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No gamete donation should be anonymous and undisclosed

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PRO: No gamete donation should be anonymous and undisclosed

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In recent years, a growing movement has advocated for transparency in gamete donation. Many countries and jurisdictions, such as Sweden (1984), Austria (1992), Victoria, Australia (1998), Switzerland (2001), the Netherlands (2004), Western Australia (2004), New Zealand (2004), Norway (2005), the United Kingdom (2005), Finland (2007), New South Wales Australia (2008), Germany (2018), Portugal (2018), Ireland (2020), France (2022), Queensland, Australia (2024), South Australia (2025), and Colorado, the United States (2025) have introduced legislation mandating the recording of donor-identifying information (1–4). This makes it possible for donor-conceived persons (DCPs) to access information about their genetic background, provided they are aware that they are donor-conceived. Professional bodies, e.g. the Ethics Committee of the American Society for Reproductive Medicine (5), also recommend disclosure and access to identifying information. Conversely, anonymous donation remains possible or required in many countries, including (most of) the United States, People's Republic of China, Singapore, Spain, the Czech Republic, Italy, Belgium, Japan, South Africa, and People's Republic of China (6–8). In effect, the current debate revolves around the viability and desirability of double-concealment: both parental nondisclosure and donor anonymity, potentially leaving many DCP without crucial aspects of their identities (9).

Donor conception affects multiple parties: donors (and partners where relevant), recipients/parents (and partners where relevant), DCP, siblings (including same-donor siblings and donors' raised children), and families. Donor conception (DC) should be conducted in such a way as to minimize harm and promote wellbeing for DCP while balancing the needs and interests of other parties. We suggest that there are compelling reasons that "no donation should be anonymous and undisclosed" and that this may benefit both DCP and the other parties affected by donation. Both principled and consequentialist arguments (10) can be made for this stance.

"The right to know"

The right to know one's genetic identity may be regarded as a fundamental human right. It is based on people's interest in having access to information which may be important for their identity, relationships, and health (11). In addition to being recognized by law and professional guidelines in many countries, DCP support and advocacy groups (e.g., in Japan, the United States, the United Kingdom (UK), the Netherlands, Belgium, Australia, and New Zealand) have asserted DCP's "right to know" and their claim may be supported by Article 8 of the European Convention of Human Rights and the United Nations Convention on the Rights of the Child (12, 13). Similarly, many parents and donors regard disclosure and access to identifying information as a child's right (2, 14).

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Over the last two decades, more and more countries have abolished gamete donor anonymity. This is a reaction to a demand from one group of DCP who argued that they were harmed by not being able to find out the identity of one of their genetic parents.

Recent studies of the experiences of donor-conceived children and adults have shown that many of them struggle throughout their lives to come to terms with their donor conception and their family composition (88). Other studies have shown that the quality of life of donor-conceived people is significantly lower than that of children raised by their genetic parents. This does not mean that all donor-conceived persons are harmed, but that a substantial minority of them are. These new studies have been performed in adults and have shown an increased risk of a long series of relatively serious psychological and social problems (89–91).

It could be argued that the issues experienced by the DCP today are a consequence of the characteristics of the practice of gamete donation in the past, i.e., secrecy and anonymity. However, openness and identifiability themselves generate problems. Openness may increase the number of donor offspring who regret their donor conception. A significant minority regret having been conceived with donor gametes (92). Moreover, although the negative impact of disclosure may be less if the children are told early, this does not mean that there is no negative impact. More than one in three of the children felt confused and shocked by the information (93).

A possible explanation for these new problems is the high value attributed to genetic relationships. As the DCP (like everyone else) receives the message from society that genetic relationships are very important (they are needed to build a healthy identity and to connect with one's real family), identifiability leads to new and sometimes more complex problems. Many DCPs want not only identifying information but also contact with their donor. This can lead to friction and disagreement, outright refusal of any form of contact by the donor, and divergent expectations about the level and type of interaction they should have. In addition, the DCP may have to deal with other conflicts, for instance with the social parent, if they take steps with which the other feels uncomfortable (80). Negative experiences can also occur when DCPs who believe that they should have meaningful relationships with all their genetic relatives, discover that they have many donor siblings.

Although these problems do not reduce the quality of life of DCP below the level of reasonable wellbeing, the reduction in wellbeing is a strong moral reason to avoid gamete donation if possible. In this respect, being donor conceived is comparable with having a moderately severe genetic disorder with reduced penetrance and variable expression (94). The abolition of donor anonymity does not bode well for the reproductive autonomy of prospective parents. If a government deems it justified to interfere with people's reproductive privacy by banning donor anonymity, or by imposing mandatory disclosure through mention of the

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The importance of disclosure for DCP

Although parents retain control over whether to disclose DC to their children in most jurisdictions, knowledge about the method of one's conception may be important for DCP. Research indicates that early disclosure, as well as an ongoing disclosure process, supports children in integrating their understanding of DC into their identity, particularly when parents approach DC with comfort and positivity (12, 15–17). Children informed early may also experience more positive parent-child or family relationships, including as young adults (18–22), and have greater wellbeing in adolescence (23). It is thus recommended that DC be part of a child's lifelong family story rather than a "big reveal" (12, 24, 25). Single women or lesbian couples typically have fewer options to conceal DC (26–28), and here too research suggests DCP cope well with the story of their conception, especially where there are open and ongoing discussions (29).

Although some research (30) suggests no major differences in psychological adjustment and family functioning between disclosing and nondisclosing families, in part, this could be related to the young age of DCP in many studies. Additionally, nondisclosing families may be underrepresented in research. Ravitsky et al. (31) argue that the lack of negative outcomes in DCP unaware of DC does not imply disclosure is unimportant for them, as they cannot express whether they would have wanted to know or if nondisclosure caused harm.

