

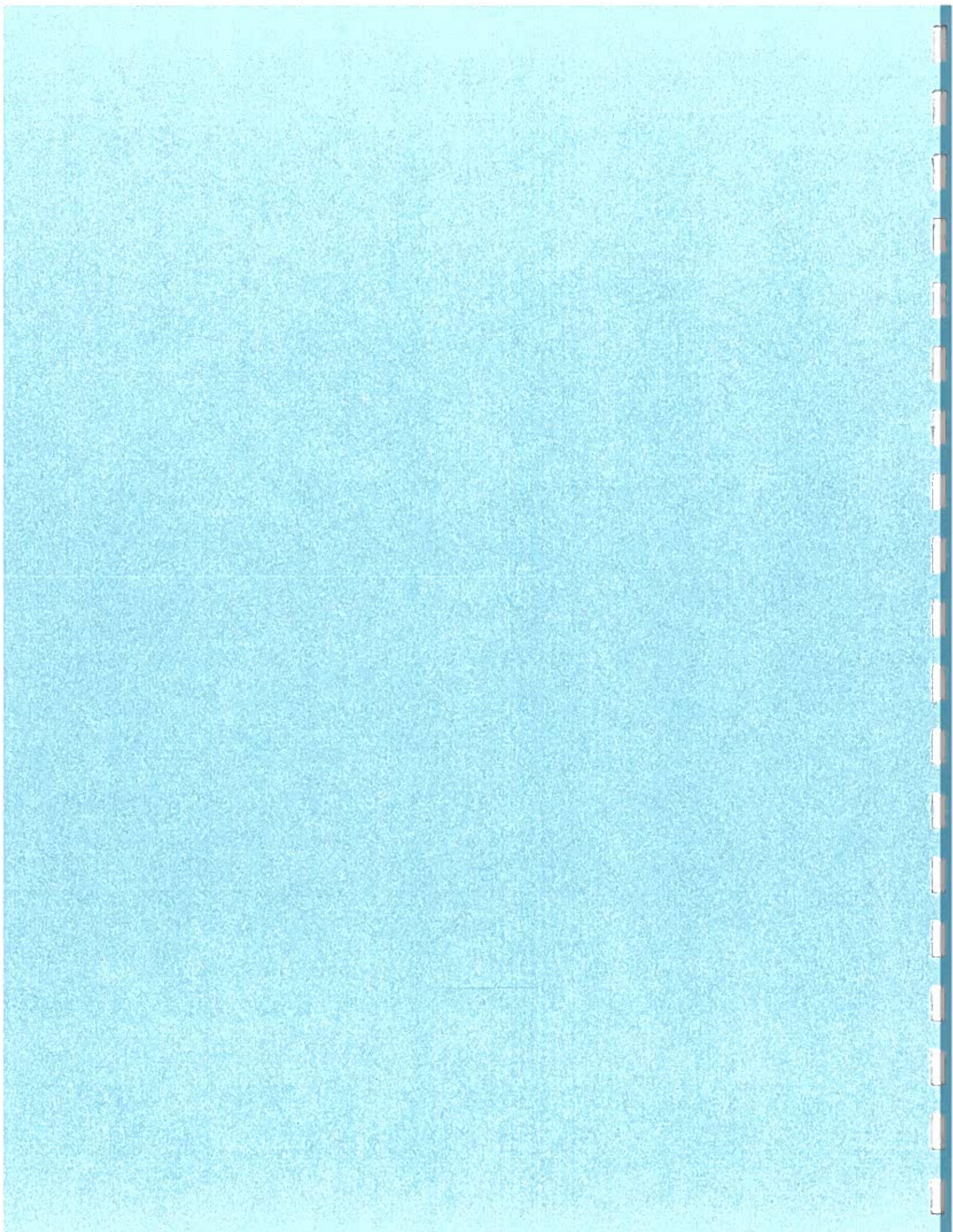
PROCEEDINGS



**A
CONFERENCE
FOR
STUDENT SCHOLARS
AT
TWO-YEAR COLLEGES**

**WESTCHESTER COMMUNITY COLLEGE
Valhalla, New York**

FUNDED BY A COALITION OF TWO-YEAR COLLEGES



Dear Reader:

The 2002 Beacon Conference was dedicated to Joseph Abeles and his late wife, Sofia Abeles, friends and promoters of academic excellence at Westchester Community College.

The WCC Faculty Senate, the WCC Library Department, and 17 Holders of Endowed Chairs in a variety of disciplines have joined us in our tribute by sponsoring 14 of the 15 panels held.

We gratefully acknowledge their support.

Sincerely,
Carol Klein and Mira Sakrajda
Beacon 2002 Co-Directors



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INTRODUCTION

Beacon '02

is a conference for student scholars at two-year colleges. This conference is funded by a coalition of two-year colleges. In addition to Westchester Community College, the other sponsoring colleges are Bergen Community College (NJ), Bronx Community College (NY), Brookdale Community College (NJ), Community College of Philadelphia (PA), Dutchess Community College (NY), Frederick Community College (MD), Harford Community College (MD), Lehigh Carbon Community College (PA), Montgomery College (MD), Northampton Community College (PA), Ocean County College (NJ), Queensborough Community College (NY), Raritan Valley Community College (NJ), Reading Area Community College (PA), Rockland Community College (NY), and Ulster County Community College (NY).

Panels of students presented papers on diverse subjects in the various fields of inquiry explored at two-year colleges. Each panel was judged by a scholar in the field, and the outstanding presenter on each panel, along with his or her faculty mentor, were awarded prizes of \$100 each.

In this booklet, the most outstanding papers are reprinted. In the overview of panels, these presentations are indicated by an asterisk.

Session I - Business and Economics
9:00 - 10:30 AM
AAB 310

Readers: Tom Anderson, Montgomery College
Matt Connell, Northampton Community College
Sandra Ferriter, Harford Community College

Judge: Paul Loomba, Baruch College

Moderator: Farhad Ameen, Westchester Community College

1. Kiera Caponi
Dutchess Community College
Rhinebeck's Drug Store War
Mentor: John Desmond
2. Gina D'Angelo
Dutchess Community College
Making it in the Craft Business
Mentor: John Desmond
3. *Thomas Sawyer
Brookdale Community College
Dreaming of Adam Smith:
18th Century Mercantilism in 20th Century Images
Mentor: Elaine H. Olaoye

Panel Sponsors:

Jeffrey Conte

Holder of the Sylvia and Leonard Marx, Jr. Distinguished Chair in Business Management

Teresita Wisell

Holder of the Sophia and Joseph Abeles Distinguished Chair in Admissions

Session I - Communications/Media Studies
9:00 - 10:30 AM
AAB 306

Readers: Michael Griffith, Northampton Community College
Sue Ellen Liebman, Community College of Philadelphia
Robert Pucci, Ulster County Community College

Judge: Savannah Walker, *The New York Times*

Moderator: Eileen Shea, Westchester Community College

1. *Allison Jones
Westchester Community College
Styles of Communication:
How Patterns Form and How They Can Be Changed
Mentor: Elaine Giardino
2. Dana Naim
Rockland Community College
The Beauty Myth:
How the Media Hinders the Mind and its Understanding of the Truth
Mentor: Nancy Hazelton
3. Joseph Wozniak
Montgomery College
Society in a Box: The Effects of Television on Social Roles
Mentor: Tom Anderson

Panel Sponsors:

William Costanzo

Holder of the Nancy and William Olson Distinguished Chair in English

Donald Gregory

Holder of the Frederick Sessions Beebe Distinguished Chair in Journalism

Session I - Gender Studies
9:00 - 10:30 AM
AAB 304

Readers: Leslye L. Friedberg, Community College of Philadelphia
Nancy Leech, Rockland Community College
Lori Walk, Raritan Valley Community College

Judge: Dorothee Von Huene-Greenberg, Pace University

Moderator: Susan Shumejda, Westchester Community College

1. Erin Bevan
Westchester Community College
*Women, Society, Morality and Psychological Disorders
of the Nineteenth Century*
Mentor: Elizabeth Gaffney
 2. *Carol Robinson
Westchester Community College
*The Legacy of Pandora and Eve:
Women in Ancient Greek and Early Christian Societies*
Mentor: Mira Sakrajda
 3. Amy Zerello
Westchester Community College
Rest Stops: Factors Along the Road to Hysteria
Mentor: Elizabeth Gaffney
-
-

Panel Sponsor:

Susan Shumejda

Holder of the Joseph and Sophia Abeles Distinguished Chair in Counseling, Women's Forum

Session I - Shakespeare

9:00 - 10:30 AM

AAB 308

Readers: Alan Kaufman, Bergen Community College
Robert T. Mundhenk, Northampton Community College
Timothy Sedore, Bronx Community College

Judge: Nancy Brown, Marymount College

Moderator: Christine Timm, Westchester Community College

1. *Samuel Bellaviti
Rockland Community College
Authority in OTHELLO: Iago and the Breakdown of Order
Mentor: Nancy Hazelton
2. Suzette Morgan
Corning Community College
The Two Ophelias in William Shakespeare's HAMLET
Mentor: Paul McNaney
3. Gina Rocco
Rockland Community College
Moral and Ethics in OTHELLO: Honest Iago
Mentor: Nancy Hazelton

Panel Sponsor:

**The Library Department
of Westchester Community College**

Session I - Technology and Technical Studies
9:00 - 10:30 AM
AAB 414

Readers: Robert Kahn, Queensborough Community College
Michael Priano, Westchester Community College
Michelle Rodden, Ulster County Community College

Judge: Andy Sakrajda, IBM--Watson Research Center

Moderator: Susan Cremins, Westchester Community College

1. Michelle Mays
Montgomery College
To Die or Not to Die: A Look at Technology and End-of-Life-Care
Mentor: Tom Anderson
2. Adam Weidenhammer
Montgomery College
Pharmacy Chips and Molecular Machines: Medicine's Ultimate Frontier
Mentor: Harold Hultman
3. *Taffy Lee Williams
Westchester Community College
High Intensity Military Sonar: Ocean Patrol or Killing Machine?
Mentor: Britt Argow

Panel Sponsors:

Albert W. Liberi

Holder of the Joseph and Sophia Abeles Distinguished Chair in Mathematics

Rose Tan

Holder of the Joseph and Sophia Abeles Distinguished Chair in Mathematics

Session II - History

10:45 - 12:15 PM

AAB 306

Readers: Donna Acerra, Northampton Community College
Sheldon Avery, Harford Community College
Barbara Franz, Ulster County Community College

Judge: Nancy Bisaha, Vassar College

Moderator: Frank Fato, Westchester Community College

1. Jacqueline Botch
Reading Area Community College
Berks County Recent Find in Connection with the Underground Railroad
Mentor: John Lawlor
2. *Rebecca Miller
Frederick Community College
"Arouse ... Men of Maryland": Confederate Sentiment in Frederick County
Mentor: Michael A. Powell, Jr.
3. Kim Tamura
Westchester Community College
The Handicapped in Germany: Changing Attitudes, Changing Times
Mentor: Michael Bobkoff

Panel Sponsor:

Daniel Shea

Holder of the Sophia and Joseph Abeles Distinguished Chair for Distance Learning

Session II - Literature: An Interdisciplinary Approach
10:45 - 12:15 PM
AAB 304

Readers: Antoinette M. Aleccia, Montgomery College
Libby Bay, Rockland Community College
Sharon Hendriksen, Northampton Community College

Judge: Bette Kirschstein, Pace University

Moderator: Richard Rodriguez, Westchester Community College

1. Jean Dalton
Westchester Community College
A Natural Woman
Mentor: Elizabeth Gaffney
2. Jose Luis Fernandez
Westchester Community College
Existential Determinism in Works by Chopin, Gilman, Heker and Hemingway: The Concomitant Results of Bad Faith
Mentor: Tahira Naqvi
3. *David King
Montgomery College
Voices of Liberation:
The Literary Power and Historical Value of the Slave Narrative
Mentors: Diane Ganz Scheper and Mary Furgol

Panel Sponsor:

Greta Cohan

Holder of the Carol S. Russett Distinguished Chair in English

Session II - Natural and Physical Sciences
10:45 - 12:15 PM
AAB 414

Readers: Mark S. Condon, Dutchess Community College
Eric DeAngelo, Lehigh Carbon Community College
Gerald G. Janauer, Ulster County Community College

Judge: Joseph Scrivinak, SUNY Purchase

Moderator: Bernard Koser, Westchester Community College

1. Julian Montefusco
Ocean County College
What is Gravity?
Mentor: Edwin Kaiser
2. *Donna Zeman
Rockland Community College
*Transformation in Gram-Positive Bacteria
versus Gram Negative Bacteria*
Mentor: George Krasilovsky
3. Wenshuo Zhang
Rockland Community College
*The Effects of Direct and Indirect Ethanol and Scope Exposure
on the Growth of E. Coli and S. Aureus*
Mentor: George Krasilovsky

Panel Sponsor:
William Bastiansen
Holder of the Joseph and Sophia Abeles Distinguished Chair in Chemistry

Session II - Philosophy and Religious Studies
10:45 - 12:15 PM
AAB 308

Readers: Michael Bobkoff, Westchester Community College
Dean J. Nelson, Dutchess Community College
Harold Weiss, Northampton Community College

Judge: Alex Delfini, Iona College

Moderator: Rachelle Saltzberg, Westchester Community College

1. *Joanna Caccavo
Rockland Community College
*A Comparison of Plato's THE REPUBLIC and
Jean-Jacques Rousseau's THE SOCIAL CONTRACT*
Mentor: Nancy Hazelton
2. John Kimmel
Rockland Community College
*Proof or Faith:
The Struggle Between Scientific Progress and Religious Tradition*
Mentor: Nancy Leech
3. Leah Soss
Rockland Community College
The Nature of Truth: Plato, Nietzsche and the Sophists
Mentor: Samuel Draper

Panel Sponsor:

Joseph N. Hankin

Holder of the Jack and Ralynn Stadler Distinguished Chair for Art and Culture in Society

Session II - Social Justice
10:45 - 12:15 PM
AAB 310

Readers: Lilli Downes, Harford Community College
Susan L. Moore, Dutchess Community College
George Skau, Bergen Community College

Judge: Adelaide Villmoare, Vassar College

Moderator: Ava Drutman, Westchester Community College

1. Jodi Corbett
Reading Area Community College
Uphold Individual Accountability in Pennsylvania Public Drinking Laws
Mentor: David Leight
2. *Rory Doyle
Westchester Community College
The American Welfare State: Its Past, Present, and Future
Mentor: Mira Sakrajda
3. Carol Van Sciver
Northampton Community College
Why Not Hemp?
Mentor: Randy Boone

Panel Sponsor:
The Faculty Senate
of Westchester Community College

Session III - Allied Health and Nursing
1:45 - 3:15 PM
AAB 414

Readers: Jane A. Claffy, Ulster County Community College
Kathleen DeLuca, Westchester Community College
Marion Doyle, Northampton Community College

Judge: Margaret Kasper, Phelps Memorial Hospital

Moderator: Colleen Booth, Westchester Community College

1. Stephanie Harrison
Westchester Community College
Maybe It's Not 'Just In Her Head'
Mentor: Mira Sakrajda
2. Robert Tondo
Montgomery College
Homeopathy Works: The Why and the How
Mentor: Harold Hultman
3. *Kellie Yaskanich
Sullivan County Community College
Stress: The Root of All Evil: Identifying and Managing Stress in Your Life
Mentor: Peter Phipps

Panel Sponsors:

Barbara Chakmakjian
Holder of the Harvey Picker Distinguished Chair in Radiologic Technology

David Bernstein
Holder of the Sophia and Joseph Abeles Distinguished Chair in English as a Second Language

Session III - Literature
1:45 - 3:15 PM
AAB 306

Readers: Barbara Love, Northampton Community College
Susan Quarrell, Rockland Community College
Mary Somers, Harford College of Maryland

Judge: Paula Harrington, Marymount College

Moderator: Alan Devenish, Westchester Community College

1. Bryna Gutner
Rockland Community College
Imagination and Love: A Study of MADAME BOVARY and LOLITA
Mentor: Nancy Hazelton
2. Jessica Pliego
Westchester Community College
Oedipus the King: A True Hero
Mentor: Linda Sledge
3. *Lori Tse
Dutchess Community College
Challenging Identities in the World of Drama
Mentor: Joe Allen

Panel Sponsor:

Mira Sakrajda
Holder of the Sophia and Joseph Abeles Distinguished Chair for the Honors Program

Session III - Psychology
1:45 - 3:15 PM
AAB 310

Readers: Manolya Bayar, Harford Community College
Michael Berkowitz, Westchester Community College
Tom Frangicetto, Northampton Community College

Judge: Milton Steinberg, Marymount College

Moderator: Laurie Corey, Westchester Community College

1. *Daniel Bogan
Bergen Community College
Social Anxiety
Mentor: Laura Ochoa

2. Donna Norgaard
Bergen Community College
Animal Abuse: The Relationship to Future Interpersonal Violence
Mentor: Dorothy Altman

3. Sharon Summers
Montgomery College
The Split Jung - A Woman's Man
Mentor: Tulin M. Levitas

Panel Sponsor:

Laurey Corey

Holder of the Joseph and Sophia Abeles Distinguished Chair for Faculty Development

Session III - Social Sciences
1:45 - 3:15 PM
AAB 304

Readers: Orlando Corres, Harford Community College
Michael D'Amore, Northampton Community College
David Wiseman, Brookdale Community College

Judge: Parmatma Saran, Baruch College

Moderator: Laurie Maida, Westchester Community College

1. Michael Insinga
Bergen Community College
Bullies and Victims: America's Tortured Children
Mentor: Dorothy Altman
2. *Cris Swanson
Reading Area Community College
The Roots of the Current Crisis: Why Afghanistan?
Mentor: Robert Millar
3. Meredith Talbot
Ocean County College
Surveillance: A Threat to a Democratic Society
Mentor: John McKay

Panel Sponsors:

Farhad Ameen
Holder of the Carl & Lily Pforzheimer Foundation Distinguished Chair in Business & Public Policy

Barbara Connolly
Holder of the Martha and Ted Nierenberg Distinguished Chair in Economics and Business Strategy

Session III - The Arts
1:45 - 3:15 PM
AAB 308

Readers: Sam Blate, Montgomery College
Lowell Butler, Dutchess Community College
Suzanne Cleary-Langley, Rockland Community College

Judge: Michael Torlen, SUNY Purchase

Moderator: Tom Halsall, Westchester Community College

1. Valerie Clymer
Northampton Community College
Seeking Solace, Finding Knowledge
Mentor: Randy Boone
2. Dana Odell
Westchester Community College
The Healing Power of Art
Mentor: Mira Sakrajda
3. *Joseph A. Ryan
Dutchess Community College
Animated Children's Film or Adult Horror Movie:
Tracking the Headless Horseman on Film
Mentor: John Desmond

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Jefferson Community College (NY)
Kingsborough Community College (NY)
Lehigh Carbon Community College (PA)
Montgomery Community College (MD)
Northampton Community College (PA)
Ocean County College (NJ)
Queensborough Community College (NY)
Reading Area Community College (PA)
Rockland Community College (NY)
Sullivan County Community College (NY)
Ulster County Community College (NY)
Warren County Community College (NJ)
Westchester Community College (NY)
Wor-Wic Community College (MD)

SPECIAL THANKS

to the Student Forum, the Student Senate and the Faculty Student Association
of Westchester Community College
for their generous financial support for Beacon '02

Dreaming of Adam Smith: 18th Century Mercantilism in 21st Century Images

by Thomas Sawyer

Someone once said, "War is hell." This century has seen two world wars which, in an awesome inescapable tornado of violent activity, drew in numerous countries, uprooted political systems, reconfigured geography, and altered destinies forever. Combined with what might be termed lesser wars such as the Korean and Vietnam Wars, the number of lives lost could probably equal the population of the planet at one time in history.

Throughout these wars, the United States remained relatively unscathed. If one does not factor in Pearl Harbor in WWII, the damage sustained upon U.S. soil was limited to the anxiety and panic which accompany war and the psychological rent in the consciousness of the nation by the Korean and Vietnam Wars. This, in contradistinction to the European landscape and that of the Far and Near East. Indeed, during World War II, the United States prospered. By means of production and the supply of raw materials and a strong labor force, the U.S. dominated the world economy while almost every other country grappled with political mayhem and subversives. Once vibrant European cities were made desolate and entire landscapes reduced to ruins, leaving whole populations in abject poverty.

Indeed, during World War II the United States prospered. By means of production and the supply of raw materials and a strong labor force, the U.S. dominated the world economy...

For the United States an opportunity began to appear upon the horizon, one which would place this country at the pinnacle of world power, economically and politically. In his book, *World Orders Old and New*, Noam Chomsky, Professor of Language and Linguistics and Institute Professor at the Massachusetts Institute of Technology, says,

From 1939 through 1945, extensive studies of the postwar world were conducted by the Council on Foreign Relations which brings together internationally oriented corporate and financial circles, and top level state department planners. They designed what they called a "Grand Area", an integrated world economy that would satisfy the needs of the American economy and provide it with the "elbow room . . . needed in order to survive without major readjustments"-that is, without modification of the domestic distributions of power, wealth, ownership and control. (Chomsky 83)

This "Grand Area" was the entire Western Hemisphere, the Far East (the US had not counted on the persistent challenge of Communism nor the robust recovery of Japan) and the former British Empire.

The United States Council on Foreign Relations was a forum of sorts. David C. Korten, author of *When Corporations Rule the World*, and a contributing writer to *The Case Against the Global Economy*, tells us that the council recommended "the creation of Worldwide financial institutions for "stabilizing currencies and facilitating programs of capital investment for constructive undertakings in backward and underdeveloped regions (Sklar 1980). President Franklin D. Roosevelt was duly apprised of the councils views" (Mander and Goldsmith 21).

