

ATTACK OF THE CLONES: LEGISLATIVE APPROACHES TO HUMAN CLONING IN THE UNITED STATES

ADRIENNE N. CASH¹

ABSTRACT

The legal concerns involving the application of cloning technology to humans should be of utmost concern, as the area is extremely complex. Cloning could potentially have great benefits or disastrous effects. Lawmakers have been careful to make certain that the legislation passed is comprehensive and useful for regulation of the ever-changing field of cloning. From debates on whether reproductive or therapeutic cloning should be permitted or banned, to concerns as to who has jurisdiction over cloning, the battle to develop cloning legislation has been difficult. However, this iBrief argues that the currently-proposed federal legislation is constitutional.

INTRODUCTION

¶1 In the field of science and technology, “there is nothing permanent except change.”² This is especially true when the two merge to form one of today’s hottest and controversial areas of biotechnology, cloning. To most of the world, cloning was simply a work of science fiction in the time before Dolly.³ However, after Dolly, cloning has become a topic of household conversation. It is an area of science that changes daily. This change is causing great controversy.

¶2 The United States has been deliberate in the process of developing a legislative response to the possibility of human cloning. The individual states have already begun enacting legislation, but the federal government has not yet followed their lead. Presidents Clinton

¹ Adrienne N. Cash is a 2003 graduate of the University of Tulsa College of Law. She is admitted to practice before the Supreme Court of Oklahoma and the United States District Court for the Northern District of Oklahoma. She is a member of the National Association of Consumer Advocates and the Phi Delta Phi legal honors fraternity. Ms. Cash practices consumer law with the firm of Humphreys Wallace Humphreys, P.C. in Tulsa, Oklahoma.

² Heraclitus, pre-Socratic Greek philosopher. Heraclitus Quotes, <http://www.brainyquotes.com/quotes/authors/h/heraclitus.html> (last visited Nov. 30, 2005).

³ Dolly was the first animal successfully cloned from an adult cell. She was born at the Roslin Institute in Edinburgh Scotland on July 5, 1996. Roslin Institute, <http://www.roslin.ac.uk/public/cloning.html> (last visited Aug. 20, 2005).

and Bush both have made statements and taken action regarding human cloning. As with all controversial issues, there have been questions about the constitutionality of regulating or banning cloning.

¶3 There is disagreement about whether or not the state cloning legislation and the current federal proposals for cloning legislation are constitutional. This iBrief argues that the proposed federal legislation is constitutional. In Section I, I will discuss the history of cloning legislation in the United States and the current proposed federal legislation. In Section II, I will discuss the constitutional issues surrounding existing and proposed legislation. This iBrief also summarizes the landmark cases surrounding reproductive rights and discusses how those holdings might apply to cloning.

I. LEGISLATIVE RESPONSES TO THE POSSIBILITY OF HUMAN CLONING

¶4 To date, fourteen states have passed legislation pertaining to human cloning.⁴ The cloning laws of the fourteen states are similar to one another in that all ban reproductive cloning and impose rather stiff penalties for violators. Arkansas, Indiana, Iowa, Michigan, North Dakota, and South Dakota have extended the ban on cloning to cover therapeutic cloning as well as reproductive cloning.⁵ California, Connecticut, Massachusetts, New Jersey, Rhode Island, and Virginia have limited their bans to reproductive cloning.⁶ Missouri and Arizona have measures, which address the use of public funds for cloning without specifically prohibiting any form of cloning.⁷ Louisiana also enacted legislation prohibiting reproductive cloning; however the law expired in July 2003.⁸

A. State Laws

1. States Prohibiting Reproductive And Therapeutic Cloning

¶5 Arkansas, Indiana, Iowa, Michigan, North Dakota, and South Dakota have all drafted legislation which prohibits not only reproductive cloning but also therapeutic cloning.⁹ These six states define cloning to

⁴ National Conference of State Legislatures, State Human Cloning Laws, <http://www.ncsl.org/programs/health/genetics/rt-shcl.htm> (last visited Aug. 20, 2005).

⁵ *Id.*

⁶ *Id.*

⁷ *Id.*

⁸ *Id.*; LA. REV. STAT. ANN. § 40:1299.36.1 – 36.6 (repealed 2003).

