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WHY ARE CHICKENS LIKE WOMEN?

"Chickens were the first farm animals to be permanently confined indoors in automated systems based on intensive genetic selection, dietary manipulation, antibiotics, and drugs. According to Broiler Industry magazine, 'Poultry became the first agribusiness because all of the factors making mechanization possible were potentially present, not least of which was the nature of the animal itself.

Relatively large numbers of units could be handled by a single individual, in confined areas. ... A product of man's concentration of poultry under situations of stress is the appearance of a condition known as avian hysteria."

-Karen Davis, "The Ethics of Genetic Engineering and the Futuristic Fate of Domestic Fowl," 1996, Conference paper

Forward & Backward: Cultures of Eugenics

The strange system of human society was explained to me. I learned of the division of property, of immense wealth and squalid poverty; of rank, descent, and noble blood.

—MARY SHELLEY, FRANKENSTEIN, P. 121

In the new millennium we are all living in a global, bio-political society of control, including scientific control over organic life through genetic engineering, and a consolidation of eugenic and cloning consciousness in our culture. Embryo cloning and genetic engineering are efficient eugenic reproductive technologies now being naturalized and marketed worldwide. In the West, people have long been prepared for the clone age in many ways. For example, computer technology is basically cloning

technology—reproduction by copying or replication. Cloning is often invisible: Dolly the sheep looked just like any other lamb of her breed.

In this pamphlet we discuss several urgent questions. For example: How are eugenics and cloning related? Why are women like chickens and chickens like women? How can we recognize eugenic thinking in culture and daily life? How can concerned citizens engage in critical resistance to eugenic culture?

AND WOMEN LIKE CHICKENS?

"Women were the first humans to be permanently confined indoors in automated systems based on intensive genetic selection, dietary manipulation, bodily restriction and drugs. According to Breeder Industry magazine, 'Women became the first reproductive-industry human because all of the factors making mechanization possible were potentially present, not least of which was the nature of women themselves. Relatively large numbers of units could be handled by a single individual, in confined areas. ... A product of man's concentration of women under situations of stress is the appearance of a condition known as female hysteria.' "

-subRosa, 2003

A publication of the HUMAN BETTERMENT FOUNDATION Pasadena, Calif.

HUMAN STERILIZATION TODAY

THE HUMAN BETTERMENT FOUNDATION
321 PACIFIC SOUTHWEST BUILDING
PASADENA, CALIFORNIA

During the last twenty-eight years, California state institutions have sterilized nearly 12,000 insane and feebleminded patients.

The following pages embody results shown by a case-study of the first 10,000 of these sterilizations.

This sterilization is a surgical operation, which prevents parenthood without in any way or degree unsexing the patient, or impairing his or her health. It merely cuts and seals the tubes through which the germ cells—the spermatozoa and ova,—must pass. It is wholly different, therefore, from the crude and brutal operations of castration and asexualization, performed for the selfish purposes of the perpetrators. Primitive and

A SUMMARY HISTORY OF EUGENIC THEORIES AND PRACTICES IN THE UNITED STATES

The term 'eugenics' was conceived by scientist Sir Francis Galton in the 19th century. Eugenic practice includes the systematic elimination of so-called 'undesirable' biological traits and the use of selective breeding to 'improve' the characteristics of an organism or species. One branch of eugenics held that the rich and powerful were genetically superior to the poor, and that whites were in general superior to other races. Such a philosophy has provided convenient justification for a system of structuring inequities.

MELINE

In men, the operation (vasectomy) can be performed under a local anaesthetic in fifteen

Eugenics: Old Style

Give me your tired, your poor, your huddled masses yearning to breathe free, the wretched refuse of your teeming shore. Send these, the homeless, tempest-tossed to me. I lift my lamp beside the golden door.

—TEXT FROM THE STATUE OF LIBERTY

In the 19th century, scientist Sir Francis Galton coined the term 'eugenics' from the Greek words for "true bred." Webster's Dictionary defines eugenics as "a science that deals with the improvement—as by control of human mating—of hereditary qualities of a race or breed."