Indeed, research on inadvertent disclosure/discovery and late disclosure, suggests that DCP may experience a sense of loss, anxiety, identity confusion, and believe that their conception is a "black secret" of which to be ashamed (15–17, 32, 33) alongside anger at their parents and a negative impact on family relationships (34). Donor-conceived persons who are unaware of their DC may sense that there is a family secret, potentially causing alienation and strained parent-child relationships and family dynamics (16, 32, 34–36). Ultimately, DCPs may be more upset by secrecy/deception than by their method of conception (34, 36).

The importance of access to identifying information for DCPs

Donor-conceived personsDCPs often want more than just knowledge of their DC but may desire access to donor-identifying information (2, 16, 17, 24, 37, 38), with opposition to donor anonymity increasing with age (39). Knowing one's genetic background may not merely be a matter of curiosity—it allows DCPs to access health-related information (2, 31, 40–42), reduces the risk of unknown consanguinity (43), and may play a crucial role in identity formation and personal development (2, 24, 44–46). Donor-conceived persons may also be interested in and actively search for same-donor siblings, seeking insights into personal traits and sometimes hoping for connections to be established (2, 46). For those with anonymous donors or where informa-

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donor conception on the birth certificate, then, for the sake of consistency, it should also interfere with all other decisions that may have a similar or greater effect on the welfare of future children. If future research shows that DCP who have been informed about their DC during childhood and who have access to identifiable information also have a lower quality of life and lasting psychosocial problems, the government should ban gamete donation itself.

Despite growing evidence that more openness and less anonymity do not solve the problems, one keeps pushing forward. The next step, as demonstrated by discussions in the United Kingdom and the Netherlands, is to remove donor anonymity from the moment of birth of the child (95). At present, there is no evidence that changing this rule will have a positive impact on the families. Early identification may, for instance, render the establishment of a stable relationship with the parents more difficult (96). Moreover, nothing is known about what (candidate) donors think about this measure and to what extent this change would alter the donor population. Gay and single men may begin to see sperm donation as a relatively easy way to become a father. They may want to become more involved in the family than either the donor offspring or the recipients would like them to be (97). Research has shown that it is mainly single women with donor children who are interested in early contact with the donor (98). As early contact enables the donors to have regular encounters with the child, it may even allow them to build family life, which gives them the right to legal fatherhood. However, if many candidate sperm donors are put off by the idea of early contact, there will be even fewer donors, and recipients will have to find a donor on the internet.

Many psychologists and counselors now recommend lifelong support for all people involved (99). This need for ongoing professional support in every step of the process is a clear indication that something is seriously wrong with these families. Why else would they need support? Families with donor-conceived children are branded as fundamentally flawed; they cannot provide for their children's wellbeing without the help of outsiders, be they donors or counselors. It seems unlikely that donor families really benefit from being portrayed as deficient.

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Since the introduction of in vitro fertilization, assisted reproductive technologies (ART) have become an essential approach to managing infertility, a condition that currently affects approximately one in 6 individuals worldwide (100). Recent estimates suggest that over 9 million children have been born globally through ART. Projections indicate that by the year

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tion is unavailable, searching for identifying information may be a way to retain agency over information they regard as theirs (2, 46). The inability to access such information can lead to negative experiences such as discomfort and perceptions of unfair loss (24, 29).

Jurisdictions with identity-release provisions typically maintain donor registers (e.g., HFEA in the UK, Births, Deaths, and Marriages in New Zealand, the Stichting Donorgegevens Kunstmatige Bevruchting in the Netherlands) where donor and DCP identifying information is recorded. Donor-conceived persons, and sometimes donors, siblings, and parents, can apply for access on the basis of "maturity" criteria (24). However, recent studies question legal age limits on access (12, 24), as DCPs may desire information earlier, and information release during adolescence may add stress to an already challenging developmental stage. Age limits also fail to account for siblings in a family born from the same donor gaining access at different times (24).

The importance of ability for DCP to contact donors and same-donor siblings

Donor-conceived persons may seek contact with donors because of curiosity, identity expansion, more information about the donor, or access to donor medical history (2, 37, 41, 46, 47). Interest often arises during or after significant life transitions, such as marriage or parenthood, highlighting identity formation as a motivating factor (2, 32, 48). Although research on contact experiences among the parties involved in the DC remains limited, available studies suggest generally positive outcomes, including regarding the experience as significant for identity and personal history (41, 49). Negative or mixed experiences, including feelings of rejection and disappointment, may occur when donors are unwilling to engage, expectations are unmet or misaligned, or DCPs have idealized perceptions of the donor (29, 36, 37, 46, 49, 50). Earlier contact, particularly in childhood or adolescence, tends to facilitate stronger, family-like relationships (29, 51).

DCP may want to meet same-donor siblings, in some cases, to develop ongoing relationships, extended family networks, or "durable clans" (2, 52). Research here similarly suggests generally positive experiences, with sibling connections providing a sense of belonging, validating experiences, and reducing the isolation associated with being donor-conceived, although contact with large sibling groups may be overwhelming (45, 49, 50, 53, 54). Those without siblings or with weaker family bonds often particularly value these biological ties (2, 45, 54). Contact among same-donor siblings may be less complex than with donors where expectations and relationship uncertainty may be greater (54). Some DCP, especially those meeting siblings in adulthood, regret lost opportunities to develop relationships (55).

Finally, although some research suggests that lacking knowledge of DC or donor-identifying information does

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2100, up to 400 million individuals—representing approximately 3% of the global population—may have been conceived using ART (101).