⁹ ARK. CODE ANN. § 20-16-1001 (2003); IND. CODE. § 16-18-2-5.5, 56.5 (2005) (added By Senate Enrolled Act N. 268 (2005)); IOWA CODE §§ 707B.1-707B.4 (2003); MICH. COMP. LAWS § 333.16274 (2003); N.D. CENT. CODE §§ 12.1-39-01 to -02 (2003); S.D. CODIFIED LAWS §§ 34-14-26 to -28 (2004).

be asexual reproduction which is accomplished by taking genetic material from a human somatic cell (a cell having a complete set of chromosomes obtained from a living or deceased human organism at any stage of development) into a fertilized or unfertilized oocyte whose nucleus has been or will be removed or inactivated in order to produce a living organism. These states do not extend the ban on cloning research to cloning research on non-humans.¹⁰

2. States Prohibiting Reproductive Cloning

¶6 Six other states, California, Connecticut, Massachusetts, New Jersey, Rhode Island, and Virginia, expressly limit the ban on human cloning to reproductive cloning. These states permit cloning for biomedical research, including: cloning to create molecules, including DNA, cells or tissues, gene therapy, or cloning to create non-human animals.¹¹

3. States Prohibiting Funding for Cloning

¶7 The remaining two states with cloning legislation, Arizona and Missouri, do not specifically prohibit or permit human reproductive or therapeutic cloning. The only effect the legislation of these two states has on human cloning is that they ban the use of public funds for human cloning.¹²

B. Federal Government

¶8 As of the winter of 2005, no federal legislation has been passed regulating human cloning. However, it has been suggested that the federal law that requires clinics using assisted reproductive techniques to be monitored also applies to human cloning.¹³

¶9 In response to the announcement of Dolly's birth in 1997, President Clinton enacted a ban on the use of federal funds for cloning research.¹⁴ In 1997, at the request of President Clinton, the National

¹⁰ For example, the legislation of Arkansas and South Dakota does not restrict research in the use of nuclear transfer or other cloning techniques to produce molecules, DNA, cells other than human embryos, tissues, organs, plants or nonhuman animals. ARK. CODE ANN. § 20-16-1001 (2003); S.D. CODIFIED LAWS § 34-14-28 (2004).

¹¹ CAL. BUS. & PROF. CODE § 16004, 16105 (2003); CAL. HEALTH & SAFETY CODE § 24185, 24187 (2003); 2005 Conn. Legis. Serv. 05-149 (West); MASS. GEN. LAWS ch. 111L, § 8(a) (2005); N.J. STAT. ANN. 26:2Z-2 (2003); VA. CODE ANN. §§ 32.1, 162.21 to -22 (2003).

¹² ARIZ. REV. STAT. § 35-196.04 (2005); MO. REV. STAT. § 1.217 (1998).

¹³ NATIONAL BIOETHICS ADVISORY COMMISSION, CLONING HUMAN BEINGS 88 (1997),

<http://www.georgetown.edu/research/nrcbl/nbac/pubs/cloning1/cloning.pdf> [hereinafter CLONING HUMAN BEINGS].

¹⁴ *Id.* at i.

Bioethics Advisory Commission developed a report and recommendations on human cloning in the United States.¹⁵ In 1998, the FDA claimed jurisdiction over cloning in the United States.¹⁶ In 2002, President George W. Bush established the President's Council on Bioethics, which produced a report and recommendations.¹⁷

¶10 The United States House of Representatives and the United States Senate have debated the issue of cloning on a regular basis since 2001, yet, as of the winter of 2005, have failed to enact any federal legislation on the subject of cloning.¹⁸ In 2005, the House of

¹⁵ The Commission ultimately concluded that at the time of the report it was morally unacceptable for anyone to attempt to create a child using cloning technologies. The Commission recommended that the moratorium on the use of federal funds for cloning research be continued and that scientific and professional societies should make it clear that cloning to produce a child would be irresponsible, unethical, and unprofessional. The Commission went on to recommend that a sunset clause of three to five years be placed on any legislation banning human cloning so that reevaluation could occur. The Commission also recommended that no new regulations be implemented regarding the cloning of human DNA or cell lines. *Id.* at 33, 108-109.