From the beginning of the 20th century, leading American intellectuals, politicians, and industrial magnates enthusiastically endorsed the study of ways of "improving" human characteristics through selective or controlled mating and breeding. In the US, old style or "negative" eugenics was based on trying to control mating and reproductive practices of the poor, of people from so-called 'inferior' or 'backward' races, people of color, slaves, the mentally retarded and ill, and immigrants. Eugenic methods were crude and included enforced sterilization, socially controlled sexual intercourse, racial hygiene (meaning no cross-race breeding), and restricted immigration. From records kept by the Eugenics Records Office (1904-1939) at Cold Spring Harbor in NY, it is estimated that up to 60,000 people were sterilized in the US in the 20th century.

Eugenics encompasses our deepest fears and greatest desires, but critics have demonstrated its lack of validity as a science and its inherent racism. They have noted the ways eugenics has supported racist practices and other forms of social control since its very inception. As a rationalized means of building an improved human race—much less a "master race"—old-style eugenics was a failure. Despite this, eugenic thinking has re-surfaced strongly in the final decades of the 20th Century, this time in the guise of genetic engineering.

1904: Steel magnate Andrew Carnegie establishes a center for the study of "hybridized peoples," whose researchers seek to understand the "idleness, the inconstancy...and... inadequate intelligence" of "racial mixtures."²

1906: American Breeders Association (ABA) forms a Committee on Eugenics. Their purpose is to investigate and report on heredity, emphasizing the value of "superior blood" and the menace of "inferior blood."



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Human Sterilization Today

During the last twenty-eight years, California state institutions have sterilized nearly 12,000 insane and feebleminded patients.

This sterilization is a surgical operation, which prevents parenthood without in any way or degree unsexing the patient, or impairing his or her health. It merely cuts and seals the tubes through which the germ cells—the spermatozoa and ova—must pass. It is wholly different, therefore, from the crude and brutal operations of castration and asexualization, performed for the selfish purposes of the perpetrators. Unlike these practices, modern sterilization is not a mutilation in any sense of the word.

In men, the operation (vasectomy) can be performed under a local anaesthetic in fifteen or twenty minutes, and in light work occasions no loss of time. In women, the operation (salpingectomy) involving the opening of the abdomen, is comparable to an uncomplicated operation for chronic appendicitis, which means a week or two in bed. In either sex, failures are almost unknown.

EUGENIC STERILIZATION IS NOT AN EXPERIMENT

Eugenic sterilization in this form represents one of the greatest advances in modern civilization. It is not a novelty or an experiment. It has been continuously used by American institutions since 1899, when the first sterilizations were performed in Indiana.

More than 130,000,000 people, including the citizens of twenty-nine American states, are now living under eugenic sterilization laws. Apart from the United States, the countries which have adopted such legislation are the Canadian provinces of Alberta and British Columbia; Norway; Sweden; Denmark; Finland; Estonia; Germany; the Free City of Danzig; the state of Vera Cruz, Mexico; the Canton of Vaud, Switzerland; and Puerto Rico.

THE PROBLEM BEFORE AMERICAN CITIZENS

The situation which has led all these commonwealths to adopt sterilization laws, grows out of such facts as the following: Births among families habitually living on public charity are often 50% higher than births among self-supporting families. The families that contribute children to the state

1907–WWI: Sixteen States adopt sterilization laws for "socially inadequate biological varieties" including criminals and the mentally ill.³

1910s: The wealthy Harriman family establishes the first Eugenics Record Office in Cold Springs Harbor, NY in 1910, and the Kellogg family, the Race Betterment Foundation in 1913. Subsequent societies spring up throughout the U.S. during the teens.

1914: A report made to the ABA states that "Society must look upon germ plasm as belonging to society and not solely to the individual who carries it."

homes for the feebleminded in California, are multiplying about twice as rapidly as the rest of the population.

The burden of taxation due to the mentally diseased and mentally defective, is at the same time steadily mounting.

Comparatively few of the feebleminded are given institutional care, but their presence in the population at large is nonetheless expensive both in direct costs and in lowered efficiency of industry, in crime and delinquency, and in the deterioration of citizenship which is inevitable when a large number of the citizens are mentally abnormal.