A substantial proportion of ART cycles involve the use of donor gametes. According to data from the European Society of Human Reproduction and Embryology, approximately 8.2% of in vitro fertilization cycles in Europe in 2019 used donor oocytes, with a reported pregnancy rate per embryo transfer of 50.5% (102). In Latin America, 18% of ART cycles performed in 2019 involved donor oocytes, resulting in a pregnancy rate of 47% per transfer (103). In the United States, the Centers for Disease Control and Prevention reported that between 2013 and 2020, 135,085 embryo transfer cycles utilized donor oocytes, representing approximately 10.9% of all ART transfer cycles during that period (104). Donor sperm also plays a significant role in ART. In the United States, nearly half a million women have used donor sperm in recent years, while in Europe, >6,000 intrauterine insemination cycles with donor sperm were reported in 2019 (102, 105).

Despite its transformative potential for individuals experiencing infertility, gamete donation raises a range of ethical concerns at the intersection of law, medicine, and societal values. One of the central ethical debates pertains to donor anonymity: whether individuals conceived through gamete donation have a right to know the identity of their biological progenitor, and, if so, how and when such information should be disclosed. Parents, donors, and donor-conceived individuals may hold divergent perspectives on anonymity, each influenced by personal, cultural, or psychological considerations (5).

Proponents of donor anonymity argue that it protects donor privacy, reduces societal stigma, and may encourage greater participation in donor programs. Moreover, given that the donor's involvement is biological rather than parental, some contend that their identity is not inherently relevant to the upbringing of the child. In sociocultural contexts where infertility or non-biological parenthood is stigmatized, maintaining anonymity may also help mitigate adverse social consequences for all parties involved (106, 107).

Conversely, nonanonymity is primarily advocated on the basis of the rights and psychosocial wellbeing of donor-conceived individuals. The ability to know one's genetic origins is increasingly regarded as a fundamental human right, with critical implications for access to accurate medical histories, psychological development, and identity formation (108). Numerous individuals conceived through donor gametes report a sense of incompleteness or identity confusion in the absence of information about their genetic background (109). Additionally, concerns about inadvertent consanguinity, such as unintentional incest between donor-conceived siblings, underscore the importance of transparency and support the establishment of regulated donor registries (110).

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not always lead to negative outcomes (e.g., Gartrell et al. (56)), this does not take away from the fact that for some, this access is critical to their wellbeing. As Ravitsky (31) argues, even if not all DCP experience harm, denying access removes their choice to define the role of genetics in their identity and relationships—a choice others in society have.

The interests of donors

Many donors, including some who donated anonymously, support DCP's rights to information, believing it benefits them (2, 47, 57–63). Donors may also seek information about DCP out of curiosity about outcomes, to promote their own sense of identity, or a sense of responsibility toward both DCP and their raised children and families (2, 57, 61, 63–69). Some donors also welcome contact with parents, viewing donations as a personal gift and taking an interest in recipients (60, 61, 70–73). Some egg and embryo donors only donate if identity-release and contact are assured (59, 61, 74). They may deliberately select recipients they feel connected to (75), and in some cases, use third-party websites to ensure they are known to the child (74, 76, 77). Embryo donors, who are aware that their children may have full genetic siblings raised in another family, particularly value agency in recipient selection to enable kinship ties (59, 76).

Although donor contact experiences may be positive (2), donors rarely initiate contact. Indeed, in contrast to earlier concerns, donors generally do not regard themselves as having parental roles in relation to DCP. Instead, they grant DCP "relational authority," tending to make themselves available if and when DCP seeks contact (67, 69). In some cases, relationships extend to include both the donors' and DCP's families, although familial dynamics and past experiences play a role (67).

The interest of parents

Parents may disclose DC, seek donor information, or establish contact to support their children's right to genetic knowledge, access medical or psychosocial information, express gratitude, or facilitate donor and sibling connections (2, 26, 78, 79). Some parents specifically chose donors who are willing to exchange identifying information (e.g., Goedeke et al. (59)), whereas others, who initially opted for anonymity or nondisclosure, may change their attitudes over time (6). Although disclosure may be challenging (14, 80), nondisclosure or delayed disclosure may cause parental stress and uncertainty (81, 82), whereas early disclosure may be linked to reduced parental anxiety, lower depression, and enhanced parenting (18).

Same sex and single parents, who must account for the absence of an opposite-sex parent, may seek early donor connections to build an extended family (2, 83), although some feel uneasy about donor influence on parental

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Despite recent legal reforms in several countries reflecting a global shift toward greater transparency and identity disclosure in gamete donation, many nations continue to uphold legislation that mandates or permits donor anonymity to protect the privacy of both donors and recipients. In countries such as Spain, Brazil, France, the Czech Republic, Greece, and Russia, donor identities remain confidential, and the law typically prohibits any exchange of personally identifying information (111, 112).

These laws are likely grounded in the rationale that anonymity protects donors from future legal, financial, or emotional obligations regarding any resulting offspring and also reduces the risk of unwanted contact. By shielding donors from potential relational entanglements or future claims, anonymity serves as a legal and psychological safeguard, thereby encouraging donor participation and ensuring the stability of recipient families. Furthermore, maintaining confidentiality reinforces the donor's nonparental role, supporting the recipient's exclusive parental identity and minimizing disruptions to the family unit (113).

Anonymity can significantly increase individuals' willingness to donate by alleviating concerns related to future identity exposure and potential relational complications. Indeed, previous data indicate that anonymity plays a direct and influential role in the decision to donate (32).

