
Law and Technology – Criminalization of Sex Robots

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Abstract: *Influence of technology on our everyday lives, and in on our societies in general, is enormous. It is difficult to imagine life without technology, as it offers so many solutions and eases various tasks we conduct, it makes lives better. However, certain developments of technology raise concerns, ethical and legal concerns. One of such fields where technology development has been rather controversial is sex robots. This article indents to research into this field and raise several problems related to the technology development in sex robots.*

Keywords: *Criminalization, ethics of technology, law and technology, sex robots.*

1. INTRODUCTION

Sex robots are becoming extremely popular¹, especially during the Covid pandemic related lockdown. The first sex robot Roxxy was invented and presented in 2010 by TrueCompanion². Since that time robots have started looking more real and advanced in mechanics and animatronics considerably³, as well as the significant developments of the AI systems have been improved; they act more real. Sex robots are meant and created for those that are deprived of sex, some experts claim that they have therapeutic effect⁴ of these dolls on men that suffer from unfulfilled sexual need and especially those that have unlawful (philosopher Marc Behrendt is the one that discusses therapeutic use of childbots for pedophiles) and violent sexual behavior. Nonetheless, having access to these outlets has not stopped men from raping, besides sexual violence remains at the same high level⁵. There is also a raise in use of childlike sex dolls, which are not yet a fully robotic or automatic machineries but rather an anatomically correct prepubescent mannequins or dolls. Although, the future may offer new technologic opportunities and childlike sex robots could be created as to the fact that there are no legal restrictions in this respect. It is a known fact that not all sexual offences against children are carried out into practice by pedophiles⁶, as well as not all pedophiles sexually offend children. It may be deduced that the effectiveness of childlike sex bots for pedophilic use for preventing child sexual abuse remains quite controversial⁷. The violent standards of conduct and behavior should be criminalized, and the reasons are discussed in further research. “If we are to criminalize a type of conduct, we must show that it falls within the public

¹ Bishop, K. (2020). “Sex Robots, Teledildonics, and the Rise of Technosexuals During Lockdown. Observer.” <https://observer.com/2020/10/sex-robots-teledildonics-growing-popularity-covid19/> (accessed 20.06.2020).

² TechCrunch, “True Companion Debuts Sex Robot Roxxy.”, *NSFW*, 2010 https://techcrunch.com/2010/01/09/nsfw-true-companion-debuts-sex-robot-roxxy/?guccounter=1&guce_referrer=aHR0cHM6Ly93d3cuZ29vZ2xILmNvbS8&guce_referrer_sig=AQAAAMgLTBs83sEStHIRHKmryh2W1SFwPUHZz0j_OI_W_5ZiY2K9PDcdqJe-YQMhqrvtL-kqk7t92F-QyKQe_ERAw_Bth4NvKRh0iKKyAcsPHkQx0MTRvPg_BQFzhdrJ1wEp53jBJKFxvj1axQwTfnpkgKTbA48DrgPba6GGJKaucxrN (accessed 20.06.2020).

³ Realdoll official website: <https://www.realdoll.com/realdoll-x/> (accessed 20.06.2020).

⁴ Levy, D., *Love and Sex with Robots*. 3rd ed. Springer, UK, 2017

⁵ Mlambo-Ngcuka, P. (2020). “Violence against women and girls: the shadow pandemic” *UN Women*.

⁶ Jenkins, G.C., *Banished: A Comprehensive Look into the Mind and Soul of the Sex Offender with Sex Offender Case Studies and the Recidivism Challenge*. 1st ed. USA: BrownWalker Press, 2020

⁷ Behrendt, M. (2017). “Reflections on Moral Challenges Posed by a Therapeutic Childlike Sexbot” *International beConference on Love and Sex with Robots*, 96–113.

realm, the civic enterprise, and that it is therefore of proper interest to all citizens in virtue of their participation in that enterprise”⁸. To ensure the well-being of public a sound moral character should be built, moral harms may ruin well-being⁹.