{....}

The generally admitted trend of the population toward degeneracy is real and vital. The protection of these unfortunate defectives and their potential children, as well as posterity, is the people's problem. They must decide it. They should have all the material facts before making that decision.

EUGENIC STERILIZATION IS NOT A PANACEA

The principle of compulsory sterilization by the state, under proper safeguards, was upheld as constitutional by the Supreme Court of the United States in the case of Buck vs. Bell (1927). In writing the decision, Justice Oliver Wendell Holmes remarked: "Three generations of imbeciles are enough."

STERILIZATION IS APPROVED BY ALL

The most striking revelation from our studies is the extent to which the policy of eugenic sterilization is approved by those who know most about it.

Patients, relatives of patients, state officials, physicians and surgeons, parole and probation officers, social workers, agree on the value of this practice.

It is a protection, not a punishment, and therefore carries no stigma or humiliation.

WHAT IS THE HUMAN BETTERMENT FOUNDATION?

The Human Betterment Foundation is a non-profit corporation, organized under the laws of California. Its members are eminent in a wide range of professional and business activities. Its first major problem is to investigate the possibilities for race betterment by eugenic sterilization, and to publish the results...Its goal is the constructive, practical advancement and betterment of human life, character, and citizenship, in such manner as to make for human happiness and progress. •••

1919: Margaret Sanger, a leader of the birth control movement, moves to the political right, declaring, "More children from the fit and less from the unfit—that is the chief issue of birth control." Her *Birth Control Review* begins to publish eugenicist arguments. By 1932 she is calling for the sterilization or segregation by sex of "the whole dysgenic population." ⁵

1924: The House of Representatives passes a law effectively restricting all immigration by Southern Europeans—who are considered non-white, or 'degenerate'—to the United States. **1925:** German officials write to state governments in the United States for information on sterilization laws. A leading advocate of eugenics in Germany at the time remarks, "What we racial hygienists promote is not at all new or unheard of. In a cultural nation of the first order, the United States of America, that which we strive toward was introduced long ago. It is all so clear and simple."⁶

New Eugenics and Science

...and so we had lunch, telling each other that a structure this pretty just had to exist.

—JAMES WATSON, THE DOUBLE HELIX, P. 131.

In 1953 the double-helix structure of DNA was discovered by the team of James Watson and Francis Crick using crucial research by Rosalind Franklin and others.

After this, the science of genetics advanced rapidly, and the stage was set for a second wave of "positive" eugenics.

On the sociological side, Frederick Osborn, Director of the Carnegie Institute in the 1930s, had predicted that once a capitalist consumer economy and a nuclear family structure had been developed and firmly established in society, eugenic activity would be seen as a desirable and natural part of a successful rationalized life.

'Recombinant genetics' supplied the science and technology that made a rationalized consumer-choice eugenics possible. It provided what early eugenicists had lacked in their crude breeding experiments: Scientific methods to decode and splice DNA at the molecular level. In recombinant genetics, DNA from any organism can be spliced with that of any other, making control of genetic characteristics possible. This discovery paved the way for genetic engineering and the processes of Assisted Reproductive Technologies (ART): In Vitro Fertilization (IVF), pre-implantation genetic screening of embryos, nuclear transfer (NT) and cloning. These methods promise to deliver an improved genetic heritage in ART offspring.

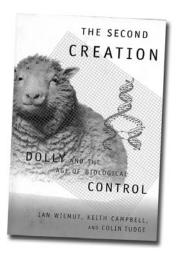
Despite the troubled history

1928: Seventy-five percent of all colleges and universities offer courses on eugenics. A professor at Harvard University teaches that "the solution to crime is the extirpation of the physically, mentally, and morally unfit or (if that seems too harsh) their complete segregation in a socially aseptic environment."

of eugenics in North America, many intellectuals, political and corporate leaders, and scientists today continue to endorse the study of what some consider the "improvement" of human characteristics through scientifically controlled reproduction. In March 2002, for example, James Watson told a BBC journalist that it would be foolish for parents not to use the technology of genetic engineering because genetically enhanced children "are going to be the ones that dominate the world."