Fertility clinics frequently adopt protocols that favor anonymous gamete donation as a means to streamline clinical operations, reduce legal uncertainty, and minimize potential conflicts among donors, recipients, and offspring. These practices are especially prevalent in private fertility centers operating within legally heterogeneous environments. According to Sgargi et al. (114), the maintenance of donor anonymity is not merely a historical vestige but a deliberate institutional strategy aimed at avoiding relational, financial, and legal entanglements associated with identity-disclosure frameworks. Clinics underscore that anonymity not only facilitates donor recruitment but also enhances the clarity of informed consent processes and mitigates after treatment liability risks (114). In a similar vein, Tsai and Eaton (2024) emphasize that the emergence of direct-to-consumer DNA testing and social media platforms has introduced new challenges to preserving donor confidentiality. These technological developments compel clinics to reevaluate their anonymity policies, often reinforcing protective measures in jurisdictions where legal guidance remains fragmented or inconsistently enforced (115).

Cultural and religious values play a critical role in shaping preferences for donor anonymity, often viewing it as a mechanism to preserve family integrity, protect social standing, and avoid the stigma associated with non-biological parenthood. Rocha et al. (112) investigated the perceptions of Brazilian couples undergoing assisted reproductive treatments and found that the majority believed that disclosing the donor's identity could disrupt family rela-

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autonomy. More broadly, parents may seek contact with same-donor siblings/families to support their child's identity, prevent consanguinity, share health insights, provide their child with sibling/s, and create a support network for the child and themselves (2, 26, 52, 84). Instead of posing a threat to the parenting role, donors can be seen as extended family members who take an interest in DCP's lives without assuming parental roles or responsibilities (59, 72).

Anonymity can no longer be guaranteed

Finally, the context of DC is changing with the increasing availability and popularity of direct-to-consumer genetic testing, which, coupled with matching services and social media, increases the risk that DCPs not told by their parents will find out about their origins (10, 85, 86). Anonymity can thus no longer be guaranteed, and nondisclosure is increasingly impossible to sustain (86).

Conclusion

Donor conception is more than a treatment for medical or social infertility—it is a means of building a family with implications for all the parties involved. We have suggested that there are compelling arguments for which "no gamete donation should be anonymous and undisclosed," and that this may be in the interests not only of DCP, but of the different parties affected by DC. However, we further suggest that disclosure and identity-release legalization go hand in hand with mechanisms to support disclosure and access to identifying information. These could include birth certificate annotation—as is the case in Victoria, Australia, and South Australia (87)—the establishment of centralized registers and rigorous record keeping, and DC linking services to facilitate contact among the different parties.

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tionships, reflecting a culturally conservative view of biological parenthood and traditional family roles. Similarly, a study conducted in Sri Lanka among medical students revealed that 84.7% of participants who were willing to donate gametes preferred anonymous donation, with religious and ethnic values cited as primary influences. These findings underscore that cultural and religious beliefs frequently reinforce the perception that anonymity is vital to prevent familial discomfort and moral conflict (116).

For recipients of donor gametes, the preservation of donor anonymity plays a central psychological role in the formation and stability of the family unit. Anonymity allows intended parents to maintain a sense of exclusive parental identity and alleviates anxieties associated with the involvement of a third-party biological contributor. Previous studies have shown that a significant proportion of couples undergoing assisted reproductive technology prefer donor anonymity because of concerns that revealing the donor's identity could undermine family cohesion and weaken the parental bond. These concerns are particularly prevalent among recipients who believe that anonymity enables them to raise their child without the emotional and relational complexities introduced by an identifiable biological donor (112).

In conclusion, the ongoing debate surrounding donor anonymity in ART reveals a complex interplay between ethical principles, individual rights, and family dynamics. It is essential to distinguish between genetic identity and civil identity, as the former pertains to biological origin while the latter confers social and legal roles within a family. Donors of gametes typically do not engage in a parental project and, therefore, do not assume responsibilities or relational ties with the resulting child. Maintaining donor anonymity helps preserve the integrity of family relationships, allowing intended parents to raise their children without perceived intrusion or disruption from a third party. The disclosure of a donor's civil identity, beyond mere genetic information, risks introducing emotional and legal complexities that may destabilize familial cohesion.

Furthermore, policies on gamete donation must respect individual autonomy and reproductive freedom. Families must retain the liberty to choose whether or not to disclose donor information, without state or regulatory interference in these deeply personal decisions. Reproductive governance should therefore be guided not by prescriptive mandates but by a commitment to support diverse family structures and safeguard their internal autonomy.

CRediT Authorship Contribution Statement

Guido Pennings: Writing – original draft. **Sonja Goedeke:** Writing – original draft. **Rosanna Hertz:** Writing – original draft. **Edson Borges:** Writing – original draft. **Robert J. Norman:** Conceptualization, Writing – review & editing.

Declaration of Interests

G.P. is a member of the External Scientific Advisory Committee of Cryos, Int. S.G. has nothing to disclose. R.H. has nothing to disclose. E.B.J. reports payments received from Ferring, Merck, and Abbott for lectures given at conferences and meetings; support for attending American Society for Reproductive Medicine and European Society of Human Reproduction and Embryology congresses; Merck Advisory board on Pergoveris studies. R.J.N. has nothing to disclose.