2. ROBOTS AND RAPE

Childlike sex dolls have appeared several years ago in Asian countries, whereas regular sex dolls have existed for a long time all over the world. Initially sex dolls were just ordinary sex toys which did not show a significant resemblance with real people, the modern dolls (RealDoll) are not only extremely human-looking creatures that have a hyper-realistic anatomically correct bodies, but they also have an Artificial Intelligence (AI) platform built into a robotic head. Such a doll is nothing but a robotic AI. They are able to form expressions, detect the touch and its intensity¹⁰, move their head, and speak. Although their bodies are not equipped with animatronic parts yet. Moreover, they can learn what their owners like and offer an emotional connection afterwards. It could be assumed that a sexual experience with such a device may feel real. Moreover, any abuse, assault, or rape could also be “felt” like real for both the offender and the victim (robot). In the University of Osaka, a robot with tactile sensors can detect pain, the research aims at developing empathy. However, hypothetically the same setting may be installed into the sex robot. It raises important ethical questions of whether such robots, which are able to “feel” and have a selection of personal features¹¹, should be considered as any kind of personalities and should the degrading treatment of such machines be a violation of human rights?

2.1. Representation of rape

It is fair to mention, that from philosophical point of view, a sexual connection is a relation with human being or animal, alive substance¹². Today robot is not legally defined as electronic or legal personality. According to such philosophical idea, sex with a robot should be considered as masturbation as well as ordinary sex toys. Of course, robot is not alive, it does not have emotions, it is not identified with legal means and therefore it is not capable of giving consent. But even if the robot is not a real human, the representation of rape is real¹³. Some may say that films, video games, pornography also have scenes that represent rape, but the scenarios of violence are played by actors or avatars and they are completely fictional, yet causing moral harm as well, but not considered in this research. Though, in terms of sex robots the person involved is real (there is no or insufficient mental distance) and the function which may turn on scenario of rape which robot would play - at least morally problematic¹⁴. If a hyper-realistic woman-looking robot would deny the sexual intercourse, would cry and at the same time would “feel” the pain, then the violence will be directly associated with pleasure. In the future, if sex with robots will not require consent or will play a “raping scenario” it may become misleading and give the appearance of the fact that women should not give their consent and are always available for sex. Nevertheless, it is important to mention that some people might have different motivation to purchase a sex robot.

⁸ Duff, R. A., “Towards a Modest Legal Moralism”, *Criminal Law and Philosophy*, vol. 8, 2014, 217–235.

⁹ Wall, S. (2013). Enforcing Morality – *Criminal Law and Philosophy*, vol. 7, 455–471.

¹⁰ Rahman, A., Walia, S., Naznee, S., Taha, M., Nirantar, S., Rahman, F., Bhaskaran, M., Sriram, S., “Artificial Somatosensors: Feedback Receptors for Electronic Skins”, *Wiley-VCH GmbH*, vol. 2000094, 2020 1-10.

¹¹ Video uploaded on YouTube: https://www.youtube.com/watch?v=Ff_NRSf4s20&t=619s

¹² Goldman, A. H., “Plain sex” *Philosophy and Public Affairs*, vol. 6, no. 3, 1977, 267–287.

¹³ Sparrow, R., “Robots, Rape, and Representation”, *International Journal of Social Robotics*, vol. 9, 2017, 465–477.

¹⁴ Danaher, J., “Robotic Rape and Robotic Child Sexual Abuse: Should They be Criminalised?”, *Criminal Law and Philosophy*, vol. 11, 2017, 71–95.

2.2. Replacing human relationship

The innovation of sex robot technology is one of the biggest trends in the industry which also affects the psychology of people. There is a new sexual preference called digisexuality¹⁵. In 2018, a Japanese man married a hologram, such a movement of “closer relationship with technology” is becoming very popular. However, “the deception involved in designing robots to encourage users to falsely attribute thoughts and emotions to them is morally problematic”¹⁶. Nowadays technologies and the level of robot’s development or, more precisely being able to keep the conversation, to express “emotions” and in some nearest future being able to empathize, and having the hyper-realistic appearance, may lead to replacing human relationships with sex robots¹⁷.

3. CHILDLIKE SEX “ROBOTS” AND ABUSE

In Japan, childlike sex dolls have been manufactured by company, created by Shin Takagi (a self-confessed pedophile¹⁸) directly for pedophiles¹⁹ and meant to simulate the experience of raping a child. It is believed that pedophilia is not a sexual orientation but rather a psychological disorder triggered by early childhood trauma, which cannot be cured; and the possession of such devices may help these people to lead a better life. Some experts say that childlike sex dolls help pedophiles channel and control their sexual urges and they can be used to keep pedophiles away from child molestation. There are childlike sex dolls on the market, and they have been sold through mainstream online retailers like Amazon, Ebay, Aliexpress and Wish *sub voce* as mannequin. In light of the fact, that adult sex robots already exist, it is just a matter of time when the AI system will be installed to childlike robots as well. But what if such an approach may encourage the demand, allow to fully enjoy, and develop the sexual and psychological bent, which will motivate pedophiles to go on abuse on child? However, in this paper psychological aspects of an issue are not the point of discussion, but rather a lack of legal framework for such dolls and consequently sex robots of any kind of appearance in the UK.