In the 21st Century, it appears that eugenics has come into the light of rational science and is no longer a scare-word for many people. Biotechnologies that once seemed like science fiction are now routinely used to engineer human embryos, plants, and animals. Genetically modified (GM) food production is ubiquitous in the US; ART is a thriving industry; animal cloning and stem-cell technologies are advancing rapidly; animal and human drug pharming using transgenics and xenogenetics (cross-species human/

animal DNA recombination) promise to become lucrative enterprises. Many people are asking: Should our fears of eugenics' bad history hold us back from pursuing these seemingly beneficial new developments? Why should we be afraid of eugenics today?



1930s: Eugenicist Frederick Osborn, director of the Carnegie Institute, argues that the public will never accept eugenics as top-down militarized directive; rather, eugenic consciousness would develop as an emergent property within the population as capitalist economy increased in complexity. Once a specific set of social structures (consumer economy and the nuclear family) developed to a point of dominance, eugenic activity would cease to be seen as a monstrous activity, and instead become a taken-for-granted part of everyday life. Beginning in the Great Depression, the Genetics Society of America maintains an unresolved debate as to whether or not to formally condemn the Third Reich's policies.

#...... AVIAN TRANSGENIC TECHNOLOGY

THE PROJECT: For the Efficient Production of Therapeutic Proteins in the Eggs of Transgenic Hens.

Viragen, holds worldwide exclusive license to commercialize Avian Transgenic Technology as granted by the Roslin Institute, Scotland, internationally renowned for their creation of "Dolly the Sheep". This project is designed to substitute chicken eggs for the very expensive vessels presently used in the manufacture of protein-based drugs such as insulin.

PRODUCT IN DEVELOPMENT: Avian Trangenic Technology—Flocks of specially developed transgenic chickens would lay virtually unlimited numbers of eggs expressing high volumes of the target drug in the egg whites.

Using the same antibody construct previously expressed in chicken cell lines, Viragen and Roslin Institute have produced a chimeric transgenic chicken using the techniques of DNA microinjection of zygotes and proprietary chicken embryo culture. This means the antibody construct has been successfully incorporated into the cells of a living chicken. The chimeric transgenic hen is currently being bred in order to establish a transgenic flock whose eggs will contain the targeted drug.

EXPECTED MILESTONES:

- X Expression of Human Antibody in Chicken Cell Line
- X Exclusive Access to Essential Intellectual Property
- X Additional Patent Applications
- X Chimeric Transgenic Chicken Produced
- [] Transgenic Founder Hen Developed
-] Avian Platform Developed for Commercial Production
- [] Early Access Production Collaboration

www.viragen.com/avian_intro.htm www.viragen.com/avian_process.htm



1931: Thirty states adopt sterilization laws, and tens of thousands of American citizens undergo non-consensual sterilization.

WWII: The Rockefeller Foundation and other philanthropic institutions in the United States fund the research of American-trained German eugenicists even after the Nazi Party makes its genocidal intentions clear. That research plays a major role in the subsequent mass murder of millions of Jews, Gypsies, homosexuals, the mentally disabled; artists, political dissidents and others deemed a threat to the purity of the so-called Aryan race.⁸

Cultures of Eugenics and Cloning

Intel has adopted a strategy called Copy Exactly. That may sound like the slogan of some people's republic devoted to plagiarism, but it's actually the newest thing in corporate capitalism. The company, which makes its computer chips all over the world, discovered dismaying variations in quality and output from plant to plant, and these variations cost money. Intel's solution was to figure out the single best way to make a given chip and then set about cloning this ideal factory.