Then followed upon the preliminary groundwork laid by the Council the United Nations Monetary and Financial Conference. The conference was held from July 1-22, 1944 at the Mt. Washington Hotel in Bretton Woods, New Hampshire. By the end of the conference (composed of economic, political and corporate leaders from around the world) the World Bank Group (WBG) and

the International Monetary Fund (IMF) would be created. They also constructed the scaffold around which the General Agreement on Tariffs and Trade, GATT, later to become the World Trade Organization (WTO), would be erected. The president of the conference, Henry Morgenthau, the U.S. Secretary of the Treasury at the time, saw a “dynamic world economy in which the peoples of every nation will be able to realize their potentialities in peace and enjoy increasingly the fruits of material progress on an earth infinitely blessed with natural riches” (Mander and Goldsmith 21).

The United States stood at the helm of these institutions, the IMF, WBG and WTO, nicknamed the Bretton Woods institutions. And with its blueprint in hand, the chief architect, the U.S., began to draft policies, erect the scaffolding of future plans, and frame other and lesser institutions to build an economic landscape architecturally in harmony with its vision.

The Rise of the Corporate/Transnational State

Alex Carey, an Australian social scientist, says with conviction that “the 20th century has been characterized by three developments of great political importance: the growth of democracy, the growth of corporate power, and the growth of corporate propaganda as a means of protecting corporate power against democracy” (Chomsky 89).

Earlier we saw that the United States Council on Foreign Relations was not merely composed of political leaders but included leaders of companies, corporations and private industry. We also saw earlier how the council set up the ground for the future of globalization with business leader at the right hand of government. Because of the financial clout carried by Corporations, they can easily gain access to the most important politicians and lawmakers to have their concerns addressed and eventually implemented.

Perhaps the greatest threat to democracy in the world today comes from the formation of unholy alliances between government and business. This is not a new phenomena. It used to be called fascism... The outward appearances of the democratic process are observed, but the powers of the state are diverted to the benefit of private interests.

-George Soros, international financier

Tony Clarke, a Canadian scholar and activist, in his essay “Mechanisms of Corporate Rule” says, “In the United States, for example, the Business Roundtable’s two hundred members include the heads of forty-two of the fifty largest Fortune 500 corporations, seven of the eight largest US Commercial banks, seven of the ten largest insurance companies, five of the seven largest retail chains, seven of the largest transportation companies and nine of the eleven utility companies” (Mander and Goldsmith 299). Many of the companies such as IBM, AT&T, Time Warner, General Motors are members of the Advisory Committee for Trade Policy and Negotiations. This direct access allows them, without public input, to guide the policies which undergird the global economy. These companies, by campaigning for debt elimination, privatization, and deregulation, effectively dismantled many of the powers and tools of developing countries governments. It is their input which directed policies created by the IMF and World Bank. The Structural Adjustment Programs of the World Bank created certain tenets which had to be adhered to in order for countries in the global south to take advantage of debt relief. These SAPs “funneled debtor countries’ resources and productivity into repaying debts and making the debtor country more attractive to foreign investment by currency devaluation, social spending cuts, lower corporate taxes, deregulation, increased dependence on exported goods as well as the wholesale selling off of their natural resources and agricultural commodities in the global marketplace, all the while increasing dependency on imported goods” (Mander and Goldsmith 301).

Clarke says rather wryly, “Whenever they (transnational corporations) need to, they will wrap themselves in the national flag of choice to get support for tax breaks, research subsidies, or governmental representation in negotiations affecting their market plans.” Through this process, stateless corporations are effectively transforming nation states to suit their needs.

In actuality, the transnational corporation is not new. It has its roots in the fifteenth and sixteenth century companies of England and Holland. During this time of expansion (in 1492 Columbus sailed the Ocean Blue) and adventure for the purposes of securing greater access to trade, charters were granted from the sovereignty to a company. The charters regularly included the power to negotiate treaties, conquer territories and maintain armed forces. But more importantly they gave protection to the company for losses by limiting the liability of the companies investment. Also during this time the concept of insurance evolved to protect cargo and goods. David C. Korten says, "Not surprisingly, the history of corporate government relations since that day has been one of continuing pressure by corporate interests to expand corporate rights and to limit corporate obligation" (Korten 61).

The mantra recited by transnational corporations is that economic globalization, through the free flow of money throughout the planet, spurs competition, increases economic efficiency, creates jobs, lowers consumer prices, increases consumer choice, increases economic growth and is generally beneficial to everyone. It certainly spurs competition, but the sort which Adam Smith would not approve. Smith, the father of Economic theory, if you will, and the progenitor of capitalism, speaks of the "Inequalities occasioned by the Policy of Europe", in his seminal work, *The Wealth of Nations*. In noting those inequalities espoused by the systems in France and England he stated they (the crown and the government) "First," imposed inequality, "by restraining the competition in some employments to a smaller number than would otherwise be disposed to enter into them; secondly, by increasing it in others beyond what it naturally would be; and third by obstructing the free coordination of labor and stock, both from employment to employment and from place to place" (Smith 26).

Economic globalization is littered with examples of each of these inequalities. In the first instance, that of restraining the competition, we can see an example between the United States and Jamaica. For decades Jamaicans enjoyed the profits from what they called "green gold". This was the banana export industry. When European colonial powers left the ACP (African, Caribbean and Pacific) countries they were gracious enough to install some mechanisms whereby the newly independent nations could gain and maintain their sustenance and eventually prosper. One of these mechanisms was instituted via the Lome (pronounced lo-may) Agreement. This was an agreement between the ACP countries and the European Union. It allowed the ACP countries to export certain products to the European market duty free. The island nation of Jamaica had a prosperous banana export industry because of this arrangement. That is, until Chiquita, who along with Dole and Del Monte, control 95% of the world's market in bananas, petitioned the Clinton Administration to intervene and object to the advantage enjoyed by the ACP countries. The United States filed a complaint with the WTO (World Trade Organization) citing discriminatory trade policies. The WTO ruled in favor of the United States. Ever since that time, Jamaica has been steadily pushed out of the market, banana production has dropped dramatically, farms have either drastically reduced hands or closed all together and farmers and government officials are unable to draw investment because of the adverse ruling of the WTO.

This program of shutting out smaller competitors and cornering markets is increasing with rapidity because of the manner in which corporations have construed globalization policies. Typically, though, the benefits to be derived from economic globalization are reserved for the titans of commerce.

In her film *Life and Debt: A Film by Stephanie Black*, Ms. Black chronicles the devastating effects of economic globalization on the island of Jamaica. As a result of engaging the IMF and the World Bank, the government of Jamaica entered into a contract for a \$50,000,000.00 loan. Jamaican officials, who wanted to lend money to its farmers and manufacturers to prop up the industries, were

forbidden to lend the money at a rate of 10 or 12%. They were forced to lend at 23%, otherwise the loan would not have been granted. And as is typical with the loans by the IMF, draconian slices were taken out of the Jamaican economy. There were no subsidies permitted to the farmers; foreign goods could flow openly into the Jamaican market, free of tariffs and regulations resulting in a free trade zone, etc.

This system all but erased the agricultural industry in Jamaica. The same industry it was intended to serve. Where Jamaicans had previously raised crops such as potatoes, carrots and peanuts and dry milk, these were all now imported at substantially lower costs than the local economy provided. Whole crops were disposed of, generations of farmers and farms were whipped out, as one farmer said, "with the stroke of a pen." Another farmer noted that the policies of NAFTA "flow like the Mississippi, in one direction," into the Gulf of Mexico, not back into the United States. He observed that perhaps the Gulf of Mexico could absorb the plenitude but the tiny island of Jamaica could not absorb the flow from the United States and Europe. Through economic globalization what once was a local economy became a global economy with the benefits flowing to those exporting goods from other countries into Jamaica. Jamaicans were forced to accept these imported goods and had to rely on them because they were cheaper than locally grown and produced goods.

Doubtless Adam Smith would characterize this egregious system of economic globalization of today in much the same manner he characterized the mercantile system of his day...he abhorred it. The whole point of the deregulation Smith spoke of was for the free exchange of goods by all parties. Milo Clark writes in his commentary on Adam Smith,

Widespread industrial development was still to come in Smith's time. The four points on which society was then based were church, military, government, and commerce which was essentially controlled through a combination of aristocratic, military and merchant actions called "mercantilism." Mercantilism is a nicer word than colonialism or imperialism-whether political, economic or physical. The nature of mercantilism is to import raw materials from the hustings, to prevent or to inhibit conversion, manufacturing or industrial development in the colonies and to return finished goods to the colonies for sale to the locals. In this way the produce of the distant lands was bought at exploitive "prices" from plantations and mines worked by chattel or wage slaves and owned or controlled by distant mercantilists who realized value-added at each stage of processing and profit at the final stage of conversion.

The system described above is virtually identical to economic globalization. Proponents of economic globalization have sifted through The Wealth of Nations and Adam Smith's economic theories and extracted what would be beneficial to them-namely deregulation and free markets. It would perhaps come as a surprise to them to know that Adam Smith was also a moral philosopher producing such other works as *The Theory of Moral Sentiments* (1759).

In his book *The Rise of the Virtual State: Wealth and Power in the Coming Century*, (and one might well imagine this as a sort of successor to Adam Smith's *The Wealth of Nations*), Richard Rosecrance says, "Transferring the bulk of their home production overseas, and shifting most of their economy to high-level services, virtual nations reshape both productive and international relationships. They inaugurate a world based on mastery of flows of production and purchasing power rather than stocks and goods. They emancipate labor from routine mechanical tasks and offer new employment in technical or creative services. They usher in a world based on education and human capital rather than machines and physical capital" (Rosecrance 4).

Rosecrance seems to imagine the world as evolving into a global north and global south. The northern countries such as the U.S., and European countries as well as the "Tigers of Asia" (Japan,

Singapore and China) would control information, services, and technology while the southern countries, the countries of South American, Africa, the South Pacific, and India would primarily be the labor pools where production would take place.

There is a trend in the countries of the global north towards services and away from manufacturing (United Nations Statistical Yearbook: OECD Directory of National Accounts , Vol 2. 1997). One of the main problems with this scenario is also one of the most pernicious. The perpetuation of the uneven distribution of capital and wealth. Because the countries of the global north already have the benefit of economically healthy climates, they are ready and poised to benefit from economic globalization and take up the "white collar" work of services, technology and information. They increase their wealth and have the advantage of exploring new markets with the power of their established capital.

On the other side of the coin, the countries of the global south have primarily been production countries with "chattel and slave workers" enduring pitiable conditions at home and in the workplace, with no opportunity for advancement and no hope of a betterment of their conditions. Deregulation, free trade zones, no labor unions or corrupt government labor unions, no subsidies and no middleman to mitigate the indignities they sustain, these all collude to deprive this population of a piece of the pie, if you will.

The distribution of income in the world according to a United Nations Development Project Human Development Report in 1992 shows that 1/5 of the world's population receives 82.7% of the total world income.

Global Trade and the Environment The Global Economy and the Global South

*To Attract companies like yours...we have felled mountains
razed jungles, filled swamps, moved rivers, relocated
towns...all to make it easier for your business to
do business here.*

-Philippine government ad in Fortune

The international community has recognized that the environment is under a great deal of pressure due to the increased needs of humanity. We have had to come to grips with the fact that the earth is not "infinitely blessed with natural riches," as Henry Morgenthau said. We have, in our march toward technological adeptness, created a hole in the ozone layer by the production of greenhouse gases such as carbon dioxide, methane and nitrous oxide. We have ravaged forests, buried toxic waste in the earth, polluted waterways by releasing toxins into them and clouded the air with unhealthy levels of pollutants.

In July of this year 178 nations reached accord on the Kyoto Protocol-a preliminary agreement from 1997 discussed in Kyoto, Japan. The meeting in Kyoto was to address the problem of emissions of the aforementioned gases which were to be subject to monitoring and curtailing by the industrialized nations of the earth. The U.S. declined to sign the agreement stating it was "fatally flawed" and placed too much responsibility upon industrialized countries. This agreement, the Kyoto Protocol, is a monumental step for the environment. The nations of the earth have recognized that we pose a viable threat to the natural resources of the planet and that measures must be instituted to slow down or halt the pernicious effect of cooperate waste.

The Environmental Protection Agency's top ten list of hazardous waste discharges includes the likes of DuPont, Monsanto, 3M, General Motors and Eastman Kodak. Together, these companies invest millions of dollars to relax environmental regulations and to defeat initiatives, which enforce or set higher standards on waste management. Through their affiliation with the Advisory

Committee for Trade Policy and Negotiations, these companies influence policy on the international level and insure that deregulation of government policies allow them to proceed with development unhindered by concerns about their effect on the environment. Guyana, a South American country which submitted to IMF programs, illustrates the deleterious effect, as do so many countries of the global south, of environmentally lax policies. "Development of the mining and forestry industries is the cornerstone of Guyana's IMF supported economic development strategy. Mining has transformed ecosystems, polluted waterways, destroyed forests and ruined soil quality" (Welch 16). Because of budget constraints redirecting funds from the environmental ministry the government was unable to enforce what environmental laws were left on the books.

Globalization policies are creating vast wastelands in the global south: Mexico, South America, Africa and the South Pacific have all fallen prey to the lure of the IMF loan. These governments have sought external help but have unwittingly traded the souls of their nations only to find they have become no better and in many cases their last estate is worst than their first.

Conclusion

Thomas Frank, the author of *One Market Under God*, brings to light the movement which has infused life into the market in much the same way Mary Shelley's doctor brought life to her creation, also made up of used and disparate parts, but made cohesive by the power of life. It is this drive to give life to the "market" which is the force behind economic globalization. An environment is being created in which consumers are being flooded with all manner of products and convinced with the able assistance of the advertisement industry, that these products must be a part of their lives. The participation of consumers in the market has been construed as a sort of democracy breathing further life into the market and creating an autonomous entity which, because of its construed "democratic" tendencies, must be given carte blanche. Frank quotes Walter Wriston as saying in his book *The Twilight of Sovereignty*, "Markets are voting machines, they function by taking referenda." They are "global plebiscites" that pass democratic judgment day and night, that "conduct a running tally on what the world thinks of a government's diplomatic, fiscal and monetary policies." Markets are giving the "Power to the people," a slogan that Wriston proudly rescues from its misuse by the hated protesters of the sixties" (Frank 55). Through this subterfuge corporations and transnational states have helped fuel the rapid and almost uncontrolled movement toward deregulation. Efforts to control the market or regulate it are seen as anti-democratic, anti-American. "The people have spoke and the market must be free," is the fiat of the market populist.

In a political democracy, each person gets one vote. In the market one dollar is one vote, and you get as many votes as you have dollars. No dollar, no vote. Markets are inherently biased in favor of people of wealth.
Korten, 73

But deregulation and rampant corporate autonomy threaten the environment, the social order and undermine the whole concept of democracy all the while cleverly convincing the population that it is the saviour and the means to the salvation of the planet. Karl Marx might have a bone or two to pick with the corporate treatment of labor in "production" or third world nations. Marx, who was arguably the inheritor of some of Adam Smith's economic theory concerning labor and capitalism, was a ferocious advocate for the common man. Surveying the dark, gray landscape which is the home of the production countries, Marx would easily repeat his words: "The use of my labour-power and the spoliation of its are quite different things. If the average time that (doing a reasonable amount of work) an average laborer can live, is 30 years, the value of my labour-power, which you pay me from day to day is 1/365x30 or 1/10950 of its total value. But if you consume it is 10 years, you pay me daily 1/10950 instead of 1/3650 of its total value, i.e., only 1/3 of its daily value, and you

rob me, therefore, every day of 2/3 of the value of my commodity. You pay me for one day's labour-power, whilst you use that of 3 days. That is against our contract and the law of exchanges" (Marx 234).

Doubtless this scholarly formula would have received the same response it does today. He would have been fired or shot at.

In the summer of 1992 more than 14,000 Mexican workers at a Volkswagen plant turned down a contract negotiated by their government-dominated labor union. The company fired them all, and a Mexican court upheld the company's action. In 1987, in the midst of a bitter two-month strike in Mexico, Ford Motor Company, tore up its contract, fired 3,400 workers and cut wages by 45 percent. When the workers rallied around dissident labor leaders, gunmen hired by the official government-dominated union shot workers at random in the factory. (Korten 131)

Industrialized nations have come to the end of their respective markets. Through globalizing the market, thereby creating new spaces and vistas, they hope to capitalize upon the potential of this new economic war horse. It should be acknowledged that this scenario would not be possible without the blood, sweat and tears of the third world nations who have been cleverly shut out of the dealing. They are but the onlookers on the casino floor as the high rollers gamble with and enjoy the profits provided by their cheap labor.

A more equitable and just system must be encouraged. As well where local economies flourish they should be permitted to flourish and not forced into the global market place which is inundated with westernized gadgets and toys. The environment must be protected through fiercer regulation. Even Adam Smith felt regulation should remain in place to curb natural tendencies toward abuses of the system.

There must rise up a contrary force to balance or challenge the transnational corporations, else their policies will lay the groundwork for riots and guerrilla activities as NAFTA did in Mexico with the indigenous peoples of Chiapas. Already non-governmental organizations (NGOs) are challenging policies of globalization and the rising public awareness is fomenting the debate and criticism. The next decade will be important in determining if the balance is achieved and corporate rule diminished.

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***Styles of Communication:
How Patterns Form and How They Can Be Changed***

by Allison Jones

INTRODUCTION

Children Learn What They Live

“If a child lives with criticism,
He learns to condemn.
If a child lives with hostility,
He learns to fight.
If a child lives with ridicule,
He learns to be shy.
If a child lives with shame,
He learns to feel guilty.
If a child lives with tolerance,
He learns to be patient.
If a child lives with encouragement,
He learns confidence.
If a child lives with praise,
He learns to appreciate.
If a child learns with fairness,
He learns justice.
If a child lives with security,
He learns to have faith.
If a child lives with approval,
He learns to like himself.
If a child lives with acceptance and friendship,
He learns to find love in the world.”

-Unknown

This wonderfully written poem, surprising in its simplistic truth, hung from my mother's fridge by an old metal magnet throughout the course of my childhood. It is a shame we rarely ever took the time to read it. I don't believe that any parent wakes up planning to make their child miserable, nor do they intend to nag or humiliate them on purpose, but too often family members find themselves saying things they do not mean in a tone they do not like. Vital characteristics of inner family communication are often overlooked and under appreciated, such as the importance of listening and constructive conflict resolution. Another important form of communication, while usually non-verbal and indirect, is behavior patterning through parental example. All of these parent-child forms of communication directly influence the child's personality development and future adult relationships. It is the process of how communication between parent and child ultimately effects the child's ability to express themselves in future relationships that interests me especially. More

importantly is the possibility that through recognition of patterns and styles of communication that have been ingrained in one's self, we can open ourselves up to the possibility of change.

In order to recognize specific patterns of behavior, both constructive and destructive, one must take a sincere look at the workings of their own family throughout childhood as well as their character and behavior in the present. We must ask ourselves, what styles of communication do I possess now that I can directly or indirectly relate to the relationships within my family? And consequently, which of these patterns do I feel are positive, in the sense they offer me constructive tools with which I relate to others, resolve conflict, and cope with misunderstandings? From this angle, we can furthermore determine, with a little practice of self-awareness, which styles we've learned that inhibit or prevent us from accomplishing productive conflict resolution, maintaining respect for others, and the overall ability to understand and be understood. After all, it is well known that recognizing and understanding a situation or a problem can serve to be an enormous progression towards obtaining a solution. I believe understanding the origin of one's character and the lessons of communication that have been ingrained in oneself is a vital step towards believing they are not permanent, at a level are voluntary, and can ultimately open up the possibility for change. But at length, if one is interested in self-improvement in this area, it is a process that must be conscious, because those patterns that have been ingrained in us tend to flow out of our mouths so smoothly, we may fool ourselves into believing it must be the best way. Even worse, we may think it is the only way.

WHO'S LISTENING?

By evaluating my own experiences in communication with my family I have been able to pinpoint a few of my own styles. Conversations with my father usually end with both of our voices several decibel levels higher than normal, both of us frustrated and unable to make the other "understand" where we are coming from. Exhausted and disappointed, I always walk away saying, "This conversation is useless because we're only talking in circles." Unfortunately, I'm far from alone. An interested observer who overhears a conversation between a parent and a child will often note with surprise how little each *listens* to the other. The talk sounds like two monologues, one consisting of criticism and instructions, and the other of denials and pleading. Despite the growing years of experience I've put behind me and the fact that I am now a young adult and no longer a child, my father and I are still stuck in this pattern of unsuccessful communication that leaves us both feeling unsatisfied and distraught. The tragedy of such "communication" lies not in the lack of love, but in the lack of respect; not in the lack of intelligence, but in the lack of skill. Communicating with children requires that the talk preserve the child's as well as the parent's self-respect.

Communication in families displaying disrespect can result in a child having the same damaging communication skills in their adult relationships. Adult children consistently feel no one understands what they're saying, they are confused a lot when talking to others, and even in adult life, when talking to parents no matter how good one's intentions are to be sane and clear, it winds up the same – conflicted and confused. If we could all just remind ourselves every once in a while, when we feel like we're not being understood, or we hear our voices getting louder and louder in frustration, that we should take the time to stop and listen. That by doing the opposite of talking, we could all become better at communicating.

CONFLICT RESOLUTION

How one's family resolves conflict is very important to a child's communication skills. In the book, "I'm Not Mad, I Just Hate You!" authors CohenSandler and Silver tell us that, "Arguing can

be constructive; fighting is destructive...By resolving conflicts, arguing makes relationships stronger; fighting serves mostly individual purposes of venting feelings or getting across one's own point of view...In arguing, respect for the other is maintained; fighting ignores the perspective and feelings of the listener." (Farrington, 5). The conflict resolution skills that are learned within the family are used throughout our lives in many different relationships. Arguing provides a resolution to conflict in which both parties can express how they feel while being respected and listened to. A child that is used to screaming because no one is listening to what he is saying, will continue to rant and rave trying to get his point across, in the future, to his wife and his children. A child who is used to tuning his parents out and internalizing his emotions will continue this destructive behavior and lack healthy arguing skills.