Sexual intercourse is legal starting from certain age (according to national Penal Codes) only if both sides gave their consent without using the force and threat, otherwise it is considered as rape. If it is a sexual intercourse with a robot, should the setting of “consent” be also installed? No robot can be raped unless it will be designed in a way that it can refuse the sexual connection, such a setting of different repertoires of sexual abuse may be installed into the AI’s system. In the mentioned company TrueCompanion there was a sex robot called “Frigid Farah”. In the article written by John Danaher it was mentioned that “if you touched her in a private area, more than likely, she will not be to[o] appreciative of your advance”²⁰. Such a behavior represents a non-consent or rape scenario. Furthermore, if sex robots are deprived of consent they might be considered as sex slaves, which at the same time could perpetuate gender inequality and enhances misogyny, because sexual

¹⁵ McArthur, N., “The rise of digisexuality: therapeutic challenges and possibilities”, *Special Issue on sex and technology*, vol. 32, 2017, 1-12.

¹⁶ De Graaf, M. M. A., “An Ethical Evaluation of Human-Robot Relationships” *International Journal of Social Robotics*, vol. 8, 2016, 589–598.

¹⁷ Sulins, J. P., “Robots, Love, and Sex: The Ethics of Building a Love Machine”, *IEEE TRANSACTIONS ON AFFECTIVE COMPUTING*, vol. 3, no. 4, 2012, 398–409.

¹⁸ McCrum, K., “Lifelike child sex dolls created to 'stop paedophiles committing crimes'”, *Irish Mirror*, 2016 <https://www.irishmirror.ie/news/world-news/lifelike-child-sex-dolls-created-7177869> (accessed 20.06.2020).

¹⁹ Osborne, S., “Japanese company manufactures lifelike child sex dolls for paedophiles”, *Independent*, 2016 <https://www.independent.co.uk/news/world/asia/japanese-company-manufactures-lifelike-child-sex-dolls-paedophiles-a6811046.html> (accessed 20.06.2020).

²⁰ Danaher, J., “Robotic Rape and Robotic Child Sexual Abuse: Should They be Criminalised?”, *Criminal Law and Philosophy*, vol. 11, 2017, 71–95.

preferences of men would be placed before the rights of women and girls. Mostly such dolls and robots are of women or girls' appearances, consequently men are the owners of such toys. Throughout the centuries and today women have been fighting for equal rights, but woman-looking sex "slaves" will not defuse a conflict between feminists and sexists²¹. According to Joanna Bryson, "the appropriate metaphor for the relationship between humans and robots is that of master and slave"²². Leslie Green is raising the question of morality, she believes, that law should improve the morality in the context of sex and consent²³. Current "sexual morality" is limiting women to the extent that "they feel obliged to avoid certain places, to be careful going out at certain times, to give thought to how their dress and manner will be received—in general, to remain unwillingly vigilant. Few men have experiences that are remotely similar." Also, a minimum age of the robot's appearance should be set, prepubescent bodies should not be used. Although, if experts would find enough evidence for the therapeutic approach then childlike sex robots should be made available to pedophiles under a range of conditions or at least under a medical diagnosis. Whereas in contrast, qualified majority of population should not get access to these robots, also a legal framework should be provided to cover this issue and provide for punishment in the event of illegal distributing and use. The limited access of these robots may be compared with license of marijuana for medical purposes.

In some countries the pornography, images etc. are considered as harmful to children (physically or/and psychologically), because the real children are supposed to feature on child-exploitation material. In Portugal, pornographic material with a realistic representation of underage individuals is a typified crime even though there are no children involved. For the purposes of creation of these dolls no children were harmed directly. On the other hand, the picture of a child could be used for the prototype of the doll's face, which is sure enough to be considered as harmful towards children. Moreover, childlike sex dolls harm children through legitimising and normalising their sexual use. There is an obvious and very common link between possessing a childlike sex doll and a child-abuse material. In the number of cases in UK and Australia, majority of offenders possessing sex dolls also had child pornography, or child-exploitation images. Nevertheless, the purpose of this paper is not to assess the therapeutic approach or to cover psychological or moral part of the issue, though it should be noted that robots are not human beings, even as childlike sex robots are not real children. Yet, without proper regulation these robots, created for good, may lead to real harm to children. Child pornography is a crime, but is it a crime if adult is performing sexual activity with childlike robot? If not controlled, Porn websites may be overflowed with porn where featuring childlike robots.