—DANIEL AKST, NYT MAGAZINE, DEC. 15, 2002, P 72

Eugenics is simultaneously invoked as a scientific process and a social philosophy. Eugenic consciousness is increasingly becoming normalized through the processes of genetic engineering. Human dreams of achieving immortal life and overcoming death and disease, seem stronger than ever: Look at the thousands of aging baby boomers and post-boomers in the US, lining up for plastic surgery, pharmaceutical rejuvenation, potency

remedies, Botox injections, and body parts replacement operations. In the past 25 years, targeted entrepreneurial development of the science and technology of human ART has provided extensive knowledge of embryo and cell development so necessary to the pioneering work of animal cloning. Human fertility research was founded on bovine assisted reproductive techniques, and in turn, much of the research that produced Dolly

POST WWII: While the Nazi atrocities do much to discredit this brand of eugenics in the United States, it has never completely disappeared. Some of its arguments resurface in the 1950s in the 'Population Control' movement. Racism continues to infect the birth control movement. In 1939, the American Birth Control Federation designs a "Negro Project," whose aim is to control the "breeding" of blacks in the South.

1942: Sanger's Birth Control Federation changes its name to Planned Parenthood. While "these organizations did perform the very valuable role of making contraception more available and accessible...at the same time...they shifted the focus away from women's rights, embraced eugenicist and elitist views of the poor, and adopted a limited, top-down approach to services."



1950s: In the late 1950s, ultra high-dose birth control pills are "tested" on women in Puerto Rico and later in El Salvador, resulting in numerous deaths and serious consequences to the health of hundreds of women.

1960: Continuing developments in genetic sciences usher in a second wave of eugenics in the United States. Unlike the first wave of eugenics, which had a conspiratorial aura about it, the new eugenics are (as Osborn predicted) emerging as voluntary, driven by the dominance of consumer economy and the nuclear family in late capitalist culture.

the sheep was derived from advances in human ART.

Scientists are applying many of the genetic engineering techniques learned from animal research to the production of human embryos and embryonic stem cell lines. They argue that the sequencing of the Human Genome has clearly shown that humans are not very different genetically from animals after all, so that crossing species boundaries in genetic engineering is really no different in effect than the methods employed in animal breeding for thousands of years. Genetic manipulation learned from animal cloning is "unlocking the secrets of life" thus potentially giving humans more control over the production and reproduction of the living world. The combination of eugenic thinking, and cloning and stem cell technologies, promises at last to deliver what humans have always yearned to achieve: Immortality, perfect-ibility, and perfect health.

Cloning is presumably a more efficient technology because once all the biological materials and technological processes are in place, many hundreds of embryos can be produced assembly-line fashion and implanted in many animals to (hopefully) create whole flocks and herds of transgenic offspring at a time. Controlled replication, speed, volume, and efficiency are at the very heart of cultures of eugenics.

1970s-80s: The number of articles in the popular print media that attribute genetic causes to complex social and economic phenomena increases dramatically. In the six-year period from 1976 to 1982, *The Reader's Guide to Periodical Literature* displays a 231 percent increase in the number of articles attempting to demonstrate a genetic basis for crime, mental illness, intelligence, and alcoholism. Between 1983 and 1988, the number of articles attributing a genetic basis for crime quadruples in frequency over the previous decade. As Troy Duster points out, the explosion in such claims in both the popular and scientific literature came not from those working at the vanguard of molecular genetics or biochemistry, as one might expect. Instead, the major data source for the resurgent eugenicist claims was "a heavy reliance on Scandinavian institutional registries dating back to the early part of the century." Beginning in the 1970s, Population Control becomes a major strategy of 'first world' multilateral lending institutions, and high-tech, high-profit injectable or implant contraceptives such as the IUD, Norplant, and hormone injections begin to be pushed at the expense of safer, lower-profit barrier methods—and at the expense of ensuring access to basic healthcare.

CAUTION: FORWARD-LOOKING STATEMENTS

"A genetically modified chicken named Britney, has been unveiled by the Roslin Institute (which accomplished cloning of Dolly the sheep) in conjunction with the US biotechnology company Viragen Inc., of Plantation, Florida, She and her descendants are intended to join an army of special purpose medical supply animals that will be introduced to the world in the coming years. ..Each modified chicken should lay about 250 eggs per year from which a variety of proteins in relatively large volumes can be easily extracted, functioning as mini pharmaceutical plants."

www.mercola.com/fcgi/pf/2000/dec/24/modified_chickens.htm

"But it seems to have been a case of counting eggs before they are hatched.