¹⁶ In January of 1998, the United States Food and Drug Administration announced that it had the authority to regulate human cloning under the Food, Drug, and Cosmetic Act, 21 U.S.C. § 301 (1997). *FDA Has The Power to Police Human Cloning Experiments*, *NATURE* Vol. 391, No. 6665, Jan. 22, 1998, at 218. The authority of the FDA does not address whether reproductive human cloning should be completely prohibited. It does, however, allow the FDA to ensure that human reproductive cloning experimentation does not proceed before basic safety questions are answered. Richard A. Merrill & Bryan J. Rose, *FDA Regulation of Human Cloning: Usurpation or Statesmanship?*, 15 *HARV. J. L. & TECH.* 85, 99-100 (2001).

¹⁷ The 2002 report and recommendations are titled *Human Cloning and Human Dignity: An Ethical Inquiry*. The Council ultimately concluded that reproductive cloning is unethical and should not be attempted. The majority of the Council members voted to recommend a ban on reproductive cloning and a four-year moratorium on therapeutic cloning. The Council developed seven public policy options pertaining to human cloning. Policy Option One was self-regulation of the professions involved in cloning research with no legislative action. Policy Option Two was a ban on reproductive cloning with neither endorsement nor restriction on therapeutic cloning. Policy Option Three entailed a ban on reproductive cloning with regulation of therapeutic cloning. Policy Option Four entailed governmental regulation of both reproductive and therapeutic cloning. Policy Option Five consisted of a ban on both reproductive and therapeutic cloning. Policy Option Six included a ban on reproductive cloning and a moratorium on therapeutic cloning. The final option was Policy Option Seven, which entailed a moratorium on both reproductive and therapeutic cloning. The vote was 10-7 in favor of the first proposal (Policy Option Six). PRESIDENT'S COUNCIL ON BIOETHICS, *HUMAN CLONING AND HUMAN DIGNITY: AN ETHICAL INQUIRY* xvii, xxix, 92, 93 187-197, 227 (2002), http://www.bioethics.gov/reports/cloningreport/pcbe_cloning_report.pdf.

¹⁸ H.R. 2505, 107th Cong. (2001); H.R. 534, 108th Cong. (2003); S. 303, 108th Cong. (2003).

Representatives introduced four separate resolutions¹⁹ pertaining to human cloning, with the most recent resolution introduced on September 28, 2005. Likewise, the Senate introduced three bills designed to regulate human cloning, with the most recent bill introduced on July 27, 2005.²⁰

1. House Resolutions Introduced in the 109th Congress

¶11 The first resolution introduced in 2005 came on January 4, 2005 with the introduction of H.R. 222, the Human Cloning Research Prohibition Act.²¹ The Human Cloning Research Prohibition Act essentially mirrors the legislation of Arizona and Missouri by prohibiting “the expenditure of Federal funds to conduct or support research on the cloning of humans”²² The resolution does not regulate the process of human cloning—it simply prohibits the use of Federal funds to conduct or support human cloning research. The resolution specifically provides that scientific research, including the use of cloning techniques to clone molecules, DNA, cells other than human embryo cells, or tissues, or create animals other than humans, is protected. Additionally, the resolution does not restrict the use of Federal funds for any cloning research or technology other than human cloning.²³

¶12 The next resolution, H.R. 1357, was introduced on March 17, 2005.²⁴ H.R. 1357 is titled the Human Cloning Prohibition Act of 2005. The Human Cloning Prohibition Act of 2005 is drafted in a manner which clearly prohibits reproductive cloning but does not affect therapeutic cloning or cloning research.

(1) HUMAN CLONING – The term ‘human cloning’ means human asexual reproduction accomplished by introducing nuclear

¹⁹ H.R. 222, 109th Cong. (2005); H.R.1357, 109th Cong. (2005); H.R. 1822, 109th Cong. (2005), H.R. 3932, 109th Cong. (2005).

²⁰ Human Cloning Prohibition Act of 2005, S. 658, 109th Cong. (2005); S. 876, 109th Cong. (2005); S. 1520, 109th Cong. (2005).

²¹ H.R. 222.

²² *Id.*

²³ “(a) Prohibition – None of the funds made available in any Federal law may be obligated or expended to conduct or support any project of research that includes the use of human somatic cell nuclear transfer technology to produce an oocyte that is undergoing cell division toward development of a fetus. (b) Definitions – For purposes of this section – (1) the term ‘human somatic cell nuclear transfer’ means transferring the nucleus of a human somatic cell into an oocyte from which the nucleus has been removed or rendered inert; and (2) the term ‘somatic cell’ means a cell of an embryo, fetus, child, or adult which is not and will not become a sperm or egg cell.” *Id.* § 2. In layman’s terms, the resolution prohibits the use of federal funds to insert human genetic material into an egg in order to promote the cell division process that could develop into a human fetus.

