confronto.* Giappichelli Editore. Turin. 2013, pp. 193-303, ISBN/ISSN: 9788834892640

General concepts on Jewish morality

Judaism is chronologically the oldest revealed religion, the oldest of the monotheistic religions.

Jewish religion is essentially based on the observance of a wide range of rules (*halakhà* = path, process) covering every aspect of human life, from the moment of conception (and even before) until the last breath and beyond.

The principles of Jewish medical ethics are based on the Torah, on the principle of the sacredness of human life, since man is created in the image and likeness of God.

Ethical judgements are very often formulated in legal terms.

There is a strong link between medical ethics and religion.

Jewish law operates and evolves on the basis of the authority of the past and of previous cases, with the Bible and the Talmud as ultimate foundation.

The basic principles of Jewish medical ethics could be summarised as follows: religious obligation to protect life and health; absolute sanctity of human life from birth to the final moment of death; trust in the opinion and skills of the competent doctor; dignity of man in death as well as in life.

The relationship between Judaism and bioethics is based on the fact that man is created in the image and likeness of God, both as male and female.

Any offence against human beings immediately becomes an offence against God the Creator.

The sacredness of life has a central place in the Jewish religion.

Every human life has an infinite and absolute value: infinity cannot be increased by multiplication, just as it cannot be decreased by division; therefore, a physically or mentally ill life is no less sacred than a healthy one, just as the life of a single person is as valuable as that of millions. The value of a human life lasts from birth to death.

Jewish law deals with problems starting from the perspective of duties. Duties towards God and neighbours.

Therefore, normally no reference can be found in Jewish sources to the rights of the embryo: instead, a precise reference can be found to what may or may not be done to the embryo or foetus.

Abortion

As just mentioned in the general part, according to Jewish law the absolute value of life, thus legally

defined, begins when the head or the largest part of the baby's body emerges from the vaginal canal.

However, the foetus, even before that moment, enjoys specific rights, such as the right to life, which can only be violated in case of very serious medical problems.

With regard to the mother, the right to life of the foetus is subordinate to the life of the mother. If there is no other way to save the mother's life than to sacrifice the life of her unborn child, this even becomes mandatory.

According to the Jewish moral rule, causing an abortion is an unlawful and punishable act, because the human body is not considered a private property that can be freely disposed of.

However, abortion is not punishable in the same way as murder. The foetus is not considered a “human being” (*nefesh*) to all intents and purposes, therefore the life of the mother can/should be saved even at the cost of the life of the foetus, which does not occur immediately after birth.

Termination of pregnancy, abortion, can therefore be justified, and indeed required, if the foetus constitutes a danger (as established by a competent doctor) to the life of the mother, whose protection can never be compromised by the still uncertain life of the foetus.

Any other situation (foetal malformations, rape, incest, etc.) in which the need for abortion to protect the mother's psychological health may be considered, always constitutes a case per se, to be submitted to the rabbinical authority, which will have to take into account all the factors concerning the specific problem.

Social and economic factors alone are not deemed sufficient to permit the termination of pregnancy.

The prevailing position is to limit authorisation to the cases involving a danger to the life of the mother, whether physical or psychological (e.g. violence and suicide). Other reasons could be based on well-founded fears that the child might be born with serious disabilities, and cases of rape or incest.

These reasons protect the principle of family peace and the principle according to which a woman has no duty to procreate, although she has the right to be a mother.

The non-recognition of the duty to become a mother is motivated by the Jewish principle according to which no one is obliged to do something that could be potentially dangerous to his or her health.

In cases where continued pregnancy would constitute a serious danger to the mother, abortion can and should be performed. In the other cases mentioned, such pregnancies should be terminated within the first forty days or, at least, within the first three months.

Artificial fertilisation

The first and one of the main commands of God to his children is the one given to the progenitors, which reads: "*Be fruitful and multiply*"; from this command, the Jewish bioethical reflection felt the need to reflect on how to help couples who can't have children.

According to Jewish tradition, no particular moral problems are associated with the use of technologies that can help overcome both female and male infertility.

On the other hand, some problems may arise when it comes to defining the legal status of a child conceived in a manner other than natural conception.