REFERENCES

1. Colorado Department of Public Health & Environment. Gamete bank and fertility clinic program, Available at: https://cdphe.colorado.gov/gamete-bank/fertility-clinic-program. Accessed April 13, 2025.
2. Indekeu A, Maas A, McCormick E, Benward J, Scheib J. Factors associated with searching for people related through donor conception among donor-conceived people, parents, and donors: a systematic review. F&S Reviews 2021;2:93–119.
3. Queensland Government. Changes to the law – donor conception information register 2025, Available at: https://www.qld.gov.au/law/births-deaths-marriages-and-divorces/changes-to-the-law. Accessed April 13, 2025.
4. Government of South Australia. Understanding donor conception and the law 2025, Available at: https://www.sahealth.sa.gov.au/wps/wcm/connect/public+content/sa+health+internet/services/community+and+specialised+services/donor+conception+register/about+the+dcr/understanding+donor+conception+and+the+law/understanding+donor+conception+and+the+law. Accessed April 13, 2025.
5. Ethics Committee of the American Society for Reproductive Medicine. Informing offspring of their conception by gamete or embryo donation: an Ethics Committee opinion. Fertil Steril 2018;109(4):601–5.
6. Bauer TA. A systematic review of qualitative studies investigating motives and experiences of recipients of anonymous gamete donation. Front Sociol 2022;7:746847.
7. Ishii T, de Miguel Beriain I. Shifting to a model of donor conception that entails a communication agreement among the parents, donor, and offspring. BMC Med Ethics 2022;23(1):18.
8. Klein K. Transformations in the public perception of sperm donation in China. An analysis of media debate in Chinese newspapers in the 2010's. Tecnoscienza 2018;9:29–48.
9. Konrad M. Nameless relations. Oxford: Berghahn Books; 2005.
10. ESHRE Working Group on Reproductive Donation Kirkman-Brown J, Calhaz-Jorge C, Dancet E, Lundin K, Martins M, et al. Good practice recommendations for information provision for those involved in reproductive donation. Hum Reprod Open 2022;1:hoac001.
11. Ravitsky V. The right to know one's genetic origins and cross-border medically assisted reproduction. Isr J Health Policy Res 2017;6:3.
12. Indekeu A, van Nistelrooij I, Woestenburg N, Maas A. Enable families with donor-conceived children to tailor their family story. Recommendations for policy and practice regarding legal age limits for accessing donor information in The Netherlands. Hum Fertil 2025;28(1):2470360.
13. Mulligan A. Anonymous gamete donation and article 8 of the European Convention on Human Rights: the case for incompatibility. Med Law Int 2022;22:119–46.
14. Indekeu A, Dierick K, Schotsmans P, Daniels K, Rober P, D'Hooghe T. Factors contributing to parental decision-making in disclosing donor conception: a systematic review. Hum Reprod Update 2013;19:714–33.
15. Daniels K. The perspective of adult donor conceived persons. In: Beier K, Brügge C, Thorn P, Wiesemann C, editors. Assistierte Reproduktion mit Hilfe Dritter. Berlin: Springer; 2020:443–59.
16. Glidden EA, Thibaut D, Goodman J. The impact of the method of genetic identity disclosure on the donor conceived adult. J Psychosom Obstet Gynecol 2022;43:258–64.
17. Lampic C, Skoog Svanberg A, Gudmundsson J, Leandersson P, Solensten N, Thurin-Kjellberg A, et al. National survey of donor-conceived individuals who requested information about their sperm donor—experiences from 17 years of identity releases in Sweden. Hum Reprod 2022;37:510–21.
18. Golombok S, Jones C, Hall P, Foley S, Imrie S, Jadva V. A longitudinal study of families formed through third-party assisted reproduction: mother–child relationships and child adjustment from infancy to adulthood. Dev Psychol 2023;59:1059–73.
19. Golombok S. Love and truth: what really matters for children born through third-party assisted reproduction. Child Dev Perspect 2021;15:103–9.
20. Golombok S, Readings J, Blake L, Casey P, Mellish L, Marks A, et al. Children conceived by gamete donation: psychological adjustment and mother-child relationships at age 7. J Fam Psychol 2011;25:230–9.