²⁴ H.R. 1357.

material from one or more human somatic cells into a fertilized or unfertilized oocyte whose nuclear material has been removed or inactivated so as to produce a living organism (at any stage of development) that is genetically virtually identical to an existing or previously existing human organism.²⁵

(d) Scientific Research – Nothing in this section restricts areas of scientific research not specifically prohibited by this section, including research in the use of nuclear transfer or other cloning techniques to produce molecules, DNA, cells other than human embryos, tissues, organs, plants, or animals other than humans.²⁶

¶13 On April 26, 2005, the Human Cloning Ban and Stem Cell Research Protection Act of 2005, or H.R. 1822, was introduced.²⁷ The resolution is designed to prohibit human cloning while protecting important areas of medical research, such as stem cell research.²⁸ H.R. 1822 contains a very general definition of human cloning, which can be interpreted as only applying to reproductive cloning.²⁹ The resolution broadly states that it does not restrict practices which are not expressly prohibited. Therefore, this resolution could be interpreted to only restrict reproductive cloning without having an effect on therapeutic cloning.

¶14 The Human Cloning Ban Act of 2005, H.R. 3932, was introduced on September 28, 2005.³⁰ H.R. 3932 is essentially identical to H.R. 1822. As with H.R. 1822, H.R. 3932 can be interpreted to only restrict reproductive cloning without having an effect on therapeutic cloning.³¹

2. Senate Bills Introduced in the 109th Congress

¶15 The first bill introduced in 2005 was the Human Cloning Prohibition Act of 2005, S 658,³² which is drafted in a manner to clearly prohibit reproductive cloning without affecting therapeutic cloning or cloning research.³³ Essentially, the proposed legislation will prohibit taking genetic material from a human, living or deceased, and implanting it into a human, or non-human, egg cell to initiate a pregnancy or

²⁵ *Id.* § 301.

²⁶ *Id.* § 302.

²⁷ H.R. 1822.

²⁸ *Id.* §2.

²⁹ “The term ‘human cloning’ means implanting or attempting to implant the product of nuclear transplantation into a uterus or the functional equivalent of a uterus.” *Id.* § 1001s (a)(1).

³⁰ H.R. 3932.

³¹ *Id.*

³² S. 658.

³³ *Id.* The language is nearly identical to the language quoted above from H.R. 1357.

otherwise create a human. The legislation does not prohibit stem cell research, cloning of animals, or cloning of human tissues or organs.

¶16 S. 876, the Human Cloning Ban and Stem Cell Research Protection Act of 2005, was introduced on April 21, 2005.³⁴ The purpose of S. 876 is to prohibit human cloning and protect “important areas of medical research.”³⁵ The Act prohibits reproductive cloning and specifically protects research, presumably including cloning research and therapeutic cloning.³⁶

¶17 The Human Cloning Ban Act of 2005, S. 1520,³⁷ was introduced on July 27, 2005. The purpose of the Act is to prohibit human cloning. The Act makes it unlawful to implant or attempt to implant the product of nuclear transplantation into a uterus or the functional equivalent of a uterus.³⁸ The Act does not “restrict practices not expressly prohibited in this section.”³⁹

II. IS BANNING CLONING CONSTITUTIONAL?

¶18 Banning or even regulating cloning may not be realistic. Bans or restrictions on cloning could possibly face Constitutional challenges.⁴⁰ A ban on federal funding of human cloning does not raise Constitutional questions.⁴¹ The Spending Clause⁴² permits Congress to spend federal money in whatever way it wishes as long as the general welfare is being promoted.⁴³ However, an argument could be made that a widespread ban on human cloning is indeed against the general welfare, as a ban on human cloning could hinder and potentially destroy many advances in the field of biotechnology and medical research. These problems may arise if legislation were passed that banned the process of cloning altogether. Several Constitutional provisions may be brought into question.

³⁴ S. 876.

³⁵ *Id.*

³⁶ *Id.*

³⁷ S. 1520.

³⁸ *Id.*

³⁹ *Id.*

⁴⁰ Symposium, *Cloning Sheep; Cloning Humans?: A Discussion By Scientists, Lawyers and Ethicists*, 1997 STAN. TECH. L. REV. 2, ¶ 37 (1997), available at <http://stlr.stanford.edu/STLR/Symposia/Cloning/> (click “PDF VERSION” under “Discussion, Debate, and Views”).