In the narrative, "Growing Pains: Beyond 'One Big Happy Family,'" Anndee Hochman relates her struggle with expressing herself honestly and revealing her true sexual orientation to her family when it was sure to cause conflict. "I did it because I chose truth over tranquility. Because I had come to believe that real families fight and resist, sob and explode, apologize and forgive. Beneath the fiction of happiness lies the raw, important tissue of human relationships." (52). By no means am I suggesting that conflict in and of itself is a red flag for unproductive communication skills. Conflict itself is an essential part of getting to know a partner, or a friend, and it is essential to maintain that relationship. What I am focusing on is the productiveness with which people resolve conflict. Once conflict is resolved in a way that preserves the feelings and concerns of each party, the conclusion or compromise the parties reached becomes like glue, binding our character with another. It is through healthy conflict, not necessarily void of strong, even painful emotions, that reveals a person true self, their wishes and desires. Only when a person can express these innermost workings of their souls can they open themselves up for mutual acceptance and intimacy. This is type of relationship that most people first develop in their families.

THE IMPORTANCE OF NON-VERBAL COMMUNICATION

An often-overlooked form of communication is the non-verbal. Those things that some families *don't* talk about can have an even greater impact than things that are repeated a hundred times. In my family, no one discussed their emotions. They were considered irrelevant, insignificant, or even inappropriate. Despite my realization in my adult life that honest conversations with my partner or friends, often revealing raw emotions, is vital to growth and bonding in relationships, expressing emotion doesn't come naturally to me. People who are close to me understand it can take me twenty minutes just to spit out one sentence that contains any type of honest emotion. I can't look people in the eye when speaking on an emotional level; instead I always look down. I get stuck, not knowing how to translate my emotions into words. This is a pattern of behavior, an inability to express emotions I learned through my family, or rather failed to learn. It takes conscious effort for me to change this pattern.

Another form of non-verbal communication is set by example. The way family members interact or communicate indirectly affects another party in the family. In her book, Infants and Children: Prenatal Through Middle Childhood, Laura E. Berk states, "Third parties can serve as effective supports for child development. For example, when parents' marital relationship is warm and considerate, mothers and fathers praise and stimulate their children more and nag and scold them less. In contrast, when a marriage is tense and hostile, parents are likely to criticize and punish." (75). Family interactions, on a broad scale, between parents and grandparents, indirectly affect the individual child. This explains why behaviors can pass through generations within a family, because each generation teaches the next directly as well as indirectly their own methods of relating, communicating, and coping.

We've taken a detailed look into how communication patterns are formed and often transferred from parent to child in various ways of expression and forms of communication, including verbal and non-verbal. Communication is a broader concept than most think. Although the content of what a parent says to a child is still important, I wanted to discuss a few overlooked qualities of communication. For instance, how listening can be more beneficial to promoting healthy conversations in which people understand one another. Promoting "healthy" arguments, in which individuals involved are capable of speaking openly and honestly while others listen and maintain respectful responses. As well as indirect or non-verbal communications in which parents teach children behavior patterns through example. All of these characteristics of communication are learned behaviors we adapt from our families that we incorporate in our adult relationships, and tend to pass on similar techniques to our children, positive as well as negative.

THE INTERVIEW

Now I'd like to examine the ways in which communication styles in the family take form in adulthood. My research involved an interview with a friend of mine during which I essentially asked her to take an honest inventory of her own style of communication and that of her family. I posed several questions, all attempting to draw parallels or connections between herself and her parents, grandparents and siblings. I also prompted her to examine those traits she feels hinder her in her relationships today and those she is most interested in resolving or working to improve. The interview was followed by a site visit that included three generations of her family gathering together for a Thanksgiving meal.

I asked my interviewee to examine her style of communication and those areas she feels inhibit her relationships, impacted her ability to express herself, and ultimately would like to try to change. She responded, "...When I get scared, feelings get stronger and situations can't work out to where you planned and wanted them to be. Instead of fighting for the love that I have for someone I'll turn away from it and push it away so far that it hurts someone so much that I'll run away in the opposite way. Which doesn't seem right in a normal relationship, but I'm realizing that if you love and care for somebody so much that under any circumstance you will work through it and be with them, or try to be with them." What was interesting was that I posed this question to her three different times in our interview, each in a slightly different manner, in an attempt to have her search deeper in herself. Her manner of speech was cooperative, answering quickly and calmly, and seemingly interested in a search of character. And yet her actual answers showed resistance to the process of self-awareness and inventory. Despite my probing attempts at new and deeper realizations of herself, she continued to repeat the same example, defining her defects at a minimum.

In describing her family and how she relates to them, she offered several examples of miscommunications and experiences in conflict resolution. "When a conflict will arise I tend to ignore it until I have to deal with it...which makes the problem obviously bigger than the small thing it was. Once that problem is in my face and it gets to the point where I let it keep going and going and building up one day all of us will just explode and fight with each other and say the nastiest words and not be very nice towards one another which definitely hurts people's feelings very much." Unfortunately, I felt she failed to make the connection between the way her family relates to each other and the way she relates to friends and partners in her life today. Awareness of this situation must go beyond recognizing symptoms and defects in one's family. One must be able to recognize the effect these learned styles of communication have on their ability to communicate in other relationships. Once a person has made these connections that have relevance to their present relationships, they can make a conscious decision as to which traits are effective and those that are not so effective. Only then can they consider the possibility for change and become aware that there

may be another solution.

TURKEY ANYONE?

The time I spent in the presence of my interviewee and her family was extremely valuable to my research. It is one thing to hear a person's perception of themselves and their characteristics. It is another experience entirely to witness their interactions first hand. The experience was, for myself, rather shocking. I was able to witness a family that I consider very much unlike my own, which ultimately proved very valuable, not only to my research, but for myself personally. After just having spent a Thanksgiving dinner with my own family, I was relieved to feel we got along splendidly in comparison. It is interesting to note how quickly one can retrieve true substance matter of a person's personality in just a short session in the presence of their family. Family seems to bring out the best and the worst in everybody.

What I observed most vividly during my visit was the extreme lack of respect shown by everyone present. The use of profanity, even when directed at another family member, was not only tolerated but also used by almost everyone. Everyone was telling everyone else to "shut up" so frequently as to make the observer wonder if anyone was ever listening. All of this behavior was rather disturbing to me as an outsider as it is a pattern of communication I was not exposed to in my own family. The interviewee seemed unflustered by these episodes of disrespect. I interpret her nonchalance to patterning and repetition. I believe she has become accustomed to this behavior in her family. Most interesting was her own metamorphosis of personality. I witnessed an argument between the interviewee and her sister which involved a level of name-calling and manipulation that was shocking. The interviewee became extremely incensed when something didn't go her way or she was faced with an unforeseen obstacle. When the stove broke down, her response was to put the blame or the focus of the problem on someone else, one case in particular with her sister. She blew up, calling her sister "stupid" and "lazy" and making derogatory comments referring to her weight. It was interesting to note what little self-awareness she had towards her style of communication, which resulted in hurt feelings, a breakdown of respectful boundaries between two people, and most of all, did little, if anything at all, to resolve the conflict at hand. Never after an episode did I hear her apologize for her rude comments or demeaning tone of voice. She seemed to be completely unaware of the possibility that her style of communication may not be the most productive. Maybe she isn't aware of another way.

PERCEPTION VS. OBSERVATION

What struck me as most interesting and rather shocking, was the large degree of discrepancy between the interviewee's perception of herself as well as the way she depicts herself interacting with others, and my observations of her behavior and conversation with her family. She was able to pinpoint several flaws in her parents, but then failed to recognize how she at times exhibits the same behaviors. After all, it is always easier to recognize the flaws and character defects of others as opposed to oneself. She sees them rather clearly in her parents, as I can recognize them easily in her. It has been said that when we point the finger at someone else, we point three back at ourselves. I agree with this statement in the sense that the flaws an individual tunes into in others, the defects that can seem so disgraceful, are so noticeable because they are reflections of ourselves. Our worst fears, the characteristics of ourselves that we find so disgusting and horrible we try to cover them up and deny their existence, haunt us through the visions of others around us.

In the interview, the subject expressed an awareness of her mother's defects of character. She noted how bossy and self-absorbed her mother could be. "She was more self-absorbed than

anything. So it was kind of hard depending on her when you needed her. It was hard communicating those issues with her because she was too wrapped up in her own world.” Surprisingly, the interviewee never drew any parallels between her mother’s lack of communication skills and her own learned behavior. It is hard to take a look at the part of us we don’t want to examine, pick apart, and ultimately conclude that we may be doing things wrong, or even have hurt people by our actions. Usually because this has been done to us somewhere along the line it’s hard to admit we’ve picked up the worst traits from people we swore we’d never become. It’s not an easy thing to look at. Maybe if we reflect on the possibility that through self-examination and honesty, we ultimately can change a pattern that may have descended through generations of family. Instead of hiding behind false images of ourselves out of fear, we can be empowered by change. By taking an honest and hard look at the less appealing qualities of ourselves, we can open our vision to uncover different more productive styles of communicating.

WHAT NOW?

When an individual has recognized a problem, the immediate response is usually to determine the solution. So where does one go from here? If an individual has taken an honest inventory of their style of communication, deemed certain traits ineffective or destructive towards building and maintaining a healthy relationship, and are willing to try a new way, there are several options. In the book, *You Just Don’t Understand: Men and Women in Conversation*, the author, Deborah Tannen, offers a unique approach towards dealing with different communication skills in relationships. “Understanding [communication styles] makes it possible to change—to try to speak differently—when you want to. But even if no one changes, understanding [communication patterns] improves relationships. Once people realize that their partners have different conversational styles, they are inclined to accept differences without blaming themselves, their partners, or their relationships. The biggest mistake is believing there is one right way to listen, to talk, to have a conversation—or a relationship.”(297) Tannen focuses more on the honesty of one’s communication style in a relationship, having acceptance for one’s partner and vice versa. If one applies no effort in the interest of change, it requires at the least an awareness on both sides of a relationship for the styles and patterns of expression that exist on the part of the other. When we have awareness and realization about the odd and seemingly irrational behavior that a partner exhibits it can help to ease the frustration caused by different communication styles. Although conflict will still occur, it will be more beneficial to argue about the true subject of disagreement as opposed to differences in the styles of communication the other partner uses. By eliminating the emphasis of blame or insistence of change in Tannen’s interpretations, the reader is able to absorb the true focus points of the book, understanding and acceptance. It is not a self help book in the sense that it provides a formulaic solution but rather offers tools to facilitate understanding of others and how they think and express themselves, ultimately to build better relationships.

The topic of communication within families and how it affects a person’s ability to communicate in future relationships interests me because of my own assets and flaws in communication. I connect those assets and flaws to learned tactics from my family. I believe children learn styles of communication from their parents, grandparents, and siblings. Although many positive and helpful styles of communication are passed on through example and interfamily communication, most people find there are traits they possess that might not be for their good. This knowledge usually proves to be less than the soul contributor to change. What I examined in my research is the connection between one’s behavior and style of communication and the origin of those traits. I believe that the root of the matter lies in the lessons one learns throughout their childhood. Just as a child learns to speak his first words through the interaction and example of

family members, a child learns *how* to speak through this same pattern of example and repetition. These traits are further maintained and reinforced by the perpetual practice of the entire family. Many might note with surprise that an entire family, when in each other's presence can appear to act extremely differently, often in a state which deviates from the norm. What can be most shocking is seemingly outlandish or unusual behavior can seem not so unusual to other family members. This concept is very important. Certain character traits stemming from the workings of families as a whole are furthermore reinforced and perpetuated by the continual acceptance and participation of other family members. Unfortunately, scenarios involving communication between family members, specifically those that reinforce unfavorable styles of communication are hard to avoid at any stage in one's life. However, I believe it is the ability to connect one's characteristics to the history from which they were forged and maintained that ultimately orchestrates the dawning of change.

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The Legacy of Pandora and Eve: Women in Ancient Greek and Early Christian Societies

by Carol Robinson

Whether sorrow and devastation came into the world by uncapping a vessel or eating a forbidden fruit, the ancient Greek and Christian creation myths attribute their unleashing to a woman. If myths embody “the secret opening through which the inexhaustible energies of the cosmos pour into human cultural manifestations” (Campbell 3) and bring “into view ambiguities, tensions, and fears...which the norms of law and custom are intended to control and even suppress” (Gould qtd. in Blundell 16), then the magnitude of these mythological catastrophes becomes symbolic of the threat that women seemed to pose and the forces needed to restrain them. Elements of ancient Greek and early Christian communities, such as social beliefs, laws, and religious conventions, should reflect the counterbalancing forces used to control the images of women seen in the creation myths.¹ In the following article, the Pandora and Eve creation myths will be summarized and the images of women that the myths support will be identified. The pervasiveness of ancient Greek and early Christian social beliefs, laws, and religious conventions supporting the creation myth images of women will then be presented and the manner in which these forces controlled women addressed.² The intent is to show that ancient Greek and early Christian societies counterbalanced the mythological devastation associated with the independent actions of Pandora and Eve through social beliefs, laws, and religious conventions which restricted the autonomy of women.

The ancient Greeks believed that the universe evolved from a formless void through a series of separations and re-couplings. During this primordial process, the heavens, earth, and over three hundred gods, each representing a specific domain, were created. Some of the more prominent deities included Zeus - the father of all gods, Poseidon - the god of the rivers and seas, Hades - the lord of the underworld, Ares - the god of war, Apollo - the god of the sun, Hermes - the guide to the underworld, Artemis - the goddess of the maiden, Athena - the goddess of war, Aphrodite - the goddess of love (Smith 66 - 68), Hestia - the goddess of the home and hearth (Switzer 44), and Hera - the queen of the gods and possibly goddess of the seasons (Burkert 131). Although many of these male and female gods vied against each other for power throughout mythology, Zeus was their creator and adjudicator, giving Greek mythology a patriarchal structure.

While the gods listed do not represent the entire pantheon of Greek deities, they do reflect the attempt of Greek mythology to explain natural and unnatural forces through personification and immortalization (Pinsent 12). By providing a god with a human form and title, the ancient Greeks separated mythology from the vagueness of an “abstraction, idea, or concept” (Burkert 182) and made the god appear accessible. By characterizing a god as eternal, they stressed that it was more than human, that it was “any power...at work in the world which is not born with us and will continue after we are gone” (Guthrie 11). Through this close yet far relationship, the ancient Greeks understood that “the gods exist but they cannot be harnessed to the ends of man; they seem familiar in their humanity...but they still remain distant” (Burkert 188).

¹The term early Christian will refer to followers of Christ in the 1st - 4th century A. D.

² The pervasiveness of a social beliefs, laws, and religious conventions supporting the creation myth images of women will service as a measure of the magnitude of the force.

There is not a canonical story of the creation of man in Greek mythology (Burkert 188; Pinsent 37). This may in part be because the *Theogeny*, the main source of information on the ancient Greeks' cosmos, primarily describes the confrontations between warring gods and goddesses. Men appear to be of less importance (Blundell 114). Some versions of the Pandora myth indicate that man arose spontaneously from the earth (Burkert 188; Pinsent 37) while others allege that the Titan god, Prometheus, made man out of clay with Athena breathing life and spirit into this form (Burkert 188). Either case reflects that the ancient Greeks believed man had an innocuous beginning. In contrast, the first woman ignited the world with disaster.

According to legend, this first woman, the virginal beauty Pandora, was created as a punishment for mankind (Blundell 22; Burkert 171; Smith 74; Pinsent 48). Her introduction stemmed from a trick that Prometheus played on Zeus (Norris 114; Smith 74). In Norris' version, mortal man and the gods agree to split the flesh and bones of a slaughtered ox as part of a peace treaty. To deceive Zeus, Prometheus lays out the choicest pieces of meat for the gods but makes them appear unattractive by covering them with an ox stomach. He then hides the section of bones originally for man with a delicious looking fat. Zeus is fooled by Prometheus and wants to be given the more attractive, fatty-looking dish. Upon discovering that his newly served dish is no more than disguised bones, Zeus refuses to give man the gift of fire so that, as Norris believes, man cannot cook the meat.³ To assist man, Prometheus steals Zeus' eternal flame from the stars of heaven and carries it to Earth in the hollow stem of a dried fennel. Mankind readily accepts this gift upon its arrival.

Zeus is angered and directs Hephaestus, the skilled craftsman of the gods, to sculpt a beautiful maiden from the specifications that Zeus provides for him. When the newly crafted woman with the "face of an immortal goddess" (*Work and Days* qtd. in Blundell 23) is finished, Athena dresses her in a "dazzling white robe" and puts an "intricate golden diadem" on her head (Norris 115). Aphrodites provides the woman with "charm" and "painful, strong desire". To make the woman glimmer, the "Graces adorn her with golden necklaces" while to make her creative and productive, Athena teaches her to weave. But the woman is also given less desirable qualities. Hermes, the messenger god, fills the woman with "sly manners," the "morals of a bitch," "lies", "persuasive words," and "cunning ways." After, Zeus names the woman "Pandora", or "All-gifts," because she is to be given to man as a gift from the gods (Blundell 23).

Fearing that Zeus will retaliate for his crime, Prometheus warns his brother Epimetheus to never accept a gift from Zeus. However, when Epimetheus sees Pandora, he forgets his brother's advice and takes her inside his house (Smith 74). While Pandora is there, her curiosity causes her to open a vessel which releases destructive spirits upon the world (Blundell 23; Pinsent 49; Smith 74).⁴ When she sees the outpouring of "thousands of troubles" (*Work and Days* qtd. in Blundell 23), Pandora shuts the container, trapping *Hope* inside (Pinsent 49; Smith 74). While Zeus later convinces Pandora to release *Hope* as an inspiration for men in their time of need, her damage has been done. Unknown conditions, such as "strife", "disease,"⁵ and "old age" (Smith 74), and the need to work and use women for reproductive survival (Blundell 23-24), begin to disrupt the god-like bliss

³ The decision to withhold fire from Earth was apparently made by Zeus prior to Prometheus' deception. Switzer indicates that Zeus kept fire from Earth to control man's "knowledge and power." Without it, man could not heat food or fashion metal into weapons. She believes that as long as men were "cold and ignorant", men were not a threat to Olympus (66).

⁴ There is some question as to whether the vessel was a jar (Nardo 15, Pinsent 48), box (Grant 109, Switzer 69), or piece of pottery and where the vessel originated. Pinsent indicates that the vessel may have come from Zeus or been in Epimetheus' house (48). Switzer writes that a golden box was given to Pandora by Hermes, under the direction of Zeus, and that she was told "never to open it under any circumstance" (69).

⁵ Disease, according to some mythological sources, may not have been introduced by Pandora. Pinsent indicates that diseases were probably on Earth but no longer had voices to warn men of their approach after Pandora opened her container (48).

Through these consequences, Pandora, Zeus' revenge for the trick of Prometheus, becomes a paradox, an "ultimate gift." If mankind had not accepted her, according to Nagy, then the human race would have ended "but acceptance brings nothing but trouble" (Blundell 24).

Entwined within the Pandora myth may be "the unconscious...notions which men entertained about women" (Blundell 16). Some of these beliefs would be evident in Pandora's primary characteristics. While Pandora appears beautiful on the outside, her internal weaknesses of falsehoods and sly ways are hidden from men (Blundell 23). Thus she is deceptive, a "beautiful evil" and a "precipitous trap" (*Work and Days* qtd. in Norris 115). Besides being misleading, Pandora can be perceived as a thief because she has been created as a counterpart to the fire stolen by Prometheus (Brown 2). Since she has been designed to have "a face like an immortal goddess" while the "morals of a bitch," Blundell believes that Pandora can be viewed as an intermediary between the world of the gods and the world of beasts (23). In this role, Pandora would be seen, like many women in Greek mythology, as "terrifying and destructive" (Blundell 19) and alluring, qualities which could threaten the power of men.

Whether a result of fear or, as Bremmer feels, the persistent negative attributes which Pandora and other female creations in the Greek religion reflected, these myths projected deleterious images of women and "helped sustain a social system in which they [women] occupied an inferior position" (61). The status of women is further lowered because, as Zeitlin points out, the myth "downgrades any function which women may have"(qtd. in Brown 2). Outside of the skill of weaving, Pandora is not portrayed in an economically viable capacity. Women were seen as a "financial burden" (Blundell 171), "doing nothing to alleviate men's poverty, but always willing to share men's wealth"(Hesiod qtd. in Blundell 22). Even women's reproductive ability is seen in a way which downplays the importance of women. Women were to be "endured" so men could have children to whom they could pass their inheritance and entrust their care in later life (Blundell 23). Since Pandora presents an image of women as not having marketable skills and a reproductive destiny which exists only to meet the needs of men, Hesiod denies women "usefulness as workers" and "suppresses anything positive that might have been said about their reproductive function as well" (Zeitlin qtd. in Brown 2).

Underlying themes within Pandora's story can also provide a source for perceptions of females. Smith feels that the main theme behind the Pandora myth involves knowledge. She sees knowledge as a power which is misused by the males in the story in order to gain control over each other (94). Through her curiosity, Pandora becomes a manifestation of this desire for knowledge and the devastation knowledge can bring when used inappropriately. Another main idea, and one Blundell believes is prominent in all Greek mythology, is the identification of women with the wilderness and the unknown. The forces that Pandora unleashes reflect this untamed domain for they bring havoc to an otherwise peaceful existence of man. As the first female, Pandora has one characteristic that sets her apart from the rest of humankind; her ability to bear children. Since this feature represents something out of man's control yet necessary to his existence, it inevitably defines Pandora's, and subsequent women's, role in the civilized world of men (18).