With regard to homologous fertilisation, understood either as extracorporeal fertilisation or artificial insemination, carried out by a legally married couple, no particular objections emerge from rabbinical authorities.

Rabbis simply exhort to obtain sperm by means of normal sexual intercourse.

Problems arise in connection with heterologous fertilisation, particularly with regard to the legal status of the child. Several questions arise: to whom would the child belong? Would children of the same uterine mother but with a different genetic mother be brother and sister for the purposes of the ban on incest? Is the use of heterologous semen considered adultery? What mutual rights and duties exist between genetic parents and children in such cases?

Most rabbinic authorities believe that the use of heterologous semen - even if forbidden! – should not be considered as adultery from a legal point of view.

Jewish tradition recognises as the legal mother, the mother who gives birth and not the genetic mother.

BIBLIOGRAPHY

Rabello AM. *Introduzione al diritto ebraico. Fonti, Matrimonio e Divorzio. Bioetica.* Giappichelli. Turin. 2002.

Di Segni R. *Il punto di vista ebraico su aborto, contraccezione e fecondazione artificiale,* in Biagi L. – Pegoraro R. (eds.). *Religioni e Bioetica. Un confronto sugli inizi della vita*. Gregoriana. Padua. 1993, 283-290.

Di Segni R. *Fecondazione artificiale e bioetica ebraica*. In *La rassegna mensile di Israele* LX (1993) 187-193.

ANNEX 5: GLOSSARY

The following are some of the most recurring terms in this document.

SURROGATE MOTHERHOOD

Set of medically assisted procreation practices through which a woman, third party to the prospective or intended parents, is committed to carry in her uterus an embryo conceived by others and to deliver the baby after birth.

PARTIAL OR TRADITIONAL SURROGACY OR STRAIGHT METHOD

Practice through which a woman makes her uterus and ovum available.

UTERUS FOR RENT

An agreement between two or more parties through which a woman agrees, in return for payment or free of charge, to be fertilised or implanted with a fertilised ovum for the purpose of completing a pregnancy on behalf of one or more intended parents, and to deliver the child to them, waiving all rights on the child.

GENETIC MOTHER

The woman who sells or donates the oocyte.

SURROGATE OR GESTATIONAL MOTHER

The woman who carries the pregnancy in her uterus.

MENOPAUSAL SURROGATE MOTHER

A menopausal woman, properly prepared with hormone therapy, who receives an embryo that is genetically foreign to her because it was conceived by fertilising the oocytes donated by another woman.

INTENDED MOTHER

The woman who is replaced and who, in case she is the client, will receive the child.

INTERMEDIARIES

Specialised bodies that manage the entire surrogate motherhood procedure, either independently or cooperating with clinics and law firms with which they have concluded a convention, taking care of both the medical aspects (gamete collection, artificial fertilisation, embryo implantation, pregnancy assistance) and legal ones (contract drafting).

CROSS-TALK

An exchange of immunological, biochemical and hormonal signals, which allows the mother to recognise the child and to be able to accept him or her for implantation, establishing what is considered to be a genuine “dialogue” between the mother and the embryo.

ALTRUISTIC SURROGATE MOTHERHOOD

The surrogate mother does not receive any remuneration other than the expenses related to pregnancy (medical expenses, etc.).

COMMERCIAL SURROGATE MOTHERHOOD

The surrogate mother receives a predetermined remuneration, usually through a contract.

INTENDED PARENTS

Those who resort to a surrogate mother, through ad hoc intermediaries, to have a child. They can be either couples (heterosexual or homosexual) or singles (men or women).

GENETIC FATHER

The man who sells or donates his semen.

OVARIAN HYPERSTIMULATION

A process through which women, who normally ovulate once or twice a month, are induced to produce many more ova (up to 50 or 60) through induced hyperovulation. With the use of appropriate drugs, the menstrual cycle is first interrupted and then hyperovulation is stimulated.

OHSS - OVARIAN HYPERSTIMULATION SYNDROME

It is the most serious complication of Controlled Ovarian Stimulation (COS), as part of medically assisted procreation (MAP) techniques. In addition to an increase in the ovarian volume and to intraovarian haemorrhages, OHSS is characterised by pleural effusion, ascites and vulvar oedema, which are linked to the increase in vascular permeability.