⁴¹ Such as the ban on the use of federal funding for human cloning research currently in effect in the United States. See generally Elizabeth Price Foley, *The Constitutional Implication of Human Cloning*, 42 ARIZ. L. REV. 647 (2000).

⁴² U.S. CONST. art. I, § 8, cl. 1 (“The Congress shall have Power To lay and collect Taxes, Duties, Imposts and Excises . . . for the . . . general Welfare”).

⁴³ Foley, *supra* note 41, at 678 (citing *U.S. v. O’Brien*, 391 U.S. 367, 377 (1968)).

A. *The Right to Scientific Inquiry*

¶19 Would banning cloning violate the right to scientific inquiry? There is no clause in the Constitution that specifically enumerates a right to scientific inquiry. However, it has been argued that support for a right to scientific inquiry can be derived from the First and Fourteenth Amendments.⁴⁴

¶20 Historically, scientific theories have been protected because of the immense social importance the United States places on knowledge and intellectual freedom.⁴⁵ The right to scientific inquiry or to research consists of the freedom to pursue knowledge. The strongest arguments in favor of the right to scientific inquiry stem from the First Amendment.⁴⁶

¶21 Scientists do not have the unqualified freedom to pursue whatever inquiries they desire; research may be constitutionally restricted when the government has rational basis for regulation. The right to scientific inquiry must yield to conflicting rights or moral principals at times.⁴⁷

¶22 Support for the right to scientific inquiry can be found in the Fourteenth Amendment by looking at *Meyer v. Nebraska*.⁴⁸ In *Meyer*, the Supreme Court stated that the Fourteenth Amendment right to liberty included the freedom to acquire useful knowledge.⁴⁹ Robert Meyer, a parochial school teacher in Hamilton County, Nebraska, was found guilty of violating a 1919 statute that mandated English-only instruction in all public and private schools and allowed foreign-language instruction "only after a pupil shall have attained and successfully passed the eight grade." His crime: teaching a Bible story in German to a ten-year-old child. The Nebraska Supreme Court upheld Meyer's conviction. The U.S. Supreme Court rejected the ruling of the Nebraska Supreme Court in a 7-2 decision based on Due Process. The Court stated "the established doctrine is that this liberty may not be interfered with, under the guise of protecting the public interest, by legislative action which is arbitrary or without reasonable relation to some purpose within the competency of the state to effect."⁵⁰ "The American people have always

⁴⁴ Lori B. Andrews, *Is There a Right to Clone? Constitutional Challenges to Bans of Human Cloning*, 11 HARV. J.L. & TECH 643, 661 (1998).

⁴⁵ *Id.* at 662.

⁴⁶ *Id.*

⁴⁷ Adam Gusman, *An Appropriate Legislative Response to Cloning for Biomedical Research: The Case Against a Criminal Ban*, 14 ANNALS HEALTH L. 361, 368 (2005).

⁴⁸ 262 U.S. 390 (1923).

⁴⁹ *Id.* at 399.

⁵⁰ *Id.* at 400.

regarded education and acquisition of knowledge as matters of supreme importance which should be diligently promoted.”⁵¹

B. The Right to Procreate

¶23 Other arguments against the regulation of cloning are based on the right of an individual to choose whether to procreate. Based on the Court’s holdings in *Griswold v. Connecticut*,⁵² *Eisenstadt v. Baird*,⁵³ *Skinner v. Oklahoma*,⁵⁴ *Planned Parenthood v. Casey*,⁵⁵ and *Lawrence v. Texas*⁵⁶ it appears that the right to procreate is considered a fundamental right.