The preceding images of women are evident in numerous sources of ancient Greek culture, including medical records, laws, customs, and religious practices. Hippocratic records⁶ uphold the

⁶ The Hippocratic Corpus were mostly written between the late 5th and 4th century B. C., during the Classical Age (Blundell 98). Additionally, the status of women varied by time period (Bronze Age, Dark Age, Archaic Age, Classical Age, and Hellenistic Age), social status and city-state (Nardo 9). It was highest during the Minoan Age (2000 - 1450 B. C.), an epoch that existed prior to the introduction of the Pandora story, and in the Hellenistic Age (330 - 30 B.C.) (Bingham 3).

contention that women represented the unknown for, as Blundell points out, doctors “viewed women as a special case, a deviation from the masculine norm” (98). Female medical conditions were assessed using the male physiognomy for a standard. The desired skin type, for example, was “firm and hard” (Norris 138), the kind seen on most men. Since women’s skin was viewed as “softer and more porous,” physicians believed women were “more prone to absorbing moisture” (Norris 138). From this deduction, the medical community reasoned that menstruation, an equally disturbing female difference, was necessary to remove fluid build-up (Norris 138). Menstruation was not only used to justify biological beliefs but also to typecast emotional prejudices. Hippocratic physicians felt that women who failed to menstruate were likely to develop “manic behavior” (Norris 139), a condition symbolic of the Pandora-like threat women posed for assimilating the biology of men.

By treating women as biological and emotional anomalies, Hippocratic doctors supported the patriarchal view of women as the weaker and more “emotionally labile” sex (Norris 142). To control women’s unknown natures, physicians recommended that girls marry as soon as they reached puberty (Blundell 99). However, these marriages were advised more for the concern of society than for young women. As Aristotle warned, unmarried girls who experienced intercourse became “even more licentious” (qtd. in Blundell 99); a view reminiscent of how the opening of a vessel by Pandora disrupted the peace of man through the release of destruction.

Many of the laws of ancient Greece reflect an underlying support for women’s Pandora-like inferiority. During the Archaic Period (approx. 750 - 500 B. C.)⁷ in Athens, the inheritance laws specified that a father’s property was to be divided equally among the sons upon his death (Blundell 66). In the absence of a son, the property, including the deceased’s wife and daughters, was passed to distance relatives. While adjustments were subsequently made to this law so that a daughter could be given guardianship over the property until her sons reached adulthood, women were never allowed to own it. Since the central aim of these laws was to “maintain the existing number of families” and “ensure the stability of the *polis*,” Archaic Age women faced subordination at both a social and political level (Blundell 75).

During the Classical Age (approx. 500 - 336 B. C.) in Athens, the legal system contributed to lowering the status of women by denying them the right of self-defense and the right to present evidence. All legal negotiations were conducted through the father, husband, or legal male guardian (Blundell 114). Nardo indicates that Athenian women of this period, although citizens, were not allowed to be part of the Assembly (which precluded them from voting), have a political position, sue a person in court, be on a jury, or serve in the military (29).

Traditions in ancient Greek families contributed to the control of women. During the Archaic Period, when a son came of age in an aristocratic family, he was free to leave his household while a daughter was not allowed to leave her family until she married (Blundell 66). In this marriage, the arrangements were made more with the impersonality of a property transaction than with consideration for the woman’s happiness (Smith 99). Similar to Pandora’s plight when she was given without choice as a gift to man, “women...seemed to have had little or no say in their futures. Marriage was seen as an institution that established a relationship, not so much between a woman and a man as between a father-in-law and son-in-law” (Blundell 67). In the negotiations, the woman was a “silent and submissive” (Blundell 144) object of passage, a reflection of her future role in her new family.

⁷ The dates for the Archaic and Classical Ages are based on Blundell’s book (63, 95).

As fathers sought appropriate husbands for their daughters, their negotiations were discussed with the same animalistic qualities that Hesiod associated with Pandora, accenting women's inferior and unknown natures. Men of the Classical Age referred to a girl available for marriage as a "filly" (qtd. in Blundell 99) with her subsequent marriage regarded as her "taming" or "yoking" (qtd. in Blundell 99). If these husbands believed that their new wives were like Pandora, a "financial burden" tainted by "avarice and duplicity" (*Theogeny* qtd. in Blundell 71) whose "only function was to produce a heir" (Blundell 71), then their wives were doomed to loveless marriages of subjugation and distrust.

The Pandora myth provided the Greek community with images of women as the creators of life, through the introduction of reproduction, and as the destroyers of life, through the arrival of disease. By "being intimately associated with the end as well as the beginning of life" (Blundell 73), women were given roles in social rituals that accented this association. In particular, childbirth and burial preparations were almost exclusively handled by women (Blundell 110, 72).

Blundell indicates that, upon the delivery of a child, the women in the birthing chamber emitted an "exultant *oboluge*," a traditional cry of joy. With the expulsion of the afterbirth, the mother and newborn were purified through a bath and the birth was announced to the community. But this information was not necessarily relayed through oral proclamation. Instead, an "olive crown" was commonly placed on the household's outer doorframe for the birth of a boy and a "tuft of wool" for a girl. Both of these had symbolic significance with the crown representing the boy's future as head of the household and the wool representing the girl's destiny as a producer of textiles for her family. Weaving, Pandora's only skill, was a primary responsibility of women in the ancient Greek household (Blundell 111).

When a family member died in the Archaic Age, the women of the household were responsible for washing, anointing, and clothing the body (Blundell 72; Burkert 192) and ensuring the lament: "indispensible...shrill cries...accompanied by the tearing of hair, beating of breasts, and scratching of cheeks" (Burkert 192). The lament was not only performed by female relatives but was additionally "bought" from women in the community or "coerced" from females slaves (Burkert 192). At the end of the prescribed period of grief, female relatives made sure that the house was "sprayed with sea water, smeared with earth, and then swept out" (Burkert 79) to remove all traces of death. Once the house was purified, the women cleansed their bodies by bathing and pouring water over their heads (Burkert 79). In the ensuing years, these women would be largely responsible for the maintenance of the grave site and grave site offerings (Blundell 72).⁸

In addition to their role in the family rituals for birth and death, ancient Greek women held positions in a few pivotal religious festivals usually related to nurturing and growth. One such celebration was *Thesmophoria*, an event which honored the goddess of agriculture (Burkert 242). Unlike other state festivals, the *Thesmophoria* was exclusively observed by women (Blundell 163; Burkert 242) and represented "the one opportunity to leave family and home, not only all day, but all night" (Burkert 242) where "women could demonstrate their independence" (Burkert 245). It was the only state festival where men were not allowed. However although absent, men still excised

⁸ During the late Archaic and Classical Ages, legislators curtailed the burial activities of women by decreasing the number of participants in the funeral procession, setting the time for when the procession could go to the grave site to dawn, and eliminating the singing of the lament. While the intent of the laws was most likely to reduce funeral expenditures (Burkert 194) and limit "self-aggrandizement" (Blundell 162), these actions would have minimized "one of the few areas of activity which brought social prominence to women." Burial rites provided, according to Blundell, "an emotional outlet" and area where women could "demonstrate the public significance of their domestic concerns" (162).

control over their wives. While a husband was expected by Greek society to “send his wife...and meet the costs” (Burkert 242), the decision for the wife’s attendance belonged to the husband.

Through the Pandora myth, the ancient Greeks supported a belief that women should be viewed warily. Like Pandora, women were seen as alluring yet deceptive with the potential to destroy the world of men. As if fearing women could be as powerful as the forces Pandora released, ancient Greece developed laws and customs to keep women under male guardianship and control. These beliefs not only structured the legal and social systems but also affected its medical opinions and treatments. Because Greek society could not continue without women’s reproductive ability, women were seen as a “necessary evil” (Blundell 24) whose presence constantly reminded man of his mortality. While these negative images supported the subordination of women, the rituals and festivals of Greek mythology provided women with limited, but socially acceptable, opportunities for demonstrating independence.

In contrast to Greek mythology, the heaven and earth of Christianity do not evolve from the separation and combination of a shapeless void. Instead they emerge from the act of a single omnipresent God. As Genesis reveals, God created the heavens and its celestial bodies, the earth with all of its plants and animals, and the first human beings within a six-day period. While the overall purpose of the newly formed man and woman is to have “dominion” (1. 26) over the earth and its fish, birds, and animals, each also has a specific assignment. The first man, formed from the dust of the earth, is to “dress” and “keep” (2. 15) a garden of Eden that God has created while the first woman, developed from the man’s rib, is to be his “help meet”(2. 18). After the woman’s creation, the man “Adam” (2. 19), so named by God, reinforces his status through his remark, “This is bone of my bone and flesh of my flesh: she shall be called Woman, because she was taken out of Man” (2. 23).

The garden of Eden provides Adam and the woman with all of the necessities of life. They have God’s permission to eat the fruit from every tree in this garden except from the tree whose fruit contains the “knowledge of good and evil” (2.17). God’s warning, “For in the day that thou eatest thereof thou shalt surely die” (2. 17) presents the one allusion to possible catastrophe in the couple’s otherwise idyllic setting. After an unspecified period of time, the woman encounters a snake in the garden who asks her if she can eat of every tree. The woman tells the serpent that she can except from the tree in the midst of the garden. The woman then embellishes God’s warning by adding that she can’t even “touch it” (3. 3) else she will die. The serpent attempts to convince the woman that she will not die if she eats its fruit. It tells her, “...your eyes shall be opened, and ye shall be as gods, knowing good and evil” (3.5). Persuaded, the woman eats the fruit, finds that it is good, sees that, as the serpent said, it makes one “wise” (3. 6) and gives some to Adam. Adam accepts this fruit without question and eats it.

Consumption of the fruit causes Adam’s and the woman’s eyes to be “opened” (3. 7). They become aware of their nakedness and immediately sew aprons out of leaves to cover their bodies. But the leaf aprons are not enough to hide their fear of God. Upon hearing the voice of God as he walks in the garden, Adam and the woman hide themselves amongst the trees. When confronted with God’s displeasure for their disobedience, Adam’s and his mate’s first reaction is to pass blame. Adam tells God that the woman gave him the fruit while the woman tells God that the serpent beguiled her. In retribution, God banishes Adam and the woman from Eden to a much less hospitable land beyond its gates. On this new soil, Adam will find “cursed is the ground” and he will need to toil “in sorrow” and “in sweat” until he dies (3. 17, 19). God’s punishment of the woman is equally formidable. From this point forward, God will “greatly multiply” her “sorrow” and her “conception.” Beyond giving the woman painful child bearing, God informs the woman that her “desire” will be to her husband, and her husband will “rule over” her (3.16). The snake is also punished for it is condemned to crawl on its belly and to be hated by all future generations of women

(3.14). Once God has proclaimed his judgment, Adam, as part of his responsibility for naming living creatures, identifies his mate as Eve, the "mother of all living" (3:20).

While the details of the ancient Greek creation story imply Pandora's inferiority, God, the Supreme Being, mandates Eve's subordination in Christianity. Even though Eve is initially created to be Adam's "help meet," her sin causes God to change this equilateral status to Adam's "subject" (Murphy 13). In his new role as "ruler," Adam shows Eve the depth of his command when he gives her a name. As Norris points out, giving title to something usually implied lordship or possession in the Jewish Bible (19). Until God indicated that the woman was subservient to Adam, she remained untitled in Adam's presence. Besides displaying his authority, Bal believes that Adam shows Eve to be "imprisoned by motherhood" (qtd. in Kvam 36) through naming her "mother of all living." Norris sees this title not so much as a sentence of confinement but as an attempt to reinstate Eve's biological function (2).

Since the Christian view of Eve was influenced by Jewish interpretations of Genesis, some relevant Hebrew traditions will be presented. The myth was initially used to support marriage in ancient Jewish societies as unmarried women had few social prospects (Norris 51). Through its subordination of Eve, the creation myth provided justification for using women to support male "comfort," reputation, "economic security," and "inheritance" (Norris 50-51). Since women were seen as possessions (Norris 53), ancient Jewish laws required that an unmarried woman remain under her father's "control" until she was the property of a husband (Norris 56). The only women precluded from these laws were divorcees, widows, and unmarried women over the age of majority. To control a woman's sexuality, laws developed which suppressed her appearance. Jewish women were expected to cover head and face, leaving only one eye open to see (Norris 76). Eve's transgression is inferred through the ancient Jewish belief that a woman should be covered because "she is like the one who has done wrong and is ashamed of people" (Norris 82). Norris feels that all of these restrictions on appearance occurred because a woman's beauty could exert power in a patriarchal society where women had no other influence (75).

Many of the ancient rabbinical laws dealing with women were attributed to the Hebrew belief that Eve destroyed Adam's integrity and caused the loss of his immortality (Norris 82). Women were expected to walk at the head of a funeral procession because they "brought death into the world" (Pagels qtd in Moyers 63). Menstruation became known as the "curse" (Pagels qtd. in Moyers 63) because Eve "shed the blood of Adam" (Pagels qtd. in Moyers 63). To keep this pollution from again touching man, the ancient Jewish rabbis established laws which separated wives from their husbands during their menses (Norris 69).

For the ancient Jewish tribes, the creation myth provided information about division of labor, division between the sexes, and the need for reproduction (Norris 31). Of these, Eve's most important legacy to her daughters was child bearing. Large families not only ensured the longevity of the tribes but guaranteed the inheritance of property (Norris 62-63). Despite this great desire for children in Jewish families, not all babies were received with equal warmth. Since the family legacy depended on the birth of males, families "rejoiced with the birth of a boy and were upset with the birth of a girl" (Norris 63).

When Eve encountered the snake, she may have been alone as the Bible does not identify the location of Adam. Patriarchal communities could have interpreted this as "women who are left to wander alone will get into trouble" (Norris 21) and used it to support the seclusion of women. The story may also imply that listening to a snake will lead to misfortune. By associating a serpent with chaos, early storytellers may have been trying to keep Jewish women from worshipping Asherah and Ashtoreth, the female fertility goddesses of Caanan frequently depicted with snakes (Norris 22). As these and other reproductive goddesses and cults became prohibited by Jewish patriarchs, Norris

contends that it effectively denied women the “comfort”(22) which these goddesses conveyed without providing a substitute (23).

The restriction of female religious autonomy went even further. Unlike the ancient Greek religion that provided areas for female expression, ancient Jewish patriarchs excluded women from involvement in public religious practice (Norris 66). This exclusion was later adopted by many of the early Christian churches in the western Mediterranean. Reminiscent of the beliefs of their Hebrew heritage, these sects “deemed [women] in every respect inferior to men, and it was regarded as dishonorable to a man to receive any instruction, direction, or ecclesiastical blessing from a woman” (Donaldson 162).

Around the second century B. C., the Hebrew view of Eve changed as men tried to determine who was responsible for evil in the world (Norris 85). Religious literature began to increasingly connect Eve, as the first to disobey, with “wickedness and lustfulness” (Norris 89) and the snake, as the instigator, with God’s nemesis, Satan (Norris 85). By linking Eve with the Devil, women were now associated with “gullibility, moral frailty, and sexual rapacity” (Norris 101). To answer his question about the origin of evil, man ultimately turned Eve from the simplicity of a devoted wife into the complexity of a beguiling temptress.

According to Norris, the creation myth was a key text for the founders of Christianity who were “anxious to establish a link between the redemptive powers of Christ and the origins of human bad behavior (4).” Focusing on the Jewish belief that Eve’s sexuality led to the fall of man, the early Church “uncompromisingly” bonded this sexuality to sin and death (4). To avoid the sexual legacy of Eve, the early Church projected two desirable images for women. One embraced a new concept of celibacy while the other continued many of the traditions passed to it from Judaism (Norris 164).

The apostle Paul was one of the first Church leaders to justify chastity as the ideal state through linking sin to sexuality. In his writings to the Corinthians, Paul indicated that God preferred a woman to be an “unmarried virgin or celibate widow” (Norris 169). However, for women who could not contain their sexuality, Paul felt that “it was better to marry than to burn” (1 Cor. 7. 9). Since sexuality was now equated with morality, Christianity began to stifle the expression of female emotions and desires (Norris 339). To keep virginal and widowed women righteous, Norris indicates that the Church turned Eve into a “forbidden fruit” and the sexually rapacious woman into an evil siren (338). Through these changes, the unchaste woman became doubly guilty. On the one hand, she was immoral and on the other, she led a virtuous man astray (Norris 338 - 339). Beyond keeping women chaste, the repression of sexuality may also have been, as among the ancient Hebrews, an attempt to control the allure of women. One passage from *The Testament of the Twelve Patriarchs*,⁹ “The angel of God showed me that for ever do women bear rule over king and beggars alike; and from the king they take away his glory, and from the valiant man his strength, and from the beggar...his poverty,” highlights this power and the reasons why men may have feared it (qtd. in Donaldson 183).

The second image promoted by the Church was similar to the ancient Jewish belief that women should be good wives. According to New Testament teachings, Christian wives were to “adorn themselves in modest apparel,” perform “good works,” “learn in silence with all subjection,” and not “usurp authority over men”(1 Tim. 2. 9-12). They were also “saved in childbearing” (1 Tim. 2. 15). Both the view of the unchaste woman as a seductress and the injunction for married women to be

⁹ A Jewish work with Christian “interpolations” probably written in the 2nd century A. D (Enc. Brit. CD 99).

silent, submissive, and to bear children became the “cornerstone” of Christian teachings about women¹⁰ (Norris 172).

Even if a female became an external replica of either the virtuous woman or dutiful wife, she was believed to be unable to escape from the internal spiritual weaknesses that she inherited from Eve. This moral frailty not only led to the introduction of evil and the downfall of man, as Jewish leaders of the 2nd century B. C. believed, but was now associated with the death of Christ. Tertullian, a prominent North African Christian patriarch who lived between 160 - 240 A. D., accents this association in one of his writings:

Do you not know that each one of you is an Eve? The sentence of God on this sex of yours lives in this age: the guilt must of necessity live too. You are the devil's gateway; you are the unsealer of that forbidden tree; you are the first deserter of the divine law; you are she who persuaded him whom the devil was not valiant enough to attack. You destroyed so easily God's image, man. On account of your desert[ion], that is, death, even the Son of God had to die (qtd. in Donaldson 182-183).

The command for a good wife to wear “modest apparel” was accordingly expanded to the Hebrew belief that every woman's body should be kept hidden in public to cover her guilt and to prevent her spiritual weakness from causing another man to fall. When early Christian women left their homes, male patriarchs recommended that they be clothed from “head to foot” and “veiled” so that “not a portion” of their face was seen (Donaldson 185). The uncleanness of Eve's “curse” continued to haunt Christian women. In one sect, menstruating women could not “take communion” or “go to church” (Dionysius of Alexandria qtd. in Henning 273) and in another, a menstruating deaconess was prohibited from tending to her altar duties (Henning 273).

While women in most sects could not teach or have a spiritual function¹¹, some were offered roles in the Church consistent with their destiny of motherhood and care of the family. As the Church sought to create a greater social image and to provide for its increasingly female congregation,¹² women with deceased husbands who met the Church's requirements for being “at

¹⁰Traditional interpretations of the creation myth that centered on Eve were included in the research for this paper. Not all of the traditional interpretations focus solely on Eve's subordination or her failings but place joint responsibility for the fall on Adam and Eve. One such version presents the story as the symbolic development of “moral knowledge” (Norris 27) for Adam and Eve were given the “freedom to make choices” (Hestene qtd. in Moyers 23), the right to “act on some notion of better or worse” (Kass qtd. in Moyers 45). Another version finds that the story of Adam and Eve exists for humans to learn the “connection between behavior and consequences, between pleasure and responsibility” (Rosenblatt qtd. in Moyers 44). When this view is combined with Thompson's feeling that the creation myth shows that there are “God established boundaries ...over which humans cannot step” (Moyers 45), the sin of Adam and Eve becomes “wanting to be God-like and live without limits (Kavanaugh 1), or the lie of “self-sufficiency” (Kavanaugh 2). Additionally, twentieth century interpretations of the creation story view Eve more positively. In these versions, she is seen as God's last “best gift” (Norris 19), as a person who did not “blindly accept rules,” and as someone who was willing to relinquish a world of “safety and security for knowledge and experience” (Rosenblatt 45).

¹¹ Donaldson notes that Christian views of women, like the perceptions of the Ancient Greeks, varied by time period, city / country, and sect. In particular, he feels that certain Eastern sects in remote areas offered greater autonomy to women and may have permitted them to teach (153). Methuen indicates that some churches allowed women to teach, baptize, and conduct prayer (8).

¹² Stark attributes the higher increase of women to men in early Christianity to condemnation of infanticide and abortion, practices which may have used more frequently against girls than boys in pagan cultures, and that more women than men were likely to become Christians (4).

least sixty years of age," not interested in further marriage, experienced in the "nursing of children," and of "good character" were "employed" to "visit the sick women," "convey assistance to poor women," and "take care of orphans" (Donaldson 158 - 158).¹³ The widow program may have been appealing as it presented women with an opportunity to find a "place in the church hierarchy, independent of a husband or father" and possibly offered greater status in the community than the position of wife (Methuen 8).¹⁴

The widow program diminished in size as another group, deaconesses, became more popular (Donaldson 161). While deaconesses may have existed in apostolic times, the Church began to expand its support of this order during the middle of the third century as the number of available widows declined and virginity became more important (Donaldson 159, Methuen 9). Deaconesses held more powerful positions than widows. Widows were not only subordinate to their commands, but deaconesses could assist the deacon during baptism in the anointing of women and in directing worshippers to their places in Church. In addition, although deaconesses were expected to be celibate, they did not have to be widows or over the age of sixty. Yet like the widows, deaconesses attended to the needs of poor women and orphans (Donaldson 159 - 162).¹⁵ As if in emulation of the subordinate role of Eve, deaconesses could not do anything without "the deacon's consent." Instead, they were to "sit at home, sing, pray, read, watch and fast" (Donaldson 161).¹⁶

While the Church established a religious and social framework for Christianity, Roman law defined its legal boundaries. Although Christians were "the best of citizens" who "willingly obeyed the laws and paid their taxes in full" (Pagels 49), this did not stop the early Church from denouncing certain Roman customs which violated the principles of Genesis. Since man's and woman's God-given duty was to be "fruitful" (Gen. 1.28) manifested through Eve's legacy to have multiple conceptions, early Christian communities condemned the Roman practices of infanticide and abortion (Donaldson 189, Pagels 29, Stark 12). "Unnatural" intercourse and non-procreative types of sexuality were also disparaged (Pagels 29). Although its intent was humanitarian, Christianity's failure to assimilate Roman practices that limited family size reinforced its control over women by tying them to the care of more children.