'There is no Britney,' a Roslin spokeswoman told Reuters.

'The announcement is about work to be done in the future.

It is not done yet,' she added."

archives.cnn.com/2000/HEALTH/cancer/12/06/health.chickens/reut/

"In order to provide genetically matched embryonic stem cells derived from cloning to treat the potential patient pool, scientists would have to obtain at least 670 million eggs donated by at least 67 million women."

www.stemcellresearch.org/facts/dothemath.htm

"People say it would be terrible if we made all girls pretty.

I think it would be great!" -James Watson



1980s: Sperm banks that select donors according to intelligence, looks and success are founded. One of these sperm banks prohibits artists from being donors. One scientist founds a sperm bank exclusively for Nobel Prize winners. In this explicitly eugenicist project, only women who were members of MENSA could receive the sperm.

1990s: At least one college coed with "desirable traits" sells her eggs for \$50,000. A spate of books such as *The Bell Curve* reintroduce earlier eugenicist's argument about the genetic basis of social inequality. This argument is only the most extreme variation, symptomatic of the ideological geneticism being accelerated by the new biotechnologies.

Chickens & Women

Women and chickens both produce eggs, and eggs are all-important in today's genetic engineering industry. Eggs are the productive matrix (matrix =mother or womb; generator, originator) for cloning embryos from which in turn embryonic stem cells are derived. Eggs are also important drug factories: "The chicken egg, as nature's bioreactor, offers a far more preferable drug manufacturing vehicle as compared to present equipment or other transgenic production methods, such as with mammals....Chicken proteins... have nearly identical sugars to humans...which offers distinct advantages to patients.." [www. viragen.com/ avian chickeneggs.htm]

Genetic engineering, cloning, and stem cell biology make it possible to introduce irrevocable changes in reproductive and

generative processes. Women's body parts such as eggs, uteri, hormones, placentas, umbilical cord blood, and embryos, are often the raw materials of these processes; yet there is no acknowledgement of how this replays very old actual and metaphorical colonizations of female bodies, creativity, and productive labor. Patented, live cell-lines derived from women's body parts are being circulated all over the world without compensation or acknowledgement of donors, or discussion of who is supplying this immensely valuable material, under what conditions, and who is-or is not—benefiting from it.

Chickens have long been the factory-farmed animals of choice. Through the use of continuous feeding with fortified meal and antibiotics, crowded confinement inhibit-

1999: A website devoted to the sale of the eggs of supermodels promising "beauty to the highest bidder" asks \$10,000 to \$150,000 per egg. Its owner declares, "This is Darwin's 'Natural Selection' at its very best...this 'Celebrity Culture' that we have created does better economically than any other civilization in history..."

2003: Eugenic ideologies continue to affect everyday life: Today in the United States women who are Native American, African-American, Puerto Rican, Chicana, or poor are more likely to be sterilized than white women from the same or higher socioeconomic classes. As in the past, while some women are discouraged or prevented from reproducing, others are encouraged and actively sought out as new market subjects for a lucrative medical/pharmaceutical industry. As Osborn predicted, eugenic ideology is rapidly being naturalized. Under the guise of optimizing reproduction—and "improving" human beings—today's reproductive technologies are being implemented without a critical discussion of their eugenic content.

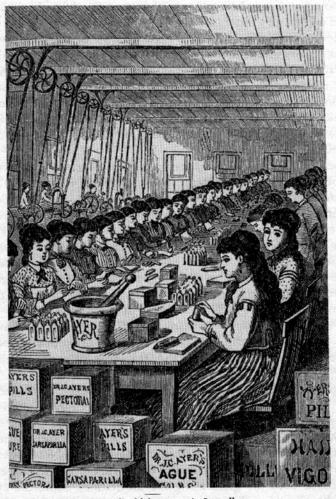


Fig. 20 Women at work in a medical laboratory in Lowell, Massachusetts, in the late nineteenth century. (Penny 1870:396. Library of Congress.)