¶24 In *Griswold*, the U.S. Supreme Court protected a married couple’s right to privacy to make decisions regarding procreation.⁵⁷ Griswold was the Executive Director of the Planned Parenthood League of Connecticut. She, along with the Medical Director for the League, gave information, instruction, and other medical advice to married couples concerning birth control. Griswold and her colleague were convicted under a Connecticut law which criminalized the provision of counseling, and other medical treatment, to married persons for purposes of preventing conception. The U.S. Supreme Court found that though the Constitution does not explicitly protect a general right to privacy, the various guarantees within the Bill of Rights create penumbras, or zones, that establish a right to privacy. Together, the First, Third, Fourth, and Ninth Amendments, create a new constitutional right, the right to privacy in marital relations. In the concurring opinion, the Chief Justice and Justices Goldberg and Brennan stated

[i]n determining which rights are fundamental, judges are not left at large to decide cases in light of their personal and private notions. Rather, they must look to the “traditions and [collective] conscience of our people” to determine whether a principle is “so rooted [there] . . . as to be ranked as fundamental.” The inquiry is whether a right involved “is of such a character that it cannot be denied without violating those `fundamental principles of liberty and justice which lie at the base of all our civil and political institutions’”⁵⁸

⁵¹ *Id.*

⁵² 381 U.S. 479 (1965).

⁵³ 405 U.S. 438 (1972).

⁵⁴ 316 U.S. 535 (1942).

⁵⁵ 505 U.S. 833 (1992).

⁵⁶ 539 U.S. 558 (2003).

⁵⁷ 381 U.S. at 485.

⁵⁸ *Id.* at 493.

¶25 In *Eisenstadt*, the Court protected an individual's right to privacy to make decisions regarding procreation.⁵⁹ William Baird gave away a contraceptive to a woman following his Boston University lecture on birth control and over-population. Massachusetts charged Baird with a felony, to distribute contraceptives to unmarried men or women. Under the law, only married couples could obtain contraceptives; only registered doctors or pharmacists could provide them. Baird was not an authorized distributor of contraceptives. In a 6-to-1 decision, the Court struck down the Massachusetts law but not on privacy grounds. The Court held that the law's distinction between single and married individuals failed to satisfy the "rational basis test" of the Fourteenth Amendment's Equal Protection Clause.⁶⁰ Married couples were entitled to contraception under the Court's *Griswold* decision. Withholding that right to single persons without a rational basis proved the fatal flaw. Thus, the Court did not have to rely on *Griswold* to invalidate the Massachusetts statute. Justice Brennan wrote, "[i]f the right of privacy means anything, it is the right of the individual, married or single, to be free from unwarranted governmental intrusion into matters so fundamentally affecting a person as the decision to whether to bear or beget a child."⁶¹

¶26 In *Skinner*, the United States Supreme Court invalidated an act, which allowed sterilization of certain criminals who were convicted two or more times of crimes involving "moral turpitude."⁶² The Court did not specifically create a right to procreate with *Skinner*, it merely alluded that the Constitution protected a fundamental right to marry and procreate. Any right to procreate created by *Skinner* would be the right not to be affirmatively deprived of one's right to procreate.⁶³ The *Skinner* Court classified the "right to have offspring"⁶⁴ as "one of the basic civil rights of man."⁶⁵ Under the facts of *Skinner*, a right to clone would not be a right to procreate.

¶27 In *Casey*, the Court reaffirmed the protection of individuals to make decisions regarding intimate relationships, family, and procreation.⁶⁶ The Pennsylvania legislature amended its abortion control

⁵⁹ *Eisenstadt v. Baird*, 405 U.S. 438, 453 (1972).

⁶⁰ *Id.* at 447.

⁶¹ *Id.* at 453.

⁶² *Skinner v. Oklahoma*, 316 U.S. 535, 535 (1942).

⁶³ Shawn E. Peterson, *A Comprehensive National Policy to Stop Human Cloning: An Analysis of the Human Cloning Prohibition Act of 2001 With Recommendations for Federal and State Legislatures*, 17 NOTRE DAME J.L. ETHICS & PUB. POL'Y 217, 239 (2003).

⁶⁴ 316 U.S. at 536.

⁶⁵ *Id.* at 541.

⁶⁶ *Planned Parenthood v. Casey*, 505 U.S. 833, 834 (1992).

law in 1988 and 1989. Among the new provisions, the law required informed consent and a 24 hour waiting period prior to the procedure. A minor seeking an abortion required the consent of one parent (the law allows for a judicial bypass procedure). A married woman seeking an abortion had to indicate that she notified her husband of her intention to abort the fetus. These provisions were challenged by several abortion clinics and physicians. A federal appeals court upheld all the provisions except for the husband notification requirement. The Court discussed its substantive-due-process tradition of interpreting the Due Process Clause to protect certain fundamental rights and ‘personal decisions relating to marriage, procreation, contraception, family relationships, child rearing, and education,’ and noted that many of those rights and liberties ‘involv[e] the most intimate and personal choices a person may make in a lifetime.’⁶⁷