3.1. Legal framework

Development of technology has raised several legal and ethical concerns, promoting countries and organization to introduce new ethical regulations, as well as often legal solutions.²⁴ In 2018, the European Commission has released a European approach to boost investment and set ethical

²¹ Moeckli, D., Shah, S., Sivakumaran, S., *International Human Rights Law*. 2nd Ed. Ch. 16., 2017, Oxford University Press, UK

²² Frank, L., Nyholm, S., "Robot sex and consent: Is consent to sex between a robot and a human conceivable, possible, and desirable?" *Artificial Intelligence and Law*, vol. 25, 2017, 305–323.

²³ Green, L., "Should law improve morality?", *University of Oxford Legal Research Paper Series*, vol. 73, 2013, 1–38.

²⁴ Kerikmäe, T.; Hoffmann, T.; Chochia, A. (2018), "Legal Technology for Law Firms: Determining Roadmaps for Innovation" *Croatian International Relations Review*, 24 (81), 2018, 91–112; Kerikmäe, T.; Mürsepp, P.; Särav, S.; Chochia, A., "Ethical Lawyer or Moral Computer – Historical and Contemporary Discourse on Incredulity between the Human and a Machine", *Вісник Національної академії правових наук України*, 2 (89), 2017, 27–42.

guidelines. It was then clear that development of AI could raise new ethical issues.²⁵ Some steps have been done since then. In 2018, European Group on Ethics in Science and New Technologies presented Artificial Intelligence, Robotics and 'Autonomous' Systems, which discusses important moral and ethical questions. In 2019, High-Level Expert Group on AI presented Ethics Guidelines for Trustworthy Artificial Intelligence. Nowadays, there are nine main areas that shape the discussion of AI ethics. Yet, none of these legal issues are covered by a special AI legal framework (there is, though, an existing or forthcoming EU legislation), whereas legal personhood of AI is covered neither by EU secondary law relating specially to AI systems²⁶. Should AI systems be deemed subjects of law? Today this question cannot be answered as the discussions about legal personality and electronic personality are still held. European civil law rules in robotics is today one of the fullest and exhaustive legal documents on robotics based on several research taken within years. According to these rules a robot will soon be provided with common definition.

Under Section 10 of Sexual Offences Act (SOA) 2003 of England, it is prohibited to cause a child to engage in sexual activity, while it does not relate to a robot that represents a child. Under Section 1 of The Protection of Children Act (POCA) 1978 of England, it is forbidden "to take, or permit to be taken [or to make], any indecent photograph [or pseudophotograph] of a child [...]", when a meaning of pseudophotograph is vague and its connection to sex robot is controversial as well, unless the picture of a real child would be used in the design of robot's appearance. Under Section 1(2) of The Obscene Publications Act (OPA) 1959 of England, distribution, circulation, sale, hiring, giving, lending, offering for sale or for letting on hire of any obscene article (wide, not limited meaning) should be prohibited. However, the Act covers the sale and distribution of the dolls but "fails to address bare possession"²⁷. Under Section 42 of Customs Consolidation Act of 1876 of England, the list of goods is prohibited or restricted to be imported into UK. The "list" of the following section was amended in 2008 with the Statute Law (Repeals) Act: "All articles bearing or having affixed to them any stamp, name, writing, or other device implying or tending to imply any sanction or guarantee by the Customs or by any other Department of the Government." At the moment, in UK there is no existing framework that would cover directly the possession of childlike sex robots. In 2017, in the United States of America, there was adopted an act named as Curbing Realistic Exploitative Electronic Pedophilic Robots (CREEPER) Act that aims to ban the importation and transportation of child sex dolls and does not address to possession as well. By "Child sex dolls" it is meant any child-looking, anatomically correct mannequin or robot that can be used for sexual purposes. Congress finds that "the dolls and robots not only lead to rape, but they make rape easier by teaching the rapist about how to overcome resistance and subdue the victim".