¹³ The Church usually gave widows financial support (Methuen 8).

¹⁴ The term "widow" may have meant "a woman who lives without a man" (Methuen 2). This definition is consistent with documentation supporting the incorporation of virgins into the widow program. Donaldson feels that virgins were a later addition as the number of widows declined (161).

¹⁵ Henning believes that it is "difficult to relate the order of deaconesses to the order of widows" as the titles were frequently used "interchangeably" and "at times synonymously" to "describe women who carried out the same duties." She also feels that the image of a "smooth evolution" between the position of widow and deaconess is "misleading." She, instead, thinks that the interchanging of titles was symptomatic of the "confusion" in early church leaders as they dealt with women in tasks which they believed should have been done by men (277).

¹⁶ While Donaldson presents deaconesses as having a low position in the Church hierarchy, Stark indicates that they may have held sufficient status in the Church to be regarded as Church officials by the Romans. This may have led to an increased propensity for persecution and execution (9). His suggestion is based on Macmullen's (1984) and Grant's (1977) findings that only a "small" number of Christians were executed by the Romans and that a large number of the Christians killed were officials. It is also based on Thurston's (1989) suggestion that since some of the executed were women, the women could have been part of the Church hierarchy (9). Stark indicates that after the first five centuries A. D., the roles available to women within the Church became more limited. He suggests that this is due to sex ratios adjusting to the "decline in the differential conversion of women" and to Christianity becoming the main religion of the Roman Empire (8). Henning agrees that the duties which were initially assigned to women declined with each century thereafter (276). She feels that it is because the Church desired to get rid of deaconesses from the start. It eventually succeeded in this quest (275).

Just as in ancient Greece, early Christianity manifested social, legal, and religious forces that limited the movement of women beyond the domestic sphere. From God's directive for Adam to rule over Eve, Christianity, like Judaism, supported the domination of men over women. Through the Biblical legacy that God gave to Eve, women who married were expected to be "ruled" by their husbands, remain silent in public, and produce children. From the association that the fall of Adam and Eve was related to sexuality, a second image of Eve, the virtuous woman, evolved. Women who elected to remain unmarried and chaste had, unlike their Jewish female ancestors, opportunities to assume roles within their religion as widows or deaconesses. While these positions may have offered women more status than the traditional role of wife, they were low in the Church hierarchy and subordinate to male officials. Unmarried women who did not remain chaste were increasingly associated with an image of Eve as a seductress, a maligned being that could ruin the purity of men. To keep men free from women's provocative powers and biological impurities, Church leaders mandated that Christian women be properly covered when in the public domain and not participate in Church activities when menstruating. The story of Eve also affected Christianity's acceptance of Roman laws. Roman practices that interfered with the growth and care of the family were condemned. Although this condemnation may have been morally justified, it limited the advance of women in arenas outside the home by binding them to the care of larger families.

Social, legal, and religious conventions embodying images of women found in the Pandora and Eve creation myths were shown to serve as forces that restricted women's opportunities for self-expression, visibility, and freedom in ancient Greek and early Christian communities. These prejudices socially and legally relegated the women of these societies to domestic roles. While religion provided women with opportunities for some self-expression and status outside the home, the positions were usually of a domestic nature and controlled directly or indirectly by men. These findings are consistent with the expectation that the severity of mythological devastation associated with the independent actions of Pandora and Eve would be counterbalanced in ancient Greek and early Christian communities by pervasive social beliefs, laws, and religious conventions to control women's freedom.

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Authority in Othello: Iago and the Breakdown of Order

by Samuel Bellaviti

Following Iago's sly remarks which initiate Othello's suspicion of unfaithfulness in Desdemona, and ultimately lead to his and her death, Othello calls for straight-forwardness from his trusted ensign, demanding of Iago, "If thou dost love me, / show me thy thought" (*Othello* 3.3.119-120). In a sentence almost identical to that found in the Bible when the apostle Peter tells Jesus "Yes, Lord, you know that I love you" (John 21:16), Iago answers Othello: "My lord, you know I love you" (*Othello* 3.3.121). For those in Shakespeare's audience who recognized the similarity to Christian scripture, this exchange perhaps best demonstrated Iago's lack of reverence for both societal and religious values. Indeed, upsetting the order of his world may be the motivation underlying Iago's actions. Iago's cunning and hatred, combined with his disdain for the religious and societal norms of the era make of him a most lethal villain and certainly expand the tragedy of *Othello* through its reflection of the moral and social fabric of early seventeenth century England.

Iago's disenchantment with the social structure becomes evident early on, "'Tis the curse of service"(1.1.34), he tells Roderigo, "Preferment goes by letter and affection, / And not by old gradation"(1.1.35-36). Othello's promotion of Cassio to officer, which Iago views as a clear case of favoritism overpowering the traditional mores of seniority, not only discredits Othello but society as a whole (Gray 213). In response to the perceived betrayal by society, Iago discards his respect for the social order: According to Garry Gray "The outcome of such a realization is that he no longer desires to abide by the societal constraints of being a dutiful soldier" (213).

While Othello's promotion of Cassio may serve as the trigger for Iago's destructive machinations, it most probably is not the sole motivation. In fact, throughout the play Iago appears to be searching for a motive that warrants his wrath. Beginning with his failed career advancement, he then seeks further cause for spite, suspecting, without much confidence, that his wife has been unfaithful to him with Othello, "And it is thought abroad that twixt my sheets / He has done my office" he says, yet in the same line he admits to the rumor's lack of credibility, "I know not if't be true, / But I for mere suspicion in that kind / Will do as if for surety" (*Othello* 1.3.369-373). Later Iago speaks of disliking Cassio, but his final reason for killing him: "He hath a daily beauty in his life / That makes me ugly"(5.1.19-20), though perhaps telling of Iago's psychological state, seems more nearly a half-hearted justification for an act of murder, rather than a credible incentive to rage. A number of other possible motives arise throughout the play. A listing of Iago's declared motives compiled by A.C. Bradley includes hatred of Othello, coveting Cassio's position, suspicion of an affair involving his wife and Cassio, love of Desdemona, and jealousy of Othello (91). Bradley notes, "These motives appear and disappear in the most extraordinary manner"(90).

Perhaps Iago's wavering between various unconvincing motivations for his fury indicates a general maliciousness directed at no one person alone, but against the order that himself and his companions comprise. Rising up against the social structure for perceived abuses of power was a current issue in London at the time when *Othello* first was staged and Iago's attitude toward authority may have been received sympathetically among some of the have-nots of the time. Russ McDonald of the University of North Carolina observes: ". . .in food riots that occurred in the late *sixteenth* and early seventeenth centuries, the participants complained not so much about the wealth of their neighbors as about such abuses as grain hoarding or price-gouging"(McDonald 271).

In the manner of the food rioters of Renaissance England, Iago attacks the injustice of Cassio's promotion, and in a sense, extricates himself from the social system and thereafter considers himself liberated from the bounds that previously ruled out any extreme behavior. "He moves from being socially dominated to psychologically free of restraint" (Gray 213).

Iago's application of his new found freedom immediately turns toward evil, an evil so absolute and unmitigated that many literary critics have perceived it as inhuman and have proceeded to label Iago as "a creature of subhuman evil, malignant without any motivation, an embodiment of Satan himself" (Rosenberg 112). However, such assumptions fail to explain Iago's internal reasoning: "if Iago is the Prince of Darkness," writes Marvin Rosenberg, "why does he seek, in his soliloquies, human motivation for his evil? Why does he not sail ahead, passionless, doing his worst?" (112). The obvious, and perhaps most plausible answer is that Iago is a human being in every sense, albeit a ruthless and complex one.

Whatever sentiments of humanity and responsibility Iago does have, opines Jane Adamson, author and senior lecturer of English at Australia University, he suppresses and then, with characteristic opportunism, converts into fodder and justification for his poorly-defined objective (184). Ceaselessly denying emotions and "his own capacity to be hurt – his capacity, that is, for feeling" (181), Iago mocks those that admit to their emotions: "Virtue? A fig!" (1.3.316), he declares, rebuking Roderigo for his confession of helpless desire for Desdemona, adding: "...we have reason to cool our raging motions, our carnal stings, our unbitted lusts" (1.3.325-326).

Yet, at least once, after Othello's cruel attack on Desdemona, Iago appears to succumb to emotion (Cahn 196). "Do not weep, do not weep" (4.2.128), he says to a distraught Desdemona and in the following lines his denatured utterances suggest he has become "unable to articulate his thoughts" (Cahn 196), in marked contrast to his effusive nature when he engages in trickery. In the same scene, Emilia fears that some "eternal villain" (4.2.134) may be to blame for slandering Desdemona and then describes the imaginary evildoer, and in so doing describes Iago with chilling accuracy. "Fie, there is no such man. It is impossible" (4.2.138), Iago responds, in a move probably meant to prevent suspicion of foul play but perhaps also in denial, for a short moment, of his moral depravity.

Despite a number of stage portrayals depicting him as an unearthly being of evil, it is unlikely that Shakespeare meant for Iago to be anything but human (Rosenberg 115). Iago himself asserts the absence of unearthly intervention, telling Roderigo: "Thou know'st we work by wit and not by witchcraft" (*Othello* 2.3.345). The importance of Iago's humanness must not escape attention, for on it hinges a pillar of *Othello's* significance: namely the power of one man, unassisted by supernatural forces, to contrive devilish havoc.

The third scene of the second act, perhaps more than any other part of *Othello*, presents a candid look into the reasoning, intentions, and driving motivation propelling Iago's aberrance. Through the juxtaposition of Cassio's preoccupation with - and Iago's contempt for - conventional values, Iago's defiance toward order and accepted principles of behavior becomes clearly defined. After orchestrating Cassio's humiliation and dismissal from his position as officer, Iago attends to Cassio's lament that he is hurt "past all surgery" (*Othello* 2.3.244). The injury, however, is not physical: "Reputation, reputation, reputation" Cassio cries "O, I ha' lost my reputation, I ha' lost the immortal part of myself, and what remains / is bestial! (246-248).

The despair expressed by Cassio concerning his ruined reputation concurs with the importance assigned to rank and position in the Elizabethan era (McDonald 312-315). Central to the English devotion to order was the doctrine of the Great Chain of Being which maintained, says McDonald, that "every living creature and even every inanimate object occupied its ordained place in an elaborate interlocking scheme" (313). In the human realm, the hierarchical nature of the Great Chain shaped the ranking system whereby "man is set over man" (313). Thus, for Cassio and Shakespeare's

audience as well, a fall in his social standing perhaps corresponds with a fall in the Great Chain, distancing himself from God while reducing the number of links between himself and inferior creatures. In fact, without his reputation, which he calls, "the immortal part of myself" (*Othello* 2.3.247), Cassio seems to view himself as less than human (247-248), an imagery he evokes twice more in his bitter tirade against drunkenness (270-272, 284-285).

Iago chides Cassio for his obsession with reputation:

As I am an honest man, I thought you had received some bodily wound. There is more sense in that than in reputation. Reputation is an idle and most false imposition, oft got without merit and lost without deserving. You have lost no reputation at all unless you repute yourself such a loser. (*Othello* 2.3.249-253).

Iago's disregard of public approval stems perhaps from his sense of superiority (Bradley 88), and self-aggrandizement: "he likes to think of himself as having absolute governance over himself and his world" (Adamson 171). "In following him" says Iago of Othello, "I follow but myself" (*Othello* 1.1.58), in a statement which underscores his contempt for authority. An early indication of Iago's megalomania can be seen in his desire for a public breakdown of order, which he speaks of in grandiose language: "Hell and night / Must bring this monstrous birth to the world's light" (*Othello* 1.3.385-386) he declares. Later he speaks of making "the net / that shall enmesh them all" (2.3.335-336), and longs to "offend the isle" (2.3.54) by corroding the foundations of trust among his acquaintances, particularly his superior, Othello.

By rebelling against the human hierarchical structure, Iago also rebels against spiritual authority (McDonald 313-314, 334-340). Among the most influential homilies, the 1570 *An Homily against Disobedience and Willful Rebellion*, establishes the relationship between earthly and heavenly authority and the spiritual consequences of rebellion against either realm of power (334). The homily exalts obedience as the "virtue of all virtues" (334), and citing biblical references for support, labels rebellion "the first and greatest, and the very root of all other sins" and "the very cause of death and damnation eternal" (335). By defying their rulers, subjects "procure their own damnation" (336).

Whether Iago chooses to ignore the fate that awaits those who rebel, accepts damnation as the price he must pay for evil, or even denies this tenet of Christian doctrine is not clear. Nevertheless, at least with Cassio, Iago adopts a decidedly moderate stance concerning matters of personal uprightness: "Come," he tells the guilt-ridden Cassio, "you are too severe a moraller" (2.3.278).

The physically and spiritually risk-laden plot that Iago concocts raises the question of Iago's long-term objective. His failure to outline his aim or the future he envisions for himself following the success of his scheme, and the reckless determination that dominates his action may, as the revered poet and critic W.H. Auden acknowledge, "indicate that Iago desires self-destruction as much as he desires the destruction of others" (131).

Certainly Iago's high risk tolerance, depraved intellect, and indifference to the consequences of social disruption makes him a fearful evil-doer. However, Iago is not alone in straying from the boundaries of expected social conduct. The union in marriage of Desdemona and Othello fails to comply with nearly every pillar of marital conformity common to Shakespearian England (McDonald 289-290). George Whetstone's *An Heptameron of Civil Discourses* of 1582 specifies the essential conditions required for a satisfactory marriage, acknowledging the importance of parental guidance and approval, "equality in years," "equality of bringing up," and "consent in religion between the married" (In McDonald 289). Except for shared religion, Othello and Desdemona are dramatically unequal in every aspect believed necessary for proper marriage. The result is a union "which all the other characters view as unthinkable" (Newman 125).

Othello is not oblivious to the risks of marriage, "But that I love the gentle Desdemona" he reveals to Iago "I would not my unhoused free condition / Put into circumscription and confine" (Othello 1.2.25-27). The vulnerability of an unequal marriage quickly becomes evident as Othello acknowledges his age, his skin color, and his manners as possible causes for Desdemona's infidelity (Green 322). Anthony G. Barthelemy notes that Shakespeare's audience would have immediately recognized the inequalities of Othello and Desdemona's marriage as convincing reasons for Othello to be jealous of Cassio (96).

Iago sees a fatal weakness in Othello's love for Desdemona: "he hath devoted and / given himself up to the contemplation, mark, and denotement / of her parts and graces" (Othello 2.3.293-295). Although Desdemona does not rule over her husband as Iago implies, the impression that Othello has been weakened by marriage persists. John D. Cox writes: "Othello is potentially Shakespeare's most perfect Stoic hero until he falls in love with Desdemona" (179).

While Iago may not conform to the principles of his era, he has no trouble using them for his own devices. Recognizing Desdemona as a crucial character in his plot, he commits himself to ruining those around him by destroying her honor: "So will I turn her virtue into pitch, / And out of her own goodness make the net / That shall enmesh them all" (Othello 2.3.334-336). His plan proves most effective, for by establishing an "absolute" trust with Othello (Bradley 28), Iago confidently overrides whatever influence Desdemona, a woman or "weaker vessel" may have on her husband.

Considering the rebellion against order embodied by Iago, that Othello would end in tragedy was most probably a foregone conclusion for the Shakespearian audience: "Iago sees himself as an enemy to the social contract, and Shakespeare's audience would have understood that the chaos Iago inspires is the inevitable outcome of his opposition to order in every form" writes Cahn (271). Thus, Shakespeare's *Othello* confirms, in tragic form, the sanctity of authority, warning of the ominous future that follows the breakdown of order and echoing Sir Thomas Elyot's grave assessment of disorder: "Moreover, take away order from all things, what should then remain? Certes, nothing finally, except... chaos" (McDonald 339).

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High Intensity Military SONAR: Ocean Patrol or Killing Machine?

by Taffy Lee Williams

This report is not intended to be a comprehensive study of marine acoustics or the proliferation of mid or low frequency sound in water. Its focus is on the problems and known effects of tactical military sonars (especially low frequency active) on the biomass of the area of intended use comprising 80% of the world's oceans.

INTRODUCTION

A powerful sonar system known as Surveillance Towed Array System Low Frequency Active (SURTASS LFA) may soon be deployed in up to 80% of the world's oceans. The Navy asserts that its need to detect quieter submarines at long range can only be met with the new low frequency active sonar (Johnson, 2001). But many scientists are concerned that propagating low frequency sound at levels up to 240 decibels (dB) into the oceans threatens the survival of marine life.

Intensity levels of LFA Sonar are far greater than those known to harm cetaceans (whales and dolphins). National and international regulations aimed at protecting marine life (Appendix A) such as endangered whales and turtles have been cast aside or altered to allow for the new technology. Marine acousticians, environmental groups and private citizens have called for a review of the powerful acoustic device and the pursuit of new passive sonars. Three coastal states have enacted pre-deployment prohibitions which severely restrict operation (Appendix B). This follows a series of mass strandings of whales and dolphins that coincided with documented naval exercises. The Navy has not sufficiently addressed the problem of the known potential of lethality in marine life caused by the use of these high intensity acoustic devices.

THE BAHAMAS, March 15, 2000

By far the most well known and significant of the multi-species mass strandings that occurred during naval exercises took place in the Bahamas in March of 2000. The incident is often called the "smoking gun" as it presented ample opportunity for necropsy and investigation lacking in previous military-associated strandings.

Over a 36-hour period on March 15th and 16th, 2000, 14 beaked whales, 2 minke whales and 1 spotted dolphin stranded on the Abaco, Grand Bahama and Eleuthera islands in the Bahamas. Scientists Ken Balcomb and Diane Claridge from the Center for Whale Research in Friday Harbor, Washington, were on hand at the research facility at Sandy Point, Abaco, studying a rare resident pod of 35 Cuvier's beaked whales (*Ziphius cavirostris*). On March 15th, one of the whales being studied beached itself in shallow water in front of the research station.

The whale was guided back into deep waters where it swam in a large left circle and re-stranded. After beaching itself several times, the whale reached deeper water and did not return. Coincidentally, the research station received calls for assistance with live-stranded cetaceans from points north and south throughout the islands. By 7:30 p.m., 4 more whales and a dolphin were reported live-stranded. Later that evening, the station learned that seven more whales had stranded

on Grand Bahama while two minke whales beached near Royal Island, North Eleuthera.

The following two days, Balcomb and Claridge conducted vessel and aerial surveys of the south, east and southwest Abaco coastline. Three more stranded or decomposing whales were spotted, along with several naval warships. In all, the stranding event involved 18 cetaceans of 4 different species covering a 240 km (149 mile) arc. Five Cuvier's beaked whales, one Blainville's dense-beaked whale (*Mesoploden denisirostris*) and one spotted dolphin (*Stenella frontalis*) died within hours of stranding. Post mortem examinations were performed on these six, and heads and tissues were collected and fresh frozen. Due to the badly decomposed condition of an additional Gervais' beaked whale (*Mesoplodon europaeus*) a post mortem examination was not possible.

Because of the remoteness of the numerous sandbars and the vast expanse of water covered, Balcomb believes there were many more strandings that weren't reported (Balcomb, 2001b). In all, ten of the animals were helped back into deeper water, but they have not restranded or been resighted to date. The whales that were not assisted died within a few hours of their stranding. It was determined that the stranding incidents occurred initially at the southern end of the arc and moved northwesterly over the next 36 hours (NOAA, JIR, 2001).

Balcomb's post-mortem examination noted tissue tearing in the inner ears, lungs and areas around the brain as well as bands of hemorrhage in the lungs. Strictly following National Marine Fisheries Service (NMFS) protocol, the preserved and frozen specimens were flown to Harvard Medical School for ultra-high resolution (UHR-CT) analysis of the ears and crania with dissection at Woods Hole Oceanographic Institution.

Necropsies of the whale carcasses revealed similar cranial CT findings. There were no fractures or cutaneous/subcutaneous hemorrhages or other evidence of blunt trauma or primary blast injury from explosive shockwaves. But the evidence for acoustic trauma was strong:

The most significant findings consisted of bilateral intra-cochlear and unilateral temporal region subarachnoid hemorrhage with blood clots bilaterally in the lateral ventricles in the Blainville's beaked whale and intra-cochlear hemorrhages in the Cuvier's beaked whale... Similar ear injuries were seen grossly in the two moderately decomposed Cuvier's beaked whales as well as intracranial staining. In simpler terms, there were deposits of blood within some of the inner ear chambers, and in at least one animal the blood train can be traced to a hemorrhage in a discrete region of a fluid space surrounding the temporal regions and within a ventricle of the brain. Some type of auditory structural damage findings is present in all four beaked whales examined (all showed bloody effusions or hemorrhage near and around the ears).... The presence of blood in only restricted intracranial spaces and the intact inner ear membranes in the best preserved ear are not consistent with simple post-mortem pooling.... The pattern of injury in the two freshest animals, therefore, suggests the ears were structurally intact and the animals were alive at the time of injury. In summary, this pattern of damage is most consistent with acoustic trauma (NOAA, JIR, 2001).

The lack of evidence of chronic debilitating disease or blunt force injury contributed to the medical finding that an in vivo (in the live animal) acoustic or pressure related trauma affected these animals found over a broad geographical area.

National Oceanic and Atmospheric Administration (NOAA) acoustic monitoring stations in the Bahamas confirmed the passage of 7 naval warships and 3 submarines through the Northeast and Northwest Providence channels from midnight on March 14th through 4 p.m., March 15th. Four of the ships were projecting tactical mid-frequency AN/SQS-53C and AN/SQS-56 sonars. AN/SQS-53C operated at mid-frequencies of 2.6 and 3.3 kHz at a nominal source level of 235 dB, and for four

hours at levels greater than 235 dB (at classified levels). (Operation typically involves three half-second "pings" at a two second interval, followed by a 24 second silent, receiving period.) The "nominal" source level (SL) is calculated through the complex array output and convergence/magnification levels into a simplified expression of a single point source (NOAA, JIR, 2001).