NOTES: 1. Jeremy Rifkin, The Biotech Century: Harnessing the Gene and Remaking the World, (New York: Jeremy P. Tarcher, 1998), p.116; 2. Betsy Hartmann, Reproductive Rights and Wrongs: The Global Politics of Population Control (Boston: South End Press, 1995), p.98; 3. Jeremy Rifkin, The Biotech Century: Harnessing the Gene and Remaking the World, p.126; 4. ibid; 5. ibid; 6. ibid; 7. Critical Art Ensemble, Flesh Machine: Cyborgs, Designer Babies and New Eugenic Consciousness (New York: Autonomedia, 1998), Chapter 6; 8. See War Against the Weak: Eugenics and America's Campaign to Create a Master Race, Edwin Black, (New York: Four Walls Eight Windows, 2003); 9. Betsy Hartmann, Reproductive Rights and Wrongs, p.98; 10. Troy Duster, "The Prism of Heritability and the Sociology of Knowledge," Laura Nader, ed., Naked Science (New York: Routledge,1996), p.119-120. ADDITIONAL SOURCES: Troy Duster, Backdoor to Eugenics, (Boston: Routledge and Kegan Paul, 1990).

ing movement, medication, and controlled lighting, genetically "improved" chickens can now be raised to market-ready size in 49 days. And as we have seen, chicken eggs produced by genetically engineered cloned chickens are now being used as drug factories. Workers in chicken growing and processing factories (many of them women and undocumented workers) are treated quite similarly to the chickens: Long hours, low pay, grueling and dangerous working conditions, crowded housing, and no job security or benefits are their lot. These conditions have only gotten worse as the efficiency technologies of genetic engineering and rationalized food production are becoming more and more widespread.

subRosa speculates that the genetic engineering of chickens and the use of eggs as matrices for transgenic pharmaceutical production will provide scientific knowledge and data that could be applied in the future to women.

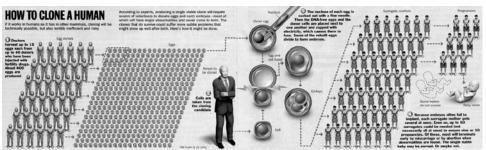
Roslin Institute [the company

that cloned Dolly the sheep] has joined Viragen to clone a transgenic chicken [already named Britney] whose eggs will be used to produce therapeutic human drugs like insulin.

We suggest that Britney, the socially (and, it is rumored, cosmetically) engineered American teen idol is linked in more than name to Britney, the genetically engineered pharm chicken-of-the-future.

Britney the pharm chicken is sister to Dolly the cloned sheep, just as Britney Spears shares a cultural legacy with Dolly Parton the singer.

The two Britneys and two Dollys provide real life examples of how new eugenic consciousness is perpetuated through the cultures of transgenic science and the popular media.



The Delmarva Poultry Justice Alliance

The	e Many	Finger I	Prints o	on a Pi	ece of	Chicker

The Delmarva Poultry Justice Alliance is an alliance of people and organizations who live in and around the poultry industry working together for justice within the industry.

We are the people of the poultry industry. We bring American families Sunday dinner, the summer picnic and supper after work.

We are the farmers, the chicken catchers, the processing plant workers, the communities, religious organizations, environmentalists, those concerned about animal husbandry, and the consumers that support and sustain the poultry industry, so that the industry will serve the needs of people as well as profit.

Our farms grow the livestock. Our hands catch and process the products. Our environment suffers the waste. Our communities are home to the farms, the processing plants, the farmers and workers. Our families consume the products. And our religious leaders minister to the spiritual and human needs of the poultry industry's needs. Religious people say grace over poultry.

We Make Profits Possible

We have produced the product and sales that have brought an explosion of profits to the owners and corporate mangers of the industry. We have earned the right to be heard. In 10 years, sales of poultry products have increased almost 400 percent, and profits have risen 325 percent to \$2.1 billion a year.

Profits Without Conscience

By 1995, poultry workers could no longer earn enough wages to meet the government-defined poverty line. Real wages for poultry workers have fallen in the past decade, from an average of \$5.87 an hour in 1987 to \$5.66 an hour in 1997.