21. Lycett E, Daniels K, Curson R, Golombok S. Offspring created as a result of donor insemination: a study of family relationships, child adjustment and disclosure. Fertil Steril 2004;82:172–9.
22. Scheib J, Riordan M, Rubin S. Adolescents with open-identity sperm donors: reports from 12–17 year olds. Hum Reprod 2005;20:239–52.
23. Ilioi E, Blake L, Jadva V, Roman G, Golombok S. The role of age of disclosure of biological origins in the psychological wellbeing of adolescents conceived by reproductive donation: a longitudinal study from age 1 to age 14. J Child Psychol Psychiatry 2017;58:315–24.
24. Bolt S, Maas AJBM, Indekeu A, van Nistelrooij I. Legal age limits in accessing donor information: experiences of donor-conceived people, parents, sperm donors and counsellors. Reprod Biomed Online 2024;48:103846.
25. Mostyn A. Donor conception and its impact on family constructs – the views and experiences of donor-conceived persons. New Zealand: Master of Arts in Psychology, University of Canterbury; 2017, Available at: https://ir.canterbury.ac.nz/server/api/core/bitstreams/91755167-fd92-4203-b391-119f785c6b2f/content. Accessed April 14, 2025.
26. Freeman T, Jadva V, Kramer W, Golombok S. Gamete donation: parents' experiences of searching for their child's donor siblings and donor. Hum Reprod 2009;24:505–16.
27. Gross M, Richardot S. Conception narratives and third-party reproduction in lesbian-parented families in France. Int Social Sci J 2020;70:13–23.
28. Mamo L, Alston-Stepnitz E. Queer intimacies and structural inequalities: new directions in stratified reproduction. J Fam Issues 2015;36:519–40.
29. Koh A, van Beusekom G, Gartrell N, Bos H. Adult offspring of lesbian parents: how do they relate to their sperm donors? Fertil Steril 2020;114:879–87.
30. Kovacs G, Wise S, Finch S. Keeping a child's donor sperm conception secret is not linked to family and child functioning during middle childhood: an Australian comparative study. Aust N Z J Obstet Gynaecol 2015;55:390–6.
31. Ravitsky V, Guichon J, Lemoine M, Giroux M. The conceptual foundation of the right to know one's genetic origins. BioNews903 2017.
32. Blyth E, Crawshaw M, Frith L, Jones C. Donor-conceived people's views and experiences of their genetic origins: a critical analysis of the research evidence. J Law Med 2012;19:769–89.
33. Kirkman M. Parents' contributions to the narrative identity of offspring of donor-assisted conception. Soc Sci Med 2003;57:2229–42.
34. Best S, Goedeke S, Thorpe M. Make our wellbeing a priority: donor-conceived adults call for ongoing support and conversation about their donor conception. Hum Fertil 2023;26:337–46.
35. Berger R, Paul M. Family secrets and family functioning: the case of donor assistance. Fam. Process 2008;47:553–66.
36. Frith L, Blyth E, Crawshaw M, van den Akker O. Secrets and disclosure in donor conception. Sociol Health Illn 2018;40:188–203.
37. Scheib J, Ruby A, Benward J. Who requests their sperm donor's identity? The first ten years of information releases to adults with open-identity donors. Fertil Steril 2017;107:483–93.
38. Schrijvers A, Bos H, van Rooij F, Gerrits T, van der Veen F, Mochtar M, et al. Being a donor-child: wishes for parental support, peer support and counseling. J Psychosom Obstet Gynecol 2019;40:29–37.
39. Nelson M, Hertz R, Kramer W. Gamete donor anonymity and limits on numbers of offspring: the views of three stakeholders. J Law Biosci 2015;29:39–67.
40. Canzi E, Accordini M, Facchin F. 'Is blood thicker than water?' Donor conceived offspring's subjective experiences of the donor: a systematic narrative review. Reprod Biomed Online 2019;38:797–807.
41. Macmillan C, Allan S, Johnstone M, Stokes M. The motivations of donor-conceived adults for seeking information about, and contact with, sperm donors. Reprod Biomed Online 2021;43:149–58.
42. Ravitsky V. Conceived and deceived: the medical interests of the donor conceived. Hastings Cent Rep 2012;42:17–22.
43. Ross I. My kids were conceived via a sperm donor. Then I discovered they had half-siblings in the next suburb, Available at: https://www.mamamia.com.au/sperm-donor-siblings/. Accessed April 13, 2025.