Research has shown that biological scatterers can reduce sound propagation by absorbing energy in gas-filled spaces. The swim bladders of fish and marine invertebrates, the carapaces of zooplankton, and air cavities in marine mammals are capable of contributing to the attenuation of sound (NOAA, JIR, 2001). When sound pressure waves pass through these air or gas-filled spaces a resonance effect occurs. The intense compression of gas and the rapidity of resonance vibration may cause rapid tear down destruction of tissues and severe bleeding. This has been compared to explosions within the ears, cranium and lungs. The bands of hemorrhage on the lungs of the Bahamas whales could reflect violent banging of the lungs against the rib cage. Bleeding from the ears and around the brain attest to the rupture of delicate tissues from the force of the acoustic event (Balcomb, pers. comm. August, 2001).

DEADLY DECIBELS AND FREQUENCY

Like the Richter scale, the deciBel (dB) scale is measured logarithmically, so that a tenfold increase in energy occurs with every 10 dB increase in sound output. For example, an increase from 90 dB to 100 dB results in ten times the energy output, but a 60 dB increase will result in sound energy levels a million times greater! Typical fire alarms are at 105 dB; these interfere with normal speech and may cause pain after just a few minutes. Humans sustain permanent hearing damage after about 7 minutes at 120 dB. Death may occur with exposure to 140 dB for a short time. The SuperSonic Transport (SST) at take off is 150 dB. LFA Sonar emits sound originating at 215 dB from 18 bathtub-sized projectors lowered to a depth of 400 feet. The sound waves typically magnify through convergence to a nominal level of 240 dB (NOAA, JIR, 2001). These are literally some of the loudest sounds ever heard on earth.

Frequency refers to the number of cycles per second that a sound produces. Low frequency sonar generally ranges from 100 to 500 Hz. Using concert pitch (A=440), the A above middle C on the piano and notes below would compare to LFA Sonar frequency levels. Mid-frequency extends to about 10,000 Hz, around the highest notes of the piano. As frequency is increased, the pitch of the sound rises. The lower the frequency the lower the pitch, and in water, the farther the sound will travel. Compared to air, the density of water produces low attenuation (weakening) rates. Factors such as salinity and temperature also contribute to the distance the sounds will travel. With computer modeling, Navy documents show that 300 nautical miles from the source, given the right conditions, LFA Sonar (100-500 Hz) will have attenuated to only 140 dB. A distance of 300 nautical miles from the source in all directions would thus cover an astonishingly large area of over 374,000 square miles of ocean within which sound levels received would range anywhere from 140 dB to 240 dB (Reynolds, 2001).

There is an ongoing debate between Navy and non-Navy marine acousticians concerning the differences in sound energy levels of air and water. All agree to the conventional 26 dB figure which accounts for the difference of 20 micro-Pascals (20 uPa), the standard reference pressure for atmospheric sounds, and 1 micro-Pascal (1 uPa), the standard for water-borne sounds. This translates to the reduction of 26 dB from the levels projected in water. However, the Navy chooses to combine an additional 35.5 dB to account for pressure differences, which non-Navy marine acousticians would argue is inaccurate and misleading (Jasny, 1999). By raising the difference from 26 dB to 62 dB it becomes easier to accept a nominal level of 240 dB for the low frequency sonar, as

the RL (received level) will actually be no greater than 178 dB. The Navy is trying to persuade NMFS to raise the allowable limits of Level B Harassment (see below, in More Legal Problems) of marine mammals from 120 dB to 180 dB. It will then be possible to legally project high powered sonars at nominal levels of 240 dB without threat of legal action by environmental organizations or citizen enforcers.

Prior to 1963, when the use of high powered sonars began, mass strandings of beaked whales were rare. Explanations of other species' stranding include loss of navigational skills (making a wrong turn into a shallow area), the beaching of an isolated cetacean that might draw others to their closely related pod member, creating a mass stranding, and a phenomenon known as red tide, where a sudden over-production of dinoflagellates creates a toxic environment and depleted oxygen levels. Over the years, damage to auditory organs had rarely been considered a precursor for strandings. Necropsies omitted information about hearing loss on stranded animals. However, as early as 1987, a scientist with the U.S. Geological Service, Dr. J. Geraci, reported dolphins exposed to sonar at 235 dB stranded with explosive ruptures to tissues and lungs. When the report surfaced in the late 1990's, future requests to perform analysis of hearing loss in mass stranded whales were ignored and necropsy reports not made public (Sandoz, 2001). As of this writing, the author has had no response to 3 separate Freedom Of Information Act requests for necropsy reports on strandings from NMFS.

In 1991, the science journal *Nature* published an article that linked Navy exercises with three separate mass stranding events in the Canary Islands in 1985, 1988 and 1989 (Appendix C). Whales had never before stranded on these islands. In 1998 *Nature* published a discussion by Dr. A. Frantzis on the 1996 LFA Sonar trials of a NATO vessel near Greece that coincided with a mass cetacean stranding. Scientists in the Caribbean, in October, 1999, heard loud underwater sonar "pings" and observed another mass stranding (Sandoz, 2001).

Facing growing concerns expressed in scientific reports on the effects of high intensity sound, the Marine Mammal Commission voiced its fears over the fate of marine life, and especially whales. The MMC's 1997 annual report to Congress states: "If the LFA system were made available for worldwide use as proposed, all species and populations of marine mammals including those listed as endangered and threatened under the Endangered Species Act could be affected" (MMC, 1997, in Green, 2001). Included in the list of possible effects were loss of hearing, disruption of feeding, calving and communication activities, abandonment of breeding grounds, loss of prey species, stress, a general decrease in survival rates and death.

The Navy has apparently long been aware that high intensity sounds like those produced by the new sonars could cause injury exceeding those for Level B Harassment, as indicated by this 2001 report:

1998 NATO and the US Naval Undersea Warfare Center had calculated that resonance frequency of airspaces in Cuvier beaked whales (*Ziphius cavirostris*) to be about 290 Hz at 500 meters depth (page H2, SACLANTCEN M-133), which is almost precisely the middle frequency of LFA (100-500 Hz) described in your OEIS/EIS! That information is quite important, with reference to Technical Report 3 of your DOEIS/EIS, wherein there are several citations of Navy sponsored studies that clearly demonstrated vestibular dysfunction (eg. Dizziness, vertigo) and lung hemorrhage, etc. in laboratory animals exposed to LFA at their lung resonance frequency (Balcomb, 2001a).

The National Environmental Policy Act (NEPA) requires submission of an Environmental Impact Statement (EIS) assessing the consequences of any activity that will cause potential irrevocable or severe harm to the environment, yet the Navy defiantly tested and deployed the high powered sonars from 1980 until 1995 without regard for the necessary environmental assessments.

In fact, it wasn't until the Natural Defense Resources Council (NRDC) threatened the Navy with legal action that it agreed to comply. It was then that the Navy set out to prove that the high intensity low frequency sound was not detrimental to cetaceans or the environment.

THE SCIENTIFIC RESEARCH PROGRAM

Experiments in the Navy's 1998 Scientific Research Program (SRP) in Hawaii were aimed at establishing that cetaceans would not be harmed from RL's at 180 dB. Four species of whales were exposed to low frequency sounds for one month; scientists reported no significant behavioral changes. However, the protocol for the research limited sound to 150 dB, levels it was assumed would not damage the whales. The scientists who performed the tests warned that typical sonar RL's are 5000 times greater than the SRP testing levels, and that at these levels cetacean injury would be unavoidable. Furthermore, in 80% of the world's oceans, LFA Sonar will affect over 70 species of cetaceans. One can not extrapolate from these 4 species what the effects might be in the others (Green, 2001). There were no follow up reports made on the animals exposed to 150 dB. The Navy did not address harmful effects on prey species, fish, marine invertebrates, zooplankton or spawning areas. In the FOEIS, the Navy based its conclusions on the safety of the LFA Sonar on the SRP (Johnson, 2001), but because of the lack of comprehensive testing at levels comparable to the Navy's planned operation, the publication of the draft EIS provoked calls for its immediate withdrawal as inadequate and unscientific (Sinkin, 2000).

MORE LEGAL PROBLEMS

It is a violation of the Marine Mammal Protection Act (MMPA) to interfere with the normal behavior or cause the death of marine mammals. In terms of the MMPA, Level B Harassment refers to activities that would result in a deviation from habitual migration paths, cessation of vocalization (which may impact mating, communication and perhaps hunting) or in any sublethal physical injury. Noise that would cause whales to bleed internally or beach themselves would be considered harassment, even though the beaching is a nearly inevitable death sentence. Level B Harassment levels for noise have been based on studies from the 1980's by Richardson (Richardson et al, 1985) and later by Malme (Malme, et al, 1989) that showed avoidance behavior in cetaceans to sounds at 115 dB and even lower. Since regulators assume that harm would occur to marine mammals if those levels are exceeded, those responsible for the activities, including active sonar, must go through a process to obtain a "Small Take Permit" or "Incidental Harassment Authorization." This allows the proponent of that activity to take (harass, injure or even kill) marine mammals, provided that the "take" is restricted to a specific geographical area, that a small number of animals will be taken, and there is negligible impact on the species or stock.

The Navy's application for a Small Take Permit from NMFS requests permission to kill from 5 to 10% of whale populations in a given area, a large amount by any standards. Remembering the moratorium on take for cetaceans, this is in direct violation of the MMPA for marine mammals and the ESA for any threatened or endangered species.

Difficulty in scientific assessment of populations in the water leaves marine mammals in a precarious position. The interpretation of "negligible amount" might allow for the decimation of entire populations of specific species of whales, as was the case with the rare Cuvier's beaked whale population in the Bahamas (Balcomb, 2001a, 2001b). The effect on the entire global population of Cuvier's beaked whales might arguably be negligible, but typically geographically diverse populations of the same species do not interbreed. The extinction of one subspecies after another may only hasten the overall demise from a worldwide assault on the waters. The intended plan is to

patrol 80% of the world's oceans with this low frequency active sonar.

Since the advent of cold war military sonar use in the 1980's, NMFS has been under pressure to raise the allowable standards for acoustic-based harassment. There are numerous sources of intense sound in the oceans, including shipping, oil and gas exploration, ATOC, recreational vehicles, and military explosions in "ship shock trials." Levels of sound produced are frequently high enough to place the marine environment at risk. Yet more often than not small or incidental take permits are not obtained, and the costs of enforcement to NMFS are prohibitive.

As discussed earlier, raising the standard for Level B Harassment by acoustic trauma from 120 dB to 180 dB would remove the permitting requirement for the Navy's high intensity sonar based on the calculations they have sought to impose into the scientific literature. If NMFS allows a difference of 62 dB to stand (as opposed to the non-Navy acousticians 26 dB conversion figure), projecting nominal levels of 240 dB would not violate the standard. The results of these calculations could be grave. No study has proven 180 dB exposure levels are noninjurious. For NMFS, raising the levels to 180 dB translates to fewer enforcement activities and a lot less paperwork.

The Navy has actually been trying to eliminate Level B Harassment as a component of the MMPA, noting that normal behavior is poorly understood in most marine species and behavior changes are therefore difficult to study. This would restrict questions of compliance to actual tissue damaging events.

Perhaps most disturbing of all is the Navy's request to Congress early in 2001 for exemption from environmental laws, citing the Marine Mammal Protection Act, the Endangered Species Act and the need for national security.

The Navy is a repeat offender of the 120 dB standard (Appendix E). After ship shock trials (where explosions were set off to test vessel durability) the Natural Resources Defense Council (NRDC) sued the Navy for violating harassment levels, and won. Since then, NMFS has allowed 160 dB for different ship shock trials. In practice, if an application is made for a small take permit at 180 dB one can be certain RL's will be 180 dB (Jasny, pers. comm.).

The Navy has stated that prior to deployment of LFA Sonar mitigation efforts designed to limit exposure to cetaceans would be implemented. These include visually scanning the area for whales, standard high frequency fish-finding sonar searches and aerial surveys. However, one can hardly see beyond one kilometer of open ocean. A complete scan would require a 360 degree scope of the vessel and involve several personnel. Low frequency active sonar can travel hundreds of miles without attenuation, far beyond the reach of normal high frequency fish finding sonars. Can one assume the Navy would add the expense of launching aircraft to patrol for whales before a naval maneuver? Additionally, if the sonar is hull-mounted or towed from a submarine, the Navy would have a hard time performing a visual scan, and aircraft can't take off from underwater vessels. Cetacean experts are concerned about the effectiveness of these mitigation efforts:

Clearly, the impact of high-powered rapid-rise acoustic energy (such as sonar), particularly at airspace resonance frequency, on these animals is occurring at significant distances well beyond the current mitigation distance (1-2.2 km) used by the Navy. These impact distances can be easily calculated, and they are more like 20 to 100 kilometers, and more well over the horizon of shipboard observers (Balcomb, 2001a).

Public response has been encouraging. After an application for a small take permit is received, NMFS' position in the matter and the rules under which the activity is allowed to take place are published by federal register. The public is given a period (usually 45-90 days) to submit comments to NMFS about the proposed rule. During the comment period for the Navy's small take permit for SURTASS LFA, 30,000 people responded with petitions calling for a denial of the Letter Of

Authorization (LOA) to take marine mammals incidental to the LFA Sonar project. Over 1,000 of these were published in the second volume of the FOEIS. NMFS has stated it will respond to every comment.

Since the Bahamas event brought worldwide attention to the issue of military sonars by the strong correlation between acoustic trauma and mass strandings, several organizations have devoted funding and personnel to important bioacoustics research (Appendix D). Public outcry has been so great that plans to test LFA Sonar off the coast of New Jersey in the summer of 2000 (and elsewhere) were withdrawn. In the meantime, environmental activists and cetacean advocates have flooded NMFS and Secretary of Commerce Don Evans requesting a rejection of any permit applications to test or deploy these inevitably deadly sonars. Members of Congress and the Senate were inundated with requests to deny funding for military sonar, and to publicly voice opposition to the LFA Sonar project. Legislators spoke for their constituents before the Subcommittee on Fisheries Conservation, Wildlife and Oceans of the House Committee on Resources on the Marine Mammal Protection Act and Surveillance Towed Array System Low Frequency Active Sonar on October 11, 2001:

Rep. Patsy Mink, a Hawaii Democrat, testified on Thursday that the low-frequency sound waves may cause tissue damage to whale's lungs, heart and nervous systems, and make it more difficult for them to breed. "Never in my 23 years in Congress has there been so many responses on one issue," said Mink, who said she has received nearly 3,000 comments on the effects of sonar on whales from her constituents. (Mink, in Doering, 2001).

In fact, the volume of response was so great against LFA Sonar, that three public hearings were granted and the comment period extended by NMFS to accommodate. During the first hearing, NRDC Senior Attorney Joel Reynolds noted that the organizations in attendance before NMFS represented 7 million constituents (Reynolds, 2001). Celebrities, educators, scientists and even the local Girl Scouts (a total of 256) were present while one Navy official voiced a solitary vote in favor of LFA Sonar. There was no sign of apathy toward this serious environmental issue among those attending.

CONCLUSIONS

The issues generated by the Bahamas incident have given rise to much debate and controversy among the scientific community and environmental groups. Even within the Navy there are many who oppose the use of these intense active sonars. Discussions of alternative passive sonar technologies have come to the forefront, as these have shown remarkable potential in detecting vessels at long range. One admiral remarked that a new Robust Passive System (RPS) is capable of detecting virtually anything in the ocean. The use of satellite detection technologies which can create bathymetric contours and chart the deepest ocean floor would further negate the need for such an environmentally injurious technology. Growing numbers within the Navy are bemoaning the litigation that these acoustic devices are generating while many grieve the unmistakable lethality to marine life. At least one defense contractor has advised the Navy to abandon use of active sonars because they illuminate the source vessel's position, making it an easy enemy target. In that case, the sonar's lethal effects might have a reverse effect on the proponents, and pose a costly and deadly threat to our own forces.

The latest finding of potential acoustically driven causes of strandings is the phenomenon of rectified diffusion, known in divers as "the bends":

Rectified diffusion causes gas bubble growth, which in an insonified animal may produce emboli, tissue separation and high, localized pressure in nervous tissue. Using the results of a dolphin dive study and a model of rectified diffusion for low-frequency exposure, we demonstrate that the diving behavior of cetaceans prior to an intense acoustic exposure may increase the chance of rectified diffusion. Specifically, deep diving and slow ascent/descent speed contributes to increased gas-tissue saturation, a condition that amplifies the likelihood of rectified diffusion (Houser et al, 2001).

Populations of cetaceans, fish, sea turtles, sharks, marine invertebrates and plankton could be decimated by ongoing acoustic assaults. The pod of 35 Cuvier's beaked whales and another pod of 120 pilot whales studied by Balcomb in the Bahamas have vanished from the area (Balcomb, pers. comm. 2001, 2001a, 2001b). The need for alternatives could not be more critical:

Cuvier's beaked whales were reasonably common in our field study area prior to the Bahamas incident; we had photo-identified about thirty-five of them, many repeatedly. We typically sighted small groups of these whales a dozen or more times per year in any month of the year. But since the Bahamas sonar incident we have seen this species only once in an entire year, and that was a sighting of two previously unidentified whales (i.e., new arrivals to our study area) about two months after the sonar exercise. None of the whales that were rescued have been seen again. In retrospect, it is probable that all Cuvier's beaked whales in the region when the naval exercise commenced were killed by the sonar, whether or not they were returned to sea by well-wishers pushing them off the shore.

Considering the observed damage to the whales that stranded and died, and the short time period between stranding and death, the NMFS statement that the whales died from stranding is patently absurd. The whales that we observed swimming toward shore and stranding were only temporary survivors of an acoustic holocaust that can be likened to fishing with dynamite (Balcomb, 2001).

The scientific community and environmental groups have often cited the reluctance of the Navy to heed the warnings of its own research. This places them at unwilling odds with the naval establishment, which appears to have placed a slant on interpretation of data to meet its agenda. In fact, the Navy has funded much of the current research on marine mammals and sound in the United States, possibly contributing to an air of intimidation and biased results (Appendix D). In 1995, the Society for Marine Mammalogy published a correspondence highlighting the uneasiness of marine mammal researchers to speak freely about the ship shock and ATOC (190 dB) projects, which involved large acoustic projections into the marine environment (Green, 2001).

All told, sound reason cries out against the use of intense acoustic energy in the marine environment. Continued disregard for the well being of marine life will taint our species and speak poorly of our judgment in these matters. The irrevocable harm that we inflict upon the biodiversity of our oceans will haunt us when we witness the emptiness we have created. Perhaps the challenge for our species is to respect the limitations of our resources and cope with our own presence without reckless disregard for the nurturing environment that sustains us.

APPENDIX A*

APPLICABLE FEDERAL LAWS CONCERNING NOISE (U.S.)

National Environmental Policy Act (NEPA)
Marine Mammal Protection Act (MMPA)
Endangered Species Act (ESA)
Coastal Zone Management Act (CZMA)
Magnuson-Stevens Fishery Conservation and Management Acts (MSA)
Marine Pollution, Research, and Sanctuaries Act**
Migratory Bird Treaty Act (MBTA)
Outer Continental Shelf Lands Act (OSCLA)

APPLICABLE INTERNATIONAL LAWS

United Nations Convention on the Law of the Sea (UNCLOS)
Agreement on Small Cetaceans in the Baltic and North Sea (ASCOBANS)
Agreement on Conservation of Cetaceans of the Black Sea, Mediterranean Sea, and Contiguous Atlantic Area (ACCOBAMS)
International Convention for Regulation of Whaling (ICRW)
1992 Rio Declaration on Environment and Development

FOREIGN COASTAL STATES CONCERNED WITH SOUND LEVELS INCLUDING MILITARY SONAR

United Kingdom: Joint Nature Conservation Committee (JNCC)
Australia: Environment Protection and Biodiversity Conservation Act
Canada: Canadian Fisheries Act; other federal and provincial laws
Norway: Petroleum Activities Act
Italy: Licensing Through Case By Case Assessment
Arabian Gulf States: Regional Organization for the Protection of the Marine Environment Protocol
Vietnam: Licensing Through Case By Case Assessment
Venezuela: Monitoring Requirement
Brazil: Permitting Requirements through IBAMA

*From Regulating the Impacts of Seismic Exploration: Statues, Standards, and Concerns: Geophysical Operations & the Environment. NRDC Presentation by Michael Jasny. Houston, Texas, February 20, 2002.

**From Sounding The Depths. Supertankers, Sonar, and the Rise of Undersea Noise. NRDC publication. Michael Jasny, principal author. 1999.

APPENDIX B

COASTAL STATES RESTRICTIONS

CALIFORNIA

The California Coastal Commission has determined that because behavioral changes can be documented at RL's well below 180 dB, because both the geographic and temporal scope of LFA far exceed any of the more limited acoustic activities previously authorized by the commission, and because the Navy has not responded to the comments on the Draft EIS the CCC "lacks adequate information to determine the consistency of the project with the marine resource protection and the recreation (diving) policies of the Coastal Act" (California CC, 2000).

HAWAII

The Council of the County of Maui, State of Hawaii has made a resolution opposing the United States Navy's Proposed SURTASS LFA Sonar Program and has limited RL's to 145 dB in its waters (CCM Hawaii, 2001).

MAINE

The State of Maine has called for a complete review of the LFA Sonar program citing deficiencies in the Navy's EIS and new information that has come to light since the EIS was published. Therefore it has not authorized the use of LFA Sonar in its coastal zone as it has not determined compliance with the Coastal Zone Management Act (State of Maine, 2001).