¶28 In *Lawrence*, the Supreme Court recognized that there are “spheres of our lives and existence, outside the home, where the State should not be a dominant presence. . . . Liberty presumes an autonomy of self that includes freedom of thought, belief, expression, and certain intimate conduct.”⁶⁸ On the specific issue of reproduction, the *Lawrence* Court quoted its earlier decision in *Eisenstadt*,⁶⁹ in which it held that “[i]f the right of privacy means anything, it is the right of the individual, married or single, to be free from unwarranted governmental intrusion into matters so fundamentally affecting a person as the decision whether to bear or beget a child.”⁷⁰ Significantly, this language encompasses the right to “beget,”⁷¹ not just to bear. Therefore, this language is particularly applicable to the reproductive cloning situation in which couples seek to beget a child by contributing DNA without engaging in the traditional method of reproduction.

¶29 The issue of cloning has not yet reached the U.S. Supreme Court. However, it has been raised in a Pennsylvania federal court.⁷² A Pennsylvania couple in a federal suit against the University of Pennsylvania Medical Center raised the question of whether any government regulation or prohibition of human cloning infringes on any existing legal rights.⁷³ The couple claimed that the federal ban on human cloning violated their right to privacy. The lawsuit was an attempt to

⁶⁷ *Id.* at 851.

⁶⁸ *Lawrence v. Texas*, 123 S. Ct. 2472, 2475 (2003).

⁶⁹ *Eisenstadt v. Baird*, 405 U.S. 438, 453 (1972).

⁷⁰ *Id.*

⁷¹ Beget means to create. Thesaurus.com, <http://thesaurus.reference.com/> (last visited Nov. 26, 2005).

⁷² *Sheils v. Univ. of Pa. Med. Ctr.*, No. 97-5510, 1998 U.S. Dist. LEXIS 3918 (E.D. Pa. Mar. 23, 1998).

⁷³ *Id.* at *3.

broaden privacy rights so that any reproductive decision, even the decision to have a cloned child, would be protected as much as the right to abortion or contraception. Because human cloning was not possible at the time of the suit, however, the district court held that the couple could not have been denied any rights by the federal ban on human cloning. Accordingly, the district court did not reach the constitutionality of the federal cloning ban.⁷⁴

¶30 Despite the case law indicating that procreation is a fundamental right, it is unlikely that cloning would be considered a fundamental constitutional right.⁷⁵ First, cloning is not specifically mentioned anywhere in the Constitution. Additionally the majority of Americans presumably do not assume cloning to be a basic right. Cloning is a recent development and not part of this country's history or tradition. Access to cloning is not essential to liberty.⁷⁶

¶31 Further, courts have held that there is no fundamental right to undertake experiments, especially on fetuses.⁷⁷ In *Margaret S. v. Edwards*,⁷⁸ a federal court in Louisiana held that a state could regulate experimentation involving the unborn as long as the regulation was rational. The court supported its decision by stating, “[g]iven the dangers of abuse inherent in any rapidly developing field, it is rational for a State to act to protect the health and safety of its citizens.”⁷⁹ This reasoning is applicable to cloning. “Cloning . . . is analogous to embryo research” and thus restrictions on cloning likely would not be “protected by a right to scientific inquiry.”⁸⁰ Likewise, given that cloning is not likely to be a fundamental right, it is unlikely to be protected by the due process clauses of the Constitution.

C. The Constitutionality of the Current and Proposed Legislation

¶32 While some of the states have enacted legislation in a manner that does not interfere with scientific research, others have drafted legislation in such a manner that it could potentially interfere with scientific research and the right to scientific inquiry. Legislation such as that enacted in Arkansas, Indiana, Iowa, Michigan, North Dakota, and South Dakota purports to ban human cloning without affecting non-human cloning. However, the legislation of these six states is drafted in

⁷⁴ *Id.* at *6 n2.

⁷⁵ Cloning is only procreation to the extent that it involves the choice to create a child. See CLONING HUMAN BEINGS, *supra* note 13, at 95.

⁷⁶ *Symposium, The NBAC Report on Cloning Human Beings: What It Did – and Did Not – Do*, 38 JURIMETICS J. 39, 46 (1997).

⁷⁷ Andrews, *supra* note 44, at 663.

⁷⁸ 488 F. Supp. 181 (E.D. La. 1980).