EGGSPLOITATION

Neologism created by combining the word “eggs” and “exploitation”. This neologism is taken from the title of a docu-film, which shows how ova donors are “chosen”, convinced by cash payments and illusions of great altruism. They often undergo hormone therapies to encourage ova production, then they are subjected to an ova extraction procedure, with frequent peri- or post-procedural complications.

BONDING

Specific and complex process of establishment of the physical-psychological bond between the child and the parents, influenced by a multiplicity of variables (environment, childbirth, mother's or baby's health, parents' characteristics, etc.). The bond begins in the womb through listening to sounds and voices and the perception of emotions, and is decisively consolidated immediately after birth through skin-to-skin contact with the mother. This first contact allows the newborn baby to regain the reassuring pre-birth state by recognising the mother's heartbeat, smell and warmth.

POSTPARTUM DEPRESSION

It is identified as a public health problem because of its high incidence and consequences for women's well-being and the quality of the mother-child relationship. Defined as a real pathological condition, postpartum depression affects 10-15% of new mothers in Western countries. It is more frequent after the birth of the first child and it generally begins in the three or four weeks following the birth, with worsening symptoms that manifest clinically in the fourth or fifth month. It affects 350 million people worldwide and causes 850,000 deaths every year. Women who suffer from puerperal depression may be unable to take care of the baby, have ambivalent or negative feelings and be afraid of harming the baby. Despite its severity and incidence rate, postpartum depression remains underdiagnosed, given that only 49% of pregnant women with depressive symptoms are aware of this disorder and seek medical intervention.

ARTIFICIAL INSEMINATION

An intracorporeal assisted fertilisation technique that consists in the relocation of the male sperm inside the tube, or its introduction into the tube after it has been collected and processed, so that it can get to the ovum and fertilise it naturally.

ARTIFICIAL FERTILISATION

A set of techniques aimed at achieving human conception beyond the natural process, which consists of the sexual intercourse of a man and a woman.

GIFT (GAMETE INTRAFALLOPIAN TRANSFER)

An intracorporeal artificial fertilisation technique involving the simultaneous but separate transfer of male and female gametes into the Fallopian tube.

IVF

An extracorporeal artificial fertilisation technique involving the creation of several embryos in the laboratory, after collecting gametes, with the aim of transferring the embryos in the uterus to be implanted.

ICSI (INTRACYTOPLASMIC SPERM INJECTION)

An extracorporeal artificial fertilisation technique involving the direct injection of a spermatozoon into the cytoplasm of the egg cell.

ECTOPIC PREGNANCY

Settlement (implantation) of a fertilised ovum in an abnormal position. Normally, the ovum is fertilised in the Fallopian tube and then implanted in the uterine cavity. However, if the tube is narrowed or blocked, the fertilised ovum may never reach the uterus and therefore sometimes it settles in tissues outside the uterus, resulting in an ectopic pregnancy. The most common site for an ectopic pregnancy is the tube (tubal pregnancy), but it can also take place in other sites.

OOCYTE RETRIEVAL

Commonly referred to as *pick-up*, it is performed approximately 34-36 hours after the administration of human chorionic gonadotropin (hCG), which is intended to induce the final maturation of the oocytes. During this procedure, which is performed under ultrasound monitoring and following local anaesthesia or deep sedation, a specific needle mounted on a transvaginal ultrasound probe is used to aspirate the follicular fluid and retrieve the oocytes it contains.

ANNEX 6: REFERENCE LEGISLATION AND DOCUMENTS OF THE REPUBLIC OF SAN MARINO

Law no. 49 of 26 April 1986, *"Reform of family law"*

Law no. 137 of 29 October 2003 "*Measures to support the Family"*

Delegated Decree no. 116 of 4 August 2008, *"Protection of pregnant workers, workers who have recently given birth and workers who are breastfeeding"*

Decree - Law no. 14 of 29 January 2021, *"Further provisions to combat the spread of the Covid-19 epidemic"*