APPENDIX C

MASS STRANDINGS SINCE 1963 CONCURRENT WITH OR FOLLOWING NAVAL MANEUVERS

1974	Bonaire (Lesser Antilles)	4	Curier's beaked whales
1985	Canary Islands	12	Goose-beaked whales
		1	Gervais' beaked whales
1986	Canary Islands	4	Goose-beaked whales
		1	Gervais' beaked whales
1988	Canary Islands	3	Gervais' beaked whales
		1	Northern bottle-nosed whale
		2	Pygmy sperm whales Two sperm whales found dead in area after being shipstruck.
1989	Canary Islands	3	Gervais' beaked whales
		2	deBlainsville dense-beaked whales
		19	Goose-beaked whales
1996	Greece	12	Cuvier's beaked whales
2000	Bahamas	9	Cuvier's beaked whales
		3	DeBlainsville dense-beaked whales
		1	Gervais' beaked whale
		2	Beaked whales of unknown species
		2	Minke whales
		1	Spotted dolphin
2001	Florida	2	Beaked whales of unknown species

STRANDINGS WITH CORRELATIONS TO NAVY SONAR

January, 2000	Atlantic Coastline (US)	Hundreds of cetaceans beaching found with brain and other tissue lesions. Necropsy reports not made public. NATO sonar testing in area (Sandoz, 2001).
1987	Atlantic Coastline (US)	Dr. J. Geraci, Navy scientist, reported dolphins exposed to 235 dB of sonar stranded; these suffered from tissue and lung explosions. Report buried in files at NMFS; after surfacing, necropsies requesting ear trauma reports denied or results not made public (Sandoz, 2001).

APPENDIX C (continued)

STRANDINGS WITH CORRELATIONS TO NAVY SONAR

October, 2000	Virgin Islands	Multiple cetacean strandings following sonar sounds heard by scientists. Necropsy results from Woods Hole Oceanographic Institute (from ear canal researchers) not made public (Sandoz, 2001).
Summer, 1996	Haro Stair, San Juan Islands	After sonar use at 195 dB sonar, strandings of orcas, porpoises, seals, and other mammals (resident populations) occurred (Sandoz, 2001).
1998	Hawaiian Islands	Three whale calves and one dolphin calf found dead or abandoned during and immediately following sonar testing. One distressed whale calf breached 230 times and pectoral slapped 658 times in front of an Ocean Mammal Institute research team over a four-hour period. One dolphin pod was seen vocalizing profusely and huddling near the surface unusually close to the shore while the sound was on (Sandoz, 2001).
1997	California	Open sonar testing in California began in 1997; large numbers of sonar exposed whales immediately began to strand with reports of aggressive behavior (symptom of LFAS exposure) (Sandoz, 2001).
January, 1999	California	150 gray whales found dead due to starvation along migratory route where LFA Sonar testing occurred in 1998. Necropsy reports including deafness withheld from public (Sandoz, 2001).

APPENDIX D

INSTITUTIONS AND CONDUCTING RESEARCH ON ACOUSTICS IN THE MARINE ENVIRONMENT (selected)

NAVY SPONSORED STUDIES (Institutions Within the United States):

NOAA: National Marine Mammal Laboratory (NMML)

Pacific Marine Environmental Laboratory (PMEL) – Whale Acoustics Project

Naval Submarine Medical Research Laboratory (NSMRL) is coordinating the following projects under its Human Diver Low Frequency Sound Research Program-SURTASS LFA:

University of Rochester – Lung Vibration Active Tissue

Georgia Institute of Technology – Lung Vibration

Duke University – Cardiovascular Effects

University of Pennsylvania – Concussive Effects

OFFICE OF NAVAL RESEARCH (ONR)

Ocean Acoustics Program

Biological/Chemical Oceanography

INDEPENDENT RESEARCH

University of Curtin, Australia – Fish and marine invertebrates

Sciaenid Acoustics Research Team at East Carolina University – Sonoriferous Fish

Lund University (Stockholm) – Marine Engineering Geology and Electromagnetism

Southeast Asia Acoustic Research Laboratory

Curtin Centre for Marine Science and Technology (Australia) – Marine Acoustics and Bioacoustics Programs include Assessment of Biomass of Antarctic Krill by Acoustic Monitoring

Alaska Fisheries Science Center, Seattle, Washington

French Research Institute for the Exploration of the Sea (IFREMER)

FRS Marine Laboratory, Aberdeen, Scotland

Fisheries Conservation Chair, St. John's Newfoundland

Institute of Marine Research, Bergen, Norway

Maine and Coastal Management, Capetown, South Africa

Maurice Lamontagne Institute (IML), Mont Joli, Quebec

Northeast Fisheries Science Center, Woods Hole, Massachusetts

Southwest Fisheries Science Center, La Jolla, California

ACOUSTIC COMPANIES

BioSonics

HTI

Simrad

SonarData

ENVIRONMENTAL GROUPS ACTIVE IN MILITARY SONAR RESEARCH AND INVESTIGATION (not comprehensive)

National Resources Defense Council (NRDC)

Earth Island Institute

Friends of the Earth

Cetacean Society International

Ocean Mammal Institute

Animal Welfare Institute

Humane Society of the United States

APPENDIX E*

Table 3-1. U.S. Naval Exercises Using Low-Frequency Active Sonar^a

Exercise	Area of operations	Period of operations	Complied with law? ^b
Magellan II	Classified; presumably the same area used in LFA-14	Aug. 1994	No
LFA-13	Gulf of Oman and Persian Gulf	Summer 1995	No
LFA-14 Northern	West of San Francisco Bay, extending north along the Mendocino coast	Sept. 26, 1995 - Oct. 9, 1995	No
LFA-14 Southern	South of the Channel Islands, extending south along the Baja California coast	Sept. 26, 1995 - Oct. 9, 1995	No
MARCOT	West of Vancouver Island 2-95 (British Columbia)	Fall 1995	No
LFA-15	South of the Channel Islands, extending south along the Baja California coast	Feb. 1996 - Mar. 1996	No
LFA-16 (RIMPAC-96)	Various sites around the Hawaiian Islands	May 1996 - June 1996	No
CNO Project K154-4	Southwest of Kodiak Island (Alaska), extending west across the Aleutian Islands	Aug. 12, 1997 - Aug. 31, 1997	No

a. Compiled from Environmental Assessments (EAs) prepared by the U.S. Navy. The list does not include the 22 LFA-related exercises for which EAs were not commissioned.

b. Applicable statutes may include the Coastal Zone Management Act; Endangered Species Act; Marine Mammal Protection Act; Marine Pollution, Research, and Sanctuaries Act; and National Environmental Policy Act.

*Table appears in *Sounding The Depths. Supertankers, Sonar, and the Rise of Undersea Noise* (Chapter 3: Floodlights and Hotspots). NRDC publication. Michael Jasny, principal author. 1999.

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"Arouse . . . Men of Maryland": Confederate Sentiment in Frederick County, Maryland

by Rebecca Miller

Since the founding of the United States, two vastly different, yet economically successful entities found themselves sharing the same soil. The South, deeply steeped in agrarian values and possessing the ideals of both the yeomanry and planter-elite, found the North embracing mass production in factories and living a lifestyle increasingly governed by the clock. Historian James M. McPherson proposes that the North, with its emphasis on modernization, began to view the South as behind in time. In his conceptualization, a *gesellschaft* society existed in the North, marked by its urbanizing, commercial, industrial and rootless attributes. The South represented a *gemeinschaft* society due to its, "emphasis on tradition, rural life, close kinship ties, a hierarchical social structure, ascribed status, patterns of deference and masculine codes of honor and chivalry."¹

The deeply rooted fissures which separated the North from the South were also prevalent in such states as Virginia, Kentucky, Missouri, Tennessee, Indiana and Maryland. Factors, including geographical location and social/political conflicts, facilitated dissenting attitudes which turned East against West and citizens within the same state against one another. By 1861, the western area of Virginia was filled with such rancor that the only means to prevent war within the state was secession, resulting in the creation of West Virginia. Initially boasting neutrality at the start of the Civil War, Kentucky officially remained in the Union after invading Confederates had been driven out by the Federal forces of Ulysses S. Grant. The inception of a national Civil War was simply the bitter and violent fighting along the Missouri-Kansas border writ large. With a pro-Confederate shadow government in power and guerrilla warfare raging across the state, Missouri harbored individuals with decidedly pro-Union or Confederate sympathies. The mountainous area of east Tennessee adamantly supported the Union and worked in conjunction with members of the Lincoln administration in 1861 to stage a Unionist uprising in the state. Much to Lincoln's dismay, the plan crumbled and east Tennessee remained under Confederate rule for the next year and a half.

With the onset of war, a complex picture emerged of a nation divided, not simply into two distinct regions, but amongst a plethora of regional conflicts. Arguably, Maryland was one of the most divided states in the country during the secession wave of 1861, and Frederick County was not immune to conflicting voices. As the tenuous bonds which held a rapidly disintegrating nation together were dissolving, Frederick County provided a snapshot of a region, like numerous others across the country at that time, rife with opposing attitudes. While current historiography holds that the County was staunchly Unionist, the extent of support for the Confederacy in Frederick is greater than previously thought. In examining the letters, diaries, regional newspapers and military service records, support for the Confederacy was initially strong, but as the war progressed and federal policies were implemented to keep Maryland in the Union, outward evidence of the support for the Confederacy was essentially silenced for the duration of the war.

Beginning in the winter of 1860 and the throughout 1861, the wave of secession canvassed the South. Maryland wrestled with secession, but ultimately the federal government would make the

¹ James M. McPherson, "The Differences between the Antebellum North and South," in *Major Problems in the Civil War and Reconstruction*, 2d ed., ed. Michael Perman (Boston: Houghton Mifflin, 1998), 24.

final decision for her to remain in the Union. Maryland was unique as a region due to its envelopment of the nation's capital and the Chesapeake Bay; the state's strategic value would be an incredible asset to whichever army controlled the land. Through the suspension of the writ of habeas corpus, the occupation of the port of Baltimore, and eventually the occupation of Maryland, Lincoln's aggressive strategy to keep Maryland out of the reach of the Confederacy's grasp succeeded.

While secession began in South Carolina and extended throughout the South, Maryland's southern sisters eagerly awaited the support of a state which could offer such an invaluable geographic advantage to the Confederate army. Yet Lincoln quickly clarified Maryland's position in the conflict as a state locked into the Union, which led numerous Southern citizens to attach the stigma of "traitor" to Maryland. Others realized the unjust power the oppressive federal government was exerting and expressed sympathy for a state silenced under tyranny. In *Mothers of Invention*, Drew Gilpin Faust utilizes a letter of Mary Legg, a young woman of the aristocracy, to represent the commonly-accepted views of the South in an anecdote regarding a tableaux vivant. The most popular benefit performances in the South, tableaux were staged reproductions of well-known themes:

There was one tableaux I think you would have liked it was the 'Southern Confederacy' each state was represented by one of the girls dressed in white with a scarf of the State Colors, and States were all united by a wreath of flowers, while Kentucky stood with folded arms, face rather averted from the southern confederacy and looking towards the US flag; poor Maryland was dressed in black kneeling as though supplicating and bound by chains.²

While forcibly bound to the Union, Maryland's interests were more closely aligned with those of the South than of the North. W. W. Goldsborough, Captain of Company A in the First Maryland Infantry of the Confederate army asserted, "Maryland, by reason of her geographical location, close commercial interests with the tobacco and cotton-raising States, similarity of institutions and intimate social and natural relations with the people south of the Potomac, was emphatically a Southern State."³

Along with Maryland, Frederick County identified with southern interests. As T.J.C. Williams notes, "It was in large measure a Southern community, brought up in a spirit of neighborliness to Virginia and naturally sharing the feelings and sentiments of that section over the questions at issue."⁴ When Frederick was chosen as the location for the Extra Session of the Legislature in April of 1861, it was selected for its supposedly unquestionable Unionist leanings, yet much Southern sympathy existed in Frederick County throughout the war years.⁵

One of the clearest indications of Frederick County's allegiance and identification with the South is noted in the voting results of the presidential election of 1860. The vote was evenly split between John C. Breckenridge, an impassioned Democratic Secessionist, and John Bell, a

¹ James M. McPherson, "The Differences between the Antebellum North and South," in *Major Problems in the Civil War and Reconstruction*, 2d ed., ed. Michael Perman (Boston: Houghton Mifflin, 1998), 24.

² Drew Gilpin Faust, *Mothers of Invention* (Chapel Hill: The University of North Carolina Press, 1996), 26.

³ W.W. Goldsborough, *The Maryland Line in the Confederacy* (Gaithersburg: Butternut Press, 1983), 337.

⁴ T. J. C. Williams and Folger McKinsey, *History of Frederick County Maryland*, vol.1 (Frederick, MD: Titsworth & Co., 1910; reprint, Baltimore: Regional Publishing Company, 1967), 369 (page citations are to the reprint edition).

⁵ Harry Wright Newman, *Maryland and the Confederacy* (Annapolis, MD: by the author, 1976), 241.

Constitutional Unionist, with Abraham Lincoln of the Republican party garnering a mere 4% of the total vote. In a lecture regarding the election of 1860 in Frederick County, historian Michael A. Powell concludes, "Frederick County was very strong in its southern sympathies, identified its interests with the South, and sought, through the electoral process, the candidates most likely to protect those interests."⁶ The results of the presidential election of 1860 in Frederick County suggest that the presently-held assumption that Frederick County was emphatically pro-Northern is inaccurate.

With extra sessions of legislature recurring and the General Assembly's declaration that the Federal government had overstepped its command by arresting Maryland citizens, Lincoln realized the time had come for more severe acts of control. Federal troops began to overrun the town. In addition, the local postmaster, W. D. Jenks, "...received an order from the Post Master General, directing me not to receive or mail 'The Republican Citizen' until otherwise ordered." John W. Baughman, the newspaper's editor who sympathized with the Confederacy, responded with shock and consternation at the request and encouraged the newspaper's readers to aid in continuing the paper's circulation throughout the county and finished by stating, "This blow comes upon us suddenly and was entirely unexpected."⁷

Without the authorization of Congress, Lincoln suspended the writ of habeas corpus in a proclamation issued on September 24, 1862, essentially declaring martial law in Frederick. Similar to sedition laws, the suspension of habeas corpus enabled the Federal government to arrest and imprison any individuals espousing views which were not consistent with the Union. Incarcerated within the walls of Fort McHenry were several Frederick citizens, including Baughman, publisher of the *Republican Citizen*.⁸ The *Frederick Herald* reported that Baughman was arrested on July 9, 1861 by "Abolition soldiers" in Washington County where he was preparing to send his newspapers across the river for delivery to its Virginia subscribers. The article continues by stating, "We have not been able to ascertain the charge on which he was arrested, and we believe there is none against him except that he is an able advocate of the constitutional rights of the South, and a strong opposer and denouncer of the aggressive war waged by Lincoln and his Union supporters against the institutions of the Slave States."⁹

Other such incidents occurred with respect to Frederick County legislators. On September 19, 1861, the *Republican Citizen* revealed that three Frederick County delegates to the state legislature, Thomas John Claggett, William E. Salmon and Andrew Kessler, were arrested by Federal authorities and were incarcerated in Annapolis, Maryland or Washington, D.C. Baughman viewed the arbitrary arrests of the legislators as a significant threat to the function of a representative-democracy as guaranteed in the United States Constitution. He concluded the article with a haunting foreshadowing of the events to come:

Should we differ from the President and undertake to prove that this suppression of the Legislature of a—shall we say sovereign State, and the arrest and imprisonment of the representatives of—shall we say free people of Maryland, is without constitutional

⁶ Michael A. Powell, "'With Her Southern Sisters': The Election of 1860 in Frederick County, Maryland." Paper presented at the Millennium Crossroads: A Conference on the History of Mid-Maryland, Frederick, Maryland, September, 2000.

⁷ *Republican Citizen* (Frederick, Maryland), 21 February 1862.

⁸ Harry Wright Newman, *Maryland and the Confederacy* (Annapolis, MD: by the author, 1976), 241.

⁹ *Frederick (Maryland) Herald*, 16 July 1861.

warrant, it might subject us to the severest penalties of some law we have never read or to the punishment prescribed in some provision of the Constitution, the true intent and meaning of which we have heretofore entirely misapprehended.¹⁰

For the crime of singing "Dixie," Frederick County delegate Thomas John Claggett was arrested and deported to Fort Warren in Boston. After serving six months in prison, Claggett was paroled by order of the Federal Government.¹¹ The sum total of these incidents, including the influx of federal troops in Frederick County, likely restrained the spirit of its southern-supporting citizens. Like the rest of Maryland, Frederick's right to self-determination was eradicated by the Federal government and was not representative of the predilection of its citizens. Southern sympathizers existed in the county, yet many were silenced by an intimidating federal government wielding onerous control.

Newspaper publishers John Baughman and John Heard promoted Southern politicians and platforms until the Federal government ordered the cessation of their printing presses. Catherine Markell, one of Frederick's premier socialites, exercised her hosting abilities when the Rebel army inhabited the town. In a journal entry dated September 10, 1862, Mrs. Markell notes, "Over 300 soldiers took meals and lunch at our house during the day...A number of officers and hundreds of soldiers here during the day, nearly all took meals, many had in ordering meals mistaking the house, from its size, for a hotel."¹² In her memoirs of the war, Harriet Pettit Floyd recalled the warm reception of the Confederate Army by numerous Southern-sympathizing families upon their arrival in September of 1862. A young woman at the time, Floyd described the gracious hospitality of some of Frederick's citizens toward the Rebel soldiers and discusses the numerable friendships which were developed between the "Southern soldier boys" and "Frederick lassies." Yet with the town under the command of the Federal government, the hosts who had been so courteous to the Confederate Army would find themselves under strict supervision by the Provost Marshal's office and were subjected to relentless taunting by Union troops. Floyd vividly remembered one warm September evening, entertaining visitors with such Southern songs as "Maryland, My Maryland," and "Bonny Blue Flag:"

We were interrupted in the midst of our enjoyment, by the entrance of a Union officer, who demanded the names of all present telling us we must consider ourselves under arrest for insulting our loyal neighbors by singing secession songs, and must appear at the Provost Marshal's office in the morning to answer the charges against us. . . . Soon after daylight two officers came to escort us to the Provost Marshal's office. After hearing a most ridiculous array of evidence against us, such as our refusing to walk under Union flags, avoiding Union soldiers, and entertaining and helping, the Confederates whenever we had the opportunity, we were released on Parole, to appear whenever called for.¹³

Various farmers also provided the Rebel army with food upon its arrival in Frederick. One instance recorded by a reporter from the *Charleston Mercury* traveling with the army reads:

¹⁰ Republican Citizen (Frederick, Maryland), 20 September 1861.

¹¹ Paul B. Gordon and Rita S. Gordon, *Frederick County Maryland: A Playground of the Civil War* (Frederick: privately printed, 1994), 33-34.

¹² Markell, Catherine Susannah Thomas Diary, 10 September 1862, Frederick County Historical Society, Frederick Maryland.

¹³ Harriet P. Floyd, "Civil War Memories." Edward S. Delaplaine Collection, Historical Society of Frederick County, Frederick, Maryland.

Along the road the farmers have welcomed the presence of our men with a sincerity that cannot be misunderstood, opened their houses, and spread their boards with the fat of the land. . . . In the sentiment of the people, we are not much disappointed. It is apparently about equally divided, and there is yet little expressed enthusiasm.¹⁴

Despite the sizable presence of the Federal army, men in support of the Confederacy persevered and discovered ways to join in the Confederate ranks.

Conversely, Frederick County was also home to the unabashed Unionist Barbara Fritchie. Immortalized in a poem by John Greenleaf Whittier, Mrs. Fritchie purportedly waved her Union flag proudly when the Rebels passed her home in Frederick City. The legend of Barbara Fritchie is exactly that, a fable constructed in fiction and preserved by tradition. Henry Kyd Douglas, a Confederate officer traveling with Stonewall Jackson reported that neither he nor General Jackson even passed her house on West Patrick Street. The tale of the gray haired lady who defiantly waved the Stars and Stripes at the Confederate army is a story which serves to entertain readers of fiction, but affords no historical veracity.

For Frederick County's southern-supporting males, enlistment in the Confederate army provided a unique opportunity to demonstrate one's devotion to the Cause. In *The History of Frederick County, Maryland*, T. J. C. Williams correctly describes how Frederick County's volunteers to the Confederate Army regarded their call to duty, "Those who had determined by this time to cast their lot with the South had made up their minds to do so quietly and in order, answering that call which they deemed the strongest as they would an inevitable mandate from the inner conscience to do the thing which they believed to be right."¹⁵ The behavior of Frederick County's men was demonstrative of their loyalty to the Confederate cause. As Philip D. Morgan succinctly notes in an analogous situation, "A wall of silence divides us from the world of ordinary men and women in the pre-industrial world, but this does not justify us in turning a deaf ear to those voices, however small in number, clamoring for our attention. And in part, behavior can substitute for voices."¹⁶ What could not be shown in public display was manifested through the lending of military support to the objectives with which these men most closely identified. Men enlisted in the ranks of the army whose ideological convictions were synonymous with their own. James M. McPherson concludes that the "values of duty, honor, courage and belief in the Cause," not only explains why men stayed the fight, but also served to propel them to join the army.¹⁷ With enlistment in military service, the tangible demonstration of one's loyalty is demonstrated to their nation. Focusing specifically on the state of Maryland, Kevin Conley Ruffner affirms, "For the most part, Confederate Marylanders went to war to defend civil liberties and the right of individual states to choose their destiny."¹⁸

To determine Frederick County's military support of the Confederacy the primary source of data was the Compiled Service Records of the Confederate Army housed in the National Archives in Washington, D.C. Through parole records, oath of allegiances, and muster rolls, men who listed Frederick County listed as their residence were gathered.

¹⁴ Thomas Scharf, *History of Western Maryland* (Philadelphia: L.H. Evertts, 1882); quoted in Paul Gordon and Rita Gordon, 43.

¹⁵ Williams and McKinsey, 370.

¹⁶ Philip D. Morgan, *Slave Counterpoint: Black Culture in the Eighteenth-Century Chesapeake and Lowcountry* (Chapel Hill: University of North Carolina Press, 1998), xxi.

¹⁷ James M. McPherson, *For Cause and Comrades* (Oxford: Oxford University Press, 1997), 168.