44. Hertz R, Nelson M. Random Families: Genetic Strangers, Sperm Donor Siblings and the Creation of New Kin. New York and London: Oxford University Press; 2018.
45. Hertz R. sociological accounts of donor siblings experiences: their importance for self-identity and for new kinship relations. Int J Environ Res Public Health 2022;19:1–14.
46. Widbom A, Isaksson S, Sydsjö G, Skoog Svanberg A, Lampic C. The motives and experiences of donor-conceived persons requesting the identity of their sperm donors. Reprod Biomed Online 2024;48: 103413.
47. Kelly F, Dempsey D, Power J, Bourne K, Hammarberg K, Johnson L. From stranger to family or something in between: donor linking in an era of retrospective access to anonymous sperm donor records in Victoria, Australia. Intl J L Poly Fam 2019;33:277–97.
48. Jadva V, Freeman T, Kramer W, Golombok S. Experiences of offspring searching for and contacting their donor siblings and donor. Reprod Biomed Online 2010;20:523–32.
49. Zadeh S, Jones C, Jadva V. 'I have to remind myself that everyone's search is different': experiences and outcomes of searching and not searching for donor connections among donor conceived adults. Hum Reprod 2024;39: 2722–33.
50. Indekeu A, Bolt S, Maas A. Meeting multiple same-donor offspring: psychosocial challenges. Hum Fertil 2022;25:677–87.
51. Koh A, Rothblum E, Bos H, Carone N, Gartrell N. Sperm donor relations among adult offspring conceived via insemination by lesbian parents. J Reprod Infant Psychol. In press.
52. Hertz R, Mattes J. Donor-shared siblings or genetic strangers: new families, clans and the internet. J Fam Issues 2011;32:1129–55.
53. Bolt S, Notermans C, van Brouwershaven A, Maas A, Indekeu A. The ongoing work of kinship among donor half-siblings in The Netherlands. BioSocieties 2023;18:156–73.
54. Scheib J, McCormick E, Benward J, Ruby A. Finding people like me: contact among young adults who share an open-identity sperm donor. Hum Reprod Open 2020:hoaa057.
55. Blyth E. Discovering the 'Facts of Life' following anonymous donor insemination. IJLPF 2012;26:143–61.
56. Gartrell N, Deck A, Rodas C, Peyser H, Banks A. The national lesbian family study: 4. interviews with the 10-year-old children. Am J Orthopsychiatry 2005;75:518–24.
57. Bolt S, Postema D, van der Heij A, Maas A. Anonymous Dutch sperm donors releasing their identity. Hum Fertil 2021;24:24–30.
58. Burke H, Gilman L, Nordqvist P. Being an egg or sperm donor: connections with recipient parents, Available at: https://research.manchester.ac.uk/en/publications/being-an-egg-or-sperm-donor-connections-with-recipient-parents. Accessed July 21, 2025.
59. Goedeke S, Daniels K, Thorpe M, du Preez E. Building extended families through embryo donation: the experiences of donors and recipients. Hum Reprod 2015;30:2340–50.
60. Goedeke S, Gamble H, Thurlow R. Motivations for egg donation to previously unknown recipients: Donation as a personal, relational act of giving. Hum Fertil 2021;26:226–36.
61. Goedeke S, Gamble H, Thurlow R. Extended families? Contact expectations and experiences of egg donors donating to previously unknown recipients. Hum Fertil 2023;26:1519–29.
62. Miettinen A, Rotkirch A, Suikkari A-M, Söderström-Anttila V. Attitudes of anonymous and identity-release oocyte donors towards future contact with donor offspring. Hum Reprod 2019;34:672–8.
63. van den Akker O, Crawshaw M, Blyth E, Frith L. Expectations and experiences of gamete donors and donor-conceived adults searching for genetic relatives using DNA linking through a voluntary register. Hum Reprod 2015;30:111–21.
64. Blyth E, Crawshaw M, Frith L, van den Akker O. Gamete donors' reasons for, and expectations and experiences of, registration with a voluntary donor linking register. Hum Fertil 2017;20:268–78.
65. Goedeke S, Gamble H, Thurlow R. We want to feel valued: eggs donors' experiences of donation. Hum Fertil 2023;26:326–36.
66. Nelson M, Hertz R. Pride and concern: differences between sperm and egg donors with respect to responsibility for their donor-conceived children. New Genet Soc 2017;36:137–58.
67. Kirkman M, Bourne K, Fisher J, Johnson L, Hammarberg K. Gamete donors' expectations and experiences of contact with their donor offspring. Hum Reprod 2014;29:731–8.
68. Lampic C, Skoog Svanberg A, Sydsjö G. Attitudes towards disclosure and relationship to donor offspring among a national cohort of identity-release oocyte and sperm donors. Hum Reprod 2014;29: 1978–86.
69. Nordqvist P, Gilman L. Donors: curious connections in donor conception. Bingley, UK: Emerald Publishing Limited; 2022.
70. Hertz R, Nelson M, Kramer W. Sperm donors describe the experience of contact with their donor-conceived offspring. Facts Views Vis Obgyn 2015;7:91–100.
71. Isaksson S, Sydsjö G, Skoog Svanberg A, Lampic C. Preferences and needs regarding future contact with donation offspring among identity-release gamete donors: results from the Swedish study on gamete donation. Fertil Steril 2014;102:1160–6.
72. Nordqvist P, Gilman L. A sense of connectedness in reproductive donation. Contrasting policy with donor and donor kin lived experience. J Fam Issues 2024;45:1973–96.
73. Skoog Svanberg A, Sydsjö G, Lampic C. Psychosocial aspects of identity-release gamete donation – perspectives of donors, recipients, and offspring. Ups J Med Sci 2019;125:175–82.
74. Volks C. Crafting New kinship connections: Australian egg donors' early contact experiences with recipients and donor-conceived children, In press; 2025.
75. Goedeke S, Daniels K. We wanted to choose us: How embryo donors choose recipients for their surplus embryos. J Reprod Infant Psychol 2018;36:132–43.
76. Hertz R. Single mothers as bricoleurs: crafting embryos and kin. J Fam Issues 2020;42:58–87.
77. Hertz R. what to do with all the unused embryos. Eastern Sociological Society 2025, Boston, MA.
78. Dempsey D, Kelly F, Horsfall B, Hammarberg K, Bourne K, Johnson L. Applications to statutory donor registers in Victoria, Australia: Information sought and expectations of contact. Reprod Biomed So Online 2019;9: 28–36.
79. Fyfe A. Home-Insemination: The Motivations and Experiences of Same-sex Couples Who Use Known Sperm Donors and Self-insemination Methods to Conceive in Aotearoa New Zealand. New Zealand: Bachelor of Health Science Honours dissertation, Auckland University of Technology; 2024, Available at: https://openrepository.aut.ac.nz/items/a044254e-273a-4a06-bf3b-17a1f5d8f41e. Accessed August 27, 2025.
80. Widbom A, Isaksson S, Sydsjö G, Skoog Svanberg A, Lampic C. Positioning the donor in a new landscape-mothers' and fathers' experiences as their adult children obtained information about the identity-release sperm donor. Hum Reprod 2021;36:2181–8.
81. MacDougall K, Becker G, Scheib J, Nachtigall R. Strategies for disclosure: how parents approach telling their children they were conceived with donor gametes. Fertil Steril 2007;87:524–33.
82. Daniels K, Meadows L. Sharing information with adults conceived as a result of donor insemination. Hum Fertil 2006;9:93–9.
83. Goldberg A, Scheib J. Female-partnered and single women's contact motivations and experiences with donor-linked families. Hum Reprod 2015; 30:1375–85.
84. Hertz R, Nelson M, Kramer W. Donor sibling networks as a vehicle for expanding kinship. J Fam Issues 2016;38:248–84.
85. Darroch F, Smith I. Establishing Identity: how direct-to-consumer genetic testing challenges the assumption of donor anonymity. Fam Ct Rev 2021;59:103–20.
86. Gilman L, Redhead C, Hudson N, Fox M, Nordqvist P, MacCallum F, et al. Direct-to-consumer genetic testing and the changing landscape of gamete donor conception: key issues for practitioners and stakeholders. Reprod Biomed Online 2024;48:103421.