Under Section 1 of Criminal Attempts Act 1981 of England and Wales even the attempt to commit a crime is considered as crime. Moreover, even if it is impossible to commit a crime, the person should be found guilty. It is considered that an intent or will to commit a crime should be punished. In *Regina v. Shivpuri*²⁸ judgement, Lord Bridge of Harwich stated that "Putting the hand in the pocket is the guilty act, the intent to steal is the guilty mind, the offence is appropriately dealt with as an attempt, and the impossibility of committing the full offence for want of anything in the pocket to steal is declared by [subsection (2)] to be no obstacle to conviction". In terms of sex robots,

²⁵ Joamets, K.; Chochia, A., "Access to Artificial Intelligence for Persons with Disabilities: Legal and Ethical Questions Concerning the Application of Trustworthy AI", *Acta Baltica Historiae et Philosophiae Scientiarum*, 9 (1), 2021, 51–66; Joamets, K.; Chochia, A., "Artificial Intelligence and its Impact on Labour Relations in Estonia", *Slovak Journal of Political Sciences*, 20 (2), 2020, 255–277.

²⁶ SIENNA D "Analysis of the legal and human rights requirements for AI and robotics in and outside the EU.", 4.2. (2019).

²⁷ Chatterjee, B. B., "Child sex dolls and robots: challenging the boundaries of the child protection framework" *International Review Of Law, Computers & Technology*, vol. 34, no. 1, 2020, 22–43.

²⁸ R v Shivpuri [1986] UKHL 2 (15 May 1986).

it can also be approached following the logics this way: if there is an intent and belief that person rapes a woman or sexually abuses a child, which are represented by robots then such person should be guilty of intent and desire to commit a crime. However, currently the fact of having got robot mixed up with a human seem doubtful and implausible.

3.2. Case study

The majority of cases, where childlike sex dolls have been used in sexual purposes accrue to Australia²⁹ and United Kingdom³⁰. The number of men in the UK who appear to show an active interest in the are connected to child sexual abuse is very high. Andrew Dobson³¹ was one of the first people jailed for child sexual abuse. He pleaded guilty importing an indecent object, possessing indecent images of children making indecent images of children³². David Turner³³ have also admitted importing indecent object, possessing 34,000 obscene images, making indecent images, and possessing extreme pornographic images³⁴. According to Section 50 of Customs and Excise Management Act of 1979 another man was jailed in 2018, Sean Doel³⁵ was accused of importing prohibited goods³⁶. He did not possess any indecent images of a child, though. The conclusion must be driven from the cases considered that importing childlike sex doll or robot is a criminal offence. No precedent was provided where sex doll was manufactured or 3D-printed in UK. But acknowledging the legislation it could be claimed that possession of childlike sex doll is not illegal.

CONCLUSION

The childlike sex dolls and sex robots have already been sold, possessed and used in several countries in the world. In the UK the legislation is still not prepared for the issues arising from the rape, assault or sexual abuse of robotic AI. Considering existing law in UK, none of Acts may fully cover the childlike sex robots. Punishing measures may be applied only to those cases, where the image of a child is used in manufacturing under POCA and SOA, criminalization is justified because such use constitutes a secondary harm to a child. Whereas OPA might cover import and transfer of such dolls and robots. Although the possession of such doll and consequently childlike sex robots is not prohibited under existing law. The future harm can be validly interpreted to justify the criminalisation of childlike sex robots and sex robots that are designed to play different “rape scenarios”, because it promotes a damaging culture of the sexualisation of children and represents women in sexist way.

²⁹ Molloy, S. (2020). “Australian Border Force seizes large number of lifelike child sex dolls” *NZ Herald*. <https://www.nzherald.co.nz/world/australian-border-force-seizes-large-number-of-lifelike-child-sex-dolls/4BJN34ARDIMLP4KF2JRJVFGDGA/> (accessed 20.06.2020).

³⁰ Dearden, L. (2019). “Hundreds of child sex dolls seized at UK borders, sparking legal crackdown”, *Independent*. <https://www.independent.co.uk/news/uk/crime/child-sex-dolls-uk-paedophiles-seized-borders-jail-prosecutions-a8844406.html> (accessed 20.06.2020).

³¹ R v Dobson (2017).

³² BBC, “Andrew Dobson jailed for 'child-like' sex doll import bid” 2017, *BBC*, <https://www.bbc.com/news/uk-england-stoke-staffordshire-40383627> (accessed 20.06.2020).

³³ R v Turner (2017).

³⁴ BBC (2017). Ex-school governor who imported child sex doll is jailed. *BBC*. <https://www.bbc.com/news/uk-41203239> (accessed 20.06.2020).

³⁵ R v Doel (2018).

³⁶ Blair, A. (2018). Brit man, 45, in court for 'importing CHILD sex doll from China'. *Daily Star*. <https://www.dailystar.co.uk/news/latest-news/sean-doel-child-sex-doll-16851771> (accessed 20.06.2020).

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