⁷⁹ *Id.* at 220-21.

⁸⁰ Andrews, *supra* note 44, at 663.

such a manner that it could potentially be viewed as overbroad and a hindrance to scientific inquiry by its prohibition on both therapeutic and reproductive cloning. Legislation such as that passed in Arizona and Missouri, on the other hand, stands the best chance of being viewed as constitutional as it does not affect the process of cloning in any aspect and merely regulates the use of state funds in cloning research. The federal government has followed the lead of the states and has drafted its proposed legislation carefully so as not to interfere with research or the right to scientific inquiry. The resolutions introduced by the House of Representatives vary from merely forbidding the use of federal funds for cloning research to prohibiting reproductive cloning while specifically protecting therapeutic cloning and cloning for research. The bills introduced in the Senate are all very similar and appear to protect therapeutic cloning and cloning for research, while prohibiting reproductive cloning.

¶33 Based on the holdings of the Court in *Meyer*, it appears that an argument against legislation completely banning cloning based on the right to scientific inquiry may be legitimate. The acquisition of knowledge is a constitutionally protected right. Cloning research is merely another form of acquisition of knowledge and therefore should be entitled to Constitutional protection. With this in mind, I believe that the legislation of Arizona, Missouri, California, Connecticut, Massachusetts, New Jersey, Rhode Island, and Virginia will withstand Constitutional scrutiny based on the First Amendment. The legislation of Arkansas, Indiana, Iowa, Michigan, North Dakota, and South Dakota is likely to face much higher scrutiny, as it regulates all forms of cloning, including cloning for research. With respect to the proposed Federal legislation, it would appear that House Resolutions 222, 1357, 1822, and 3932 and Senate Bills 658 and 1520 would all survive a challenge based on the First Amendment. Senate Bill 870, on the other hand, would likely have a tougher time surviving a challenge based on the right to scientific inquiry as it is drafted in such a manner that it could be interpreted as overbroad and thereby encompassing and prohibiting all forms of human cloning, including research.

¶34 One slippery slope the legislation of the states and federal government may face if challenged on constitutional grounds is whether the legislation is improperly restricting the right to procreation and thereby interfering with Due Process.⁸¹

⁸¹ There are many other constitutional grounds on which the legislation could be challenged, such as: equal protection; interference with freedom of speech; and interstate commerce. I will not discuss these other potential violations in this iBrief.

¶35 At the present time, the technology of cloning is not advanced enough to create a viable human; therefore, a Constitutional challenge based on Due Process would not likely be justiciable, as there is no actual controversy.⁸² Assuming technology advances in the future to the point where creating a viable human through cloning is possible, it is likely that the Court would find the legislation of the states and the proposed federal legislation to be Constitutional, as for all intents and purposes, cloning is analogous to research on a fetus and therefore not protected.

CONCLUSION

¶36 Though the United States Federal government has yet to enact legislation on human cloning, it is likely that such legislation will be coming soon, perhaps even by the end of session for the 109th Congress. Based on the legislation enacted by the various states and proposals introduced in the House and the Senate, it is likely that when the United States finally enacts federal legislation, the legislation will ban human reproductive cloning. Though therapeutic cloning has caused its share of controversy, it holds such high potential that it is likely that the United States will heavily regulate but permit therapeutic cloning.

¶37 Technology is rapidly changing and cloning is not an area that the United States Government can avoid. However, the road to legislation has been slow and faced with much controversy. It is likely that any legislation enacted pertaining to cloning will be subject to controversy equivalent to that surrounding abortion laws. Though the Constitutionality of cloning legislation will not be determined before the issue is put before the U.S. Supreme Court, it is likely that a ban on all forms of cloning would be deemed to violate the right to scientific inquiry and not be constitutional. On the other hand, a ban prohibiting reproductive cloning, yet permitting cloning research would likely survive a challenge brought under the right to scientific inquiry or due process. Whether it will ever be socially or morally accepted to clone a human being for reproductive purposes is yet to be seen. However, one thing is certain, “[b]egun this clone war has.”⁸³

⁸² See *Sheils v. University of Pa. Med. Ctr.*, No. 97-5510, 1998 U.S. Dist. LEXIS 3918, at *6 n2 (E.D. Pa. Mar. 23, 1998).

⁸³ STAR WARS EPISODE II: ATTACK OF THE CLONES (LucasFilm Ltd. 2002).