87. Births, deaths and marriages Victoria. Donor conceived births, Available at: https://www.bdm.vic.gov.au/donor-conceived-births. Accessed July 21, 2025.
88. We are donor conceived. We are donor conceived survey report, Available: https://www.wearedonorconceived.com/2020-survey-top/2020-we-are-donorconceived-survey. Accessed November 21, 2023.
89. Adams DH, Gerace A, Davies MJ, de Lacey S. Self-reported mental health status of donor sperm-conceived adults. J Dev Orig Health Dis 2022;13:220–30.
90. Ridley-Jones C, Jadva V, Zadeh S. An exploration of psychological, emotional and social wellbeing among donor conceived young adults in the UK. Hum Reprod 2024;39:deae108–27.
91. Talbot C, Hodson N, Rose J, Bewley S. Comparing the psychological outcomes of donor and non-donor conceived people: a systematic review. BJOG 2024;131:1747–59.
92. Mahlstedt PP, LaBounty K, Kennedy WT. The views of adult offspring of sperm donation: essential feedback for the development of ethical guidelines within the practice of assisted reproductive technology in the United States. Fertil Steril 2010;93:2236–46.
93. Jadva V, Freeman T, Kramer W, Golombok S. The experiences of adolescents and adults conceived by sperm donation: comparisons by age of disclosure and family type. Hum Reprod 2009;24:1909–19.
94. Pennings G. The moral obligation to have genetically related children. J Med Ethics 2025;51(4):274–7.
95. Human Fertilisation and Embryology Authority. Donor anonymity and information provision. Legislative reform Advisory group, Available at: https://www.hfea.gov.uk/media/nacb35fx/lrag-discussion-paper-donor-anonymity-andinformation-provision-2022-05-27.pdf. Accessed July 21, 2025.
96. Pennings G. Lowering the age limit of access to the identity of the gamete donor by donor offspring: the argument against. J Med Ethics 2024;50:292–4.
97. Riggs DW, Scholz B. The value and meaning attached to genetic relatedness among Australian sperm donors. New Gen Soc 2011;30:41–58.
98. Kelly FJ, Dempsey DJ. Experiences and motives of Australian single mothers by choice who make early contact with their child's donor relatives. Med Law Rev 2016;24:571–90.
99. van Nistelrooij I, Woestenburg N. Response: arguments to abolish the legal age limits of access to information about the gamete donor by donor offspring. J Med Ethics 2025;51(5):e110230.
100. Abdullah KAL, Atazhanova T, Chavez-Badiola A, Shivhare SB. Automation in ART: paving the way for the future of infertility treatment. Reprod Sci 2023;30:1006–16.
101. Faddy MJ, Gosden MD, Gosden RG. A demographic projection of the contribution of assisted reproductive technologies to world population growth. Reprod Biomed Online 2018;36:455–8.
102. European IVF Monitoring Consortium (EIM) for the European Society of Human Reproduction and Embryology (ESHRE) Smeenk J, Wyns C, De Geyter C, Kupka M, Bergh C, Saiz IC, et al. ART in Europe, 2019: results generated from European registries by ESHRE†. Hum Reprod 2023;38:2321–38.
103. Zegers-Hochschild F, Crosby JA, Musri C, Petermann-Rocha F, Martinez G, Nakagawa H, et al. Assisted reproductive technologies in Latin America: the Latin American Registry, 2021. Reprod Biomed Online 2025;50:104413.
104. Braun CB, DeSantis CE, Lee JC, Kissin DM, Kawwass JF. Trends and outcomes of fresh and frozen donor oocyte cycles in the United States. Fertil Steril 2024;122:844–55.
105. Gerkowicz SA, Crawford SB, Hipp HS, Boulet SL, Kissin DM, Kawwass JF. Assisted reproductive technology with donor sperm: national trends and perinatal outcomes. Am J Obstet Gynecol 2018;218:421.e1–10.
106. Freeman T, Jadva V, Kramer W, Golombok S. Gamete donation: parents' experiences of searching for their child's donor siblings and donor. Hum Reprod 2009;24:505–16.
107. da Silva SP, De Freitas C, Baía I, Samorinha C, Machado H, Silva S. Gamete donation:(un) answered social and ethical issues in Portugal. Cad Saude Publica 2019;35:e00122918.
108. Dondorp W, De Wert G, Pennings G, Shenfield F, Devroey P, Tarlatzis B, et al. ESHRE task force on ethics and law 21: genetic screening of gamete donors: ethical issues. Hum Reprod 2014;29:1353–9.
109. Kiyashchenko LP, Bronfman SA, Maylenova FG. Ethical-anthropological dilemmas of gamete and embryo donation: commodification, altruism, morality, and the future of the genetic family. RUDN Philos 2020;24:113–24.
110. Adrian SW, Ravn T, Herrmann JR, Sylvest R, Kokado M, Semba Y, et al. Gamete donation in the time of DNA surprises. Acta Obstet Gynecol Scand 2022;101:1348–50.
111. Shpuhanych I, Diukarieva-Berzhanina KY, Yavorska O. Donor anonymity: national legal regulation and international experience. Med Perspekt 2020;25:198–204.
112. Rocha DO, Melamed RMM, Braga DPdAF, Setti AS, Iaconelli Jr A, Borges Jr E. The child's right to know versus the parents' right not to tell: the attitudes of couples undergoing fertility treatments towards identity-release gamete donation. J Reprod Infertil 2023;24:198–205.
113. Robertson JA. Legal issues in human egg donation and gestational surrogacy. In: Seminars in reproductive endocrinology. New York: Copyright© 1995 by Thieme Medical Publishers, Inc.; 1995:210–8.
114. Sgargi S, Kuan M, Ferraretti AP, Magli MC, Gianaroli L. Underlying catches and threats of indiscriminate abolition of donor anonymity. Global Reprod Health 2025;10:e0099.
115. Tsai S, Eaton JL. Addressing privacy concerns surrounding oocyte donation in the united states: gone with anonymity. Obstet Gynecol 2022;10:1097.
116. Raguraman S, Muhunthan K, Niroje R. Attitude and willingness on gamete donation among medical students: an experience from a state university in Sri Lanka. Asian Pac J Reprod 2024;13:120–5.