While the demand for the product has soared, real return to the farmers has dropped. In 1995, research indicated that over 73 percent of farmers earned a below poverty level income from their poultry operations. Many farms face bankruptcy, and families are being forced off the land.

While the industry has grown and prospered, our communities have paid the price. Low wage, high turnover jobs cannot support stable families and sustainable communities. The industry exploits new immigrant workers, as well as native born families and communities, in order to maintain low wages. Our communities can only be strengthened when the industry provides a decent standard of living for all.

The corporate managers of the industry have not taken care to protect our environment. Our water and land have been polluted, threatening other industries as well as the health of our families and our natural habitat. Excessive runoff of poultry manure into our streams, rivers and bays leads to environmental disasters such as massive fish kills. Although the poultry companies own the poultry, they have pawned the responsibility of waste disposal off onto the farmer and the American taxpayer to clean up after their animals.

Far too often food safety can be compromised in the rush to make profits, and chicken feed can contain heavy metals, antibiotics and medications, and other components that may potentially threaten consumers. These heavy metals also accelerate the growth of poultry creating birds which grow to a market ready chicken in 49 days. A pace that their bones and internal organs cannot keep up with.

Profits With Conscience

Like a patchwork quilt, the people of the poultry industry have come together finding common ground on the poultry companies front door step. Gaining strength from our diversity we stand and work together toward change of the poultry industry's bad habits.

The Poultry Companies Must Meet Basic Moral and Ethical Standards of Operation

Respect the earned rights of workers to safe working conditions, fair wages and benefits, and an organized voice in their workplaces. Employers must pledge non-interference in the exercise of workers' right's and freedom of speech under the law.

Respect the earned rights of farmers to earn a fair return through equitable contracts and to an independent voice for themselves in the industry. Poultry companies must pledge non-interference in the exercise of the farmers' right's and freedom of speech under the law.

Respect the earned rights of the community and the consumer to fair employment practices that promote stable jobs and quality products, to strict environmental safeguards, and to safe and wholesome food. Poultry companies must pledge full disclosure to consumers and communities of employment, environmental and food safety practices.

Poultry companies must treat all of the people of the poultry industry and the surrounding environment with dignity and respect.

It is the people's earned right.

www.dpja.org





Conclusion: Does Eugenics Work?

The early social applications of negative eugenics, especially sterilization, were a tragic failure from both a scientific and social point of view. "Positive" eugenics through genetic engineering is based on a belief in genetic essentialism (that DNA determines the organism's characteristics), rather than on the development of the organism through interaction with its environment, Richard Lewontin has shown that this interaction is extremely complex, social, and in continuous flux throughout the organism's life.1 There is no one gene for intelligence, for example. Instead, possibly hundreds of genes play a role in intelligence, as does the particular home environment, social culture, affective care, nutrition, education, and economic and class status of the individual. Almost all living organisms are in a state of becoming, rather than a fixed or essential state (of stupidity or intelligence, etc.) as eugenic thinking suggests. It is this essentialist ideology we need to resist, rather than biotechnology or science as such. Eugenic thinking tolerates no difference or diversity. Rather, it thrives on domination, conformity, normalization and control. In the

US, eugenic ideology underlies much scientific work as well as government welfare policy, racial relations, and even political and foreign policy. Artists and activists can contest US cultures of eugenic thinking through critical social interventions and tactical artworks that involve audiences in direct experiences and engagements with these ideas.

1. R. C. Lewontin, *Biology as Ideology:* The Doctrine of DNA (NY: HarperPerennial, 1991).

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—subRosa

This pamphlet was originally produced by subRosa in conjuction with the YOUgenics V.02 exhibition curated by Ryan Griffis. This revised fourth edition was produced for subRosa's *U-GEN-A-CHIX: Why are Women like Chickens*? performance October 14, 2008 as part of the 14th International Festival of Contemporary Arts - City of Women Festival "Raw Symbiosis: Animals-Nature-Culture" in Ljubljana, Slovenia.