¹⁸ Kevin Conley Ruffner, *Maryland's Blue and Gray: A Border State's Union and Confederate Junior Officer Corps* (Baton Rouge: Louisiana State University Press, 1997), 55.

However, these records presented multiple problems. One of the most significant conflicts arises from the lack of uniformity in the records themselves. The Confederacy failed to document service records in a consistent manner, leaving the reader to sift through a collection of inconstant data. Due to the variable nature of these records, numerous men from Frederick County might have been overlooked because information about county of residence is not regularly available. Muster rolls do not contain county of residence data, so unless an individual was captured and taken prisoner by the Union army, the chance of detecting their county of residence is slim. Countless Confederate documents were destroyed in the years following the war, leaving a paucity of records for assessment by future generations.

As a testament to the unwavering bravery and comprehensive devotion to the Cause, the act of enrolling in the Confederate army was oftentimes arduous and riddled with peril. "Joining the Confederate army from Maryland was difficult and dangerous," claims historian Daniel D. Hartzler.¹⁹ For Frederick County's volunteers, passage into the Rebel army was hampered by Federal occupation. Passes were required for entering and exiting the county. When attempting to join the Confederate army, prospective enlistees were forced to elude Union troops and make the trek to Virginia before being caught. In Virginia, Harpers Ferry, Winchester, and Richmond all welcomed Frederick County men into Maryland regiments. Frederick City, Urbana, and Boonsboro, Maryland are also listed as places of enlistment for Confederate troops.

Utilizing data collected from the National Archives and the Census of 1860, fifty men were used in the sample for this study. This is a modest sampling which does not support definite conclusions but suggests tentative findings. As expected, a high correlation between volunteers for the Confederacy and election districts with a large number of slaveholders exists. The election districts of Petersville, Frederick City and Buckeystown are recorded as each having greater than five hundred slaves per the census of 1860, with the first two districts eliciting the highest number of Confederate volunteers in the county. Emmitsburg, Liberty and New Market also furnished substantial numbers of volunteers for Rebel ranks. The district of Buckeystown is an anomaly due to its small number of white males amongst a high slave population. The results suggest that support for the Confederacy in Frederick County was relatively geographically balanced; all points in the county are represented, with Frederick County overshadowing the other districts (see table 1 on the next page).

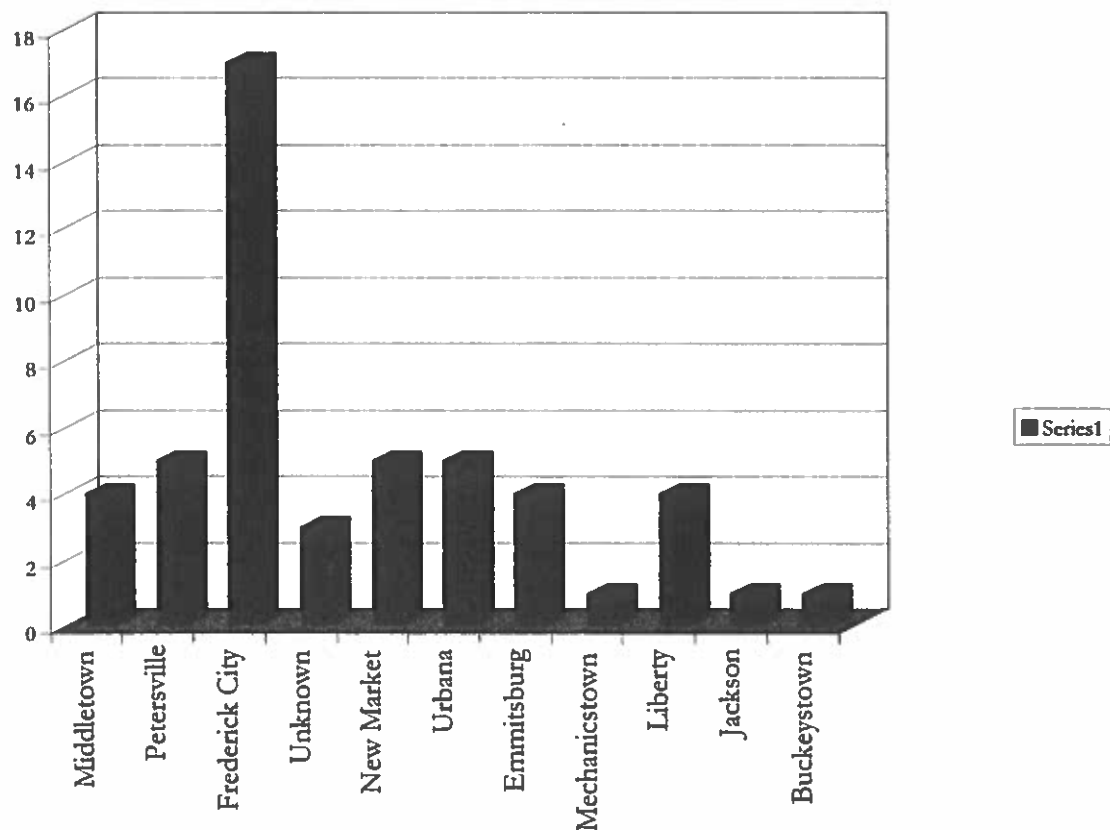
While able to provide insightful evidence regarding the area of residence, the sample is not large enough to extract any tentative conclusions regarding the relationship of social class and Confederate volunteerism. The census of 1860 invariably offers election district information, but fails to consistently present information on occupation, a prime factor in determining one's social position. Yet, like geographic distribution, occupations of the volunteers were also equally scattered. Physician to blacksmith, jeweler to farm hand, all represent the diverse composition of the Confederate army which sacrificed professional ambitions in order to offer their support for the Cause.

As Baughman noted regarding the arrests of Maryland legislators in 1861, "We presume that impartial history will represent the transaction in its true light for the benefit of future generations."²⁰ Yet the history of Frederick County during the Civil War has minimized the extent of Confederate sentiment. Two of the leading County newspapers were representative of support enjoyed early in the war. However, beginning with the closure of the *Frederick Herald* followed by the *Republican Citizen*, as well as the arrest of prominent citizens and an influx of Union troops into the County, citizens were forced to either voluntarily remain quiescent or, if men, surreptitiously cross the Potomac to volunteer for the Confederate army. Only through the use of under-utilized evidence can we hope to achieve the impartiality which Baughman requests and history deserves.

¹⁹ Daniel D. Hartzler, *Marylanders in the Confederacy* (Silver Spring: Family Line Publications, 1986), 43.

²⁰ *Republican Citizen* (Frederick, Maryland), 20 September 1861.

Table 1. The Distribution of Confederate Volunteerism in Frederick County, Maryland by Election District



Source(s): War Department Collection of Confederate Records, "Compiled Service Records of the Confederate Soldiers Who Served in Organizations From the State of Maryland," RG 109, National Archives, Washington, D.C.; Census of 1860, Frederick County, Maryland, Frederick County Historical Society, Frederick, Maryland.

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Voices of Liberation

The Literary Power and Historical Value of the Slave Narrative

by David King

Literature and history are joined at every turn and twist, through triumph and loss, oppression and liberation. Because of literature's role in chronicling and changing history, and history's role in inspiring literature, an interdisciplinary approach is vital to gain a full understanding of either. For example, the bond between history and literature is extremely strong in one of the most historically influential literary genres - that of the slave narrative. This collection of powerful works written by ex-slaves both exposed the deplorable conditions of the existing American slave system, and inspired the collective hope for freedom. Because of the genre's uniqueness and honesty of its testimony, and its relationship with the "peculiar institution" of chattel bondage and its downfall, the narratives are of utmost importance to both the literary critic and the historian. This unique status of the American slave narrative is noted by renowned historian Henry Louis Gates Jr.: "In the long history of human bondage, it was only the black slaves in the United States who...created a *genre* of literature..." (Gates ix).

To gain an interdisciplinary focus on this genre, it is important to first learn the context surrounding these works, the background history of slavery in the Americas. The first American colonies in the South used mostly white indentured servants, but as they decreased in number by the late 1600s, another race of slaves began to be imported into the Chesapeake and West Indies. These slaves were extracted from Africa, robbing the continent of its native inhabitants. From here, the slaves were crammed into ships, sailed to their new homes across the Atlantic Ocean on a treacherous and strenuous voyage known as the Middle Passage. As the complexion of the laborers darkened, so did the white attitude towards this new labor source, and by the early eighteenth century, a rigid societal racism had emerged (Dudley 50-54). With the new cash crops of sugarcane and tobacco, slavery became the economic foundation of the affluent planting class, then increased in value with the emergence of cotton, and became the foundation for the southern economy in general (Adams n. pag., Dudley 79). Under the "peculiar institution," as the economic slave system was often called by whites, slaves were viewed and treated as property rather than human beings, with little exception. Under this pretense and justification, they were bought and traded like property, and were controlled by many inhumane methods implemented by their masters; the most notorious being the various policies of strict discipline, but equally appalling was the mental brainwashing Frederick Douglass wrote so much about: imposing on the slave a sense of inferiority as well as the master's superiority, and shadowing him from the light of knowledge, keeping them helpless and dependent (Adams n. pag.).

Despite the North American slave trade being banned in 1809 by Congress (Dudley 84), as many as 10 million Africans had already been imported to the Americas (Duiker, 413). It was only a matter of time before a voice emerged to speak for such a large amount of people, and that voice appeared in the movement for the abolition of slavery. The abolitionist movement gained strength in the early 1800s, and soon emerged as the largest cause amongst many reform movements behind white leaders like William Lloyd Garrison, Theodore Dwight Weld and the Tappan brothers (Dudley 104), and eventually served as a huge factor in dividing the North and South in the Civil War.

Although the slave narrative appeared as early as 1703 with George Washington Carver's autobiography (Gates ix), they emerged in the early nineteenth century as the second, more personal voice of slavery, fueling and feeding the virtuous and urgent abolitionist cause. The ex-slave's duty

to detail and preach against the many oppressive levels of slavery to a white readership soon overshadowed the original intent, to refute the white belief that Blacks were incapable of writing (Gates x). Because the narrative soon became such powerful propaganda, the numerous literary devices, motifs and strategies utilized to reach and affect their audience become important not only in literature but in history as well.

Many authors of slave narratives followed a “cookie cutter” pattern containing many similar literary devices and motifs, then modified it slightly to suit their individual stories. The ex-slave, if they had the privilege of literacy, or the interpreter, and later the editor, read and analyzed prominent previously published narratives by male pioneers Olaudah Equiano and Frederick Douglass and female equivalents Mary Prince and Harriet Jacobs, using them as models and guides of how to write, how to reach their intended audience, and what content is appropriate to include and omit (Gates x). Most narratives follow a formulaic order: The slave’s state of innocence and ignorance to their condition as a child, the subsequent realization of their cruel predicament, a series of dehumanizing injustices by their masters and other authority figures, a simultaneous growth of independence and thought, a particularly degrading or personal event that leads to a decision of resistance, and finally an escape and flight ending in freedom (Campbell n. pag.).

This reoccurring chronological structure noted in many of these narratives utilizes a compelling literary tool - the journey motif. Although chronological order is the typical format for a story, and was easier and simpler for the slaves to write or tell to a writer, there is a deeper meaning to this writing style. It implies not only the basic physical journey from, for instance, the plantations of the South to the free North, but emphasizes an underlying spiritual journey from the oppressive darkness of bondage to the light of freedom. Frederick Douglass, in his famous 1845 book, Narrative of the Life of Frederick Douglass, relates his spiritual journey to manhood, plainly saying to his reader, “You have seen how a man was made a slave; you shall see how a slave was made a man” (Douglass 97).

One of the early models describing this journey from the beast like state of slavery to the civilized light of freedom was Olaudah Equiano, who in 1789 wrote The Interesting Narrative of the Life of Olaudah Equiano, one of the first known slave narratives. His narrative is a modified and extended version of the traditional order, as he begins his life as a free child in Nigeria’s Igbo tribe, then is kidnapped, experiences the horrors of the middle passage, then journeys to Barbados, Virginia, England, Holland, Scotland and the Mediterranean in a relatively mild form of bondage. As a slave of Mr. King in Monserrat, he endures the much darker side, before he is able to buy his freedom. Despite his epic physical journey, his journey of spiritual growth is more important, as he progresses from the “mental darkness” of a frightened and weak kidnapped child in early chapters, to a liberated and educated freeman able to understand the Bible, and in the final chapter even convert to Christianity (Equiano 144).

The journey motif’s personal, dramatic and spiritual dimensions make the reader feel as if they are on this journey with the slave, and living through the same horrible injustice. In the same manner, they feel joy when the slave obtains knowledge and freedom. There is no better way to reach an audience, especially with abolitionist intentions, than forcing them to see through the eyes of the slave. In fact, one of the reasons for the slave narrative’s popularity was this journey, which was so painful to the author, but fit into the romantic individualist literature of the time, providing the reader adventure and sensational violence (Campbell n. pag.).

Notwithstanding her pregnancy,...he then flogged her as hard as he could lick, both with the whip and cow skin, till she was all over streaming with blood. Ere long her body and limbs swelled to a great size...till the water burst out of her body and she died. (Prince 95)

After receiving hundreds of lashes...[he was] placed between the screws of the cotton gin, to stay as long as he had been in the woods. When he had been in the press four days and five nights...a horrible stench came from the gin house. When the press was unscrewed, the dead body was found partly eaten by rats and vermin. (Jacobs 75-76)

It was very common...for the slaves to be branded with the initial letters of their master's name; and a load of heavy iron hooks hung about their necks. Indeed on the most trifling occasions they were loaded with chains; and often instruments of torture were added. The iron muzzle, thumb-screws, &c...were sometimes applied for the slightest faults. (Equiano 76-77)

Unfortunately, vivid and horrific accounts like these were not uncommon in the life of a slave, but when applied to the pages of a slave narrative, they had explosive impact. Often the author multiplies this effect by listing many appalling incidents over several pages, not only touching, but also overwhelming the reader. Equiano dedicates his whole fifth chapter to this purpose, naming the sixteen pages "various interesting instances of oppression, extortion and cruelty" (Equiano 66). Douglass takes four pages to assault his audience with the horrors he witnessed while on Colonel Lloyd's plantation, then frustrates them with the fact that none the offenders were pursued or punished (Douglass 47-50). The author strategically selects and emphasizes tales from capture, sale, and life afterwards, with its cruel methods of discipline and relentless work, not to mention sexual abuse of the women. This was not only a powerful sensational hook, but appealed to the emotion and conscience of the reader, rallying support for slaves in their battle for emancipation, and in turn aiding the abolitionists immensely.

This reality of the South's "peculiar institution" opposed violently the romantic and sentimental plantation stories written by whites, and more importantly, the white slave holder's myth of the "happy slave" (Adams n. pag.). When asked about the state of his slaves, the Southern slave owner would often present this falsity, describing his poor workers as peaceful, dancing, singing, happy and contented (Dudley 115-116). Obviously, the accounts discussed above expose a different and shocking truth to their readers. Harriet Jacobs even mentions this myth sarcastically - "Strange that they should be alarmed (at Nat Turner's insurrection) when their slaves were so 'contented and happy'" (Jacobs 97).

The slave narrative shows religion as having two faces in the slave narrative; its corrupted slave holding version is picked apart and criticized, while its pure and virtuous opposite is portrayed as the slave's support, source of strength, and as the culmination of their spiritual journey. Because slave holders and other figures often claimed to be religious, while manipulating and hiding religion from the slaves, their hypocrisy is consistently analyzed, attacked and torn down in a multitude of narratives. Frederick Douglass dedicates his whole appendix, which begins as a denial that he is an Atheist, to pointing out the inconsistencies and blatant hypocrisy of "slave holding religion" (Douglass 155-156). Harriet Jacobs says of one particularly cruel neighboring slaveholder, "He boasted the name and standing of a Christian, though Satan never had a truer follower" (Jacobs 77). She also describes a heavily biased sermon by a Reverend sarcastically labeled Pious Mr. Pike, where he ironically yells at the slaves for being sinners, telling them that God is punishing them for it. Even though the slaves are intelligent enough to find him amusing, it is still a shocking manipulation of religion (Jacobs 106).

Religion's good side is shown in narratives as well, as the spirit of religion and faith in God accompanies many of these slaves through their hardships, some turning to the light of organized religion as they progress on their spiritual journey. As previously mentioned, Olaudah Equiano goes from bondage to freedom while simultaneously changing from a boy curious about God to a

Christian convert. In a powerful statement about this fortunate shift, he says he is a "particular favorite of Heaven" (Equiano 12). Elizabeth Keckley, an ex-slave who worked for the Lincoln family, sees suffering in life as having a reward in the afterlife, a Christian idea - "We who are crushed to earth with heavy chains, who travel a weary, rugged, thorny road, groping through midnight darkness on earth, earn our right to enjoy the sunshine in the great hereafter" (Keckley 24). Shortly after Jacobs shows the biased Reverend Pike, she contrasts him with a clergyman who is loved by all the slaves, enlightens them by teaching them how to read and write, and tells them the truth of God, that He "...judges men by their hearts, not by the color of their skins" (Jacobs 111)

By associating slaves with God and associating slaveholders with corrupt religion, the author makes a clear division between good and evil. Also, the ability to recognize the misuse of religion and produce such sharp criticisms of it showed a higher intelligence in blacks. In a time where most whites attended church and were religious, this religious strategy was an effective means of gathering support for slaves.

The censorship of names is a useful strategy in many of the slave narratives. Under the Fugitive Slave Act of 1850, which allowed fugitive slaves be retrieved, the logical reason to omit the master's name and his location, or even to write under an alias as Harriet Jacobs did as Linda Brent, is to protect the author from recapture by the master or hired bounty hunters. Solomon Northup tells this horrible tale in his narrative, where he is kidnapped from freedom at the age of 33 (Northup 27). While this was not uncommon in these frightening and turbulent times, censorship has literary purpose as well, as a blank name is now made a symbol - A master represents the injustice and evil of the whole institution, and the location becomes anywhere slavery is used. Mary Prince shows a particular aim not to bring shame on the individual or his family, but to symbolize the collective evil of slavery, when the only two names she censors are "Mr. D—" and "Captain I—," the men that commit unjust acts in the name of slavery (Prince 185). Harriet Jacobs achieves a similar effect in her narrative by changing the names of the characters and concealing the locations, implying to the reader that it could be anywhere, and the injustices she describes are no exception, but closer to the rule (Jacobs 1).

A characteristic unique to the male slave journey is the event of physical resistance to authority. The most famous of these powerful incidents is Frederick Douglass' s fight with Edward Covey, a tough slave breaker. After six months under his cruel treatment, Douglass finally resolves to resist, and puts up a strong fight against him for two hours. He emerges as the victor in the fight for several reasons. First, Covey never assaulted him again. Of more long term importance, his "...long-crushed spirit rose, cowardice departed, and bold defiance took its place..." (Douglass 105). Covey is used to represent slavery in general, as Douglass decides to fight for his freedom. In Harriet Jacobs's tale, her brother Ben also fights his master, resulting in a victory as well, and a subsequent flight North (Jacobs 33). By painting the physical resistance in a heroic, triumphant light, and by showing positive results, the author encourages the reader to fight against slavery.

In male narratives, literacy is frequently portrayed as the portal to freedom. Slaves were sometimes fortunate enough to have someone willing to teach them, or were forced to find more clever ways to gain this knowledge, in order to combat the devious methods used to maintain slave ignorance. Douglass' s story is a great example of both strategies, as when he arrives in Baltimore, Ms. Auld teaches him the alphabet and how to spell some small words (Douglass 58). Mr. Auld then expresses the typical slave holding view that education and slavery are incompatible, thwarting her efforts, but providing a revelation for Douglass, helping him realize the importance of literacy in his quest for freedom. From this point on, he resorts to various clever methods, either teaching himself by reading labels on the shipyard timbers, or challenging literate boys to write better than his own efforts (Douglass 70). By gaining literacy, Douglass replaces his "mental darkness" and brutality with knowledge and power, essential not only to escape the clutches of slavery and reach freedom,

but also to survive as an independent man in the free states. While being able to read and write gave slaves the knowledge and power to gain freedom, it gave ex-slaves opportunities to express themselves, protest their condition, and oppose the falsities and lies the Southern whites promoted.

Just as the white man could not adequately speak for the black man, the male author of the slave narrative was not able to capture in full the unique personal hardships experienced by female slaves (Gates xiii). The value of the female slave was determined not only by the male slave measure, the amount of work one could complete, but also the ability to have and raise children (Smith xxx), adding two new dimensions to slavery which are seldom explored in male narratives: maternal bonds and sex.

The less controversial of the two was the common tragedy of broken and strained mother-child relationships. Jacobs explores this extensively in her narrative, as her children are her “ties to life” (Jacobs 90), and her grandmother is made to represent this tragic bond in her novel, as she weeps at the loss of many of her children and cares for Harriet’s two children, Benny and Ellen. On the other side, Frederick Douglass sees his mother only four or five times, and only at night (Douglass 24). Although most males could not grasp the heartache of an enslaved mother, Douglass does this in a paragraph about his grandmother, who, “...saw her children, her grandchildren and her great-grandchildren, divided, like so many sheep” (Douglass 76). Discussing this injustice was especially effective to the white female audience, as it referred to as such a treasured part of their lives.

Mary Prince pioneered the female narrative with her History Of Mary Prince, published in 1831, telling her tale from this unprecedented female perspective, centering on her struggle for freedom despite the tortures of slavery in the Caribbean. She also introduced the element of sexual injustice to the slave narrative, telling about her master’s “...ugly fashion of stripping himself quite naked, and ordering [her] then to wash him in a tub of water,” which to her, was worse than all the whippings she had received (Prince 202).

To reach their intended audience of white women, female slave narratives had to follow a different, less explicit format than their male counterparts. Harriet Jacobs solved this problem by combining the popular, sentimental novel and the slave narrative, allowing her to talk about these horrible sexual abuses (Smith xxxi). In her narrative, Dr. Flint is the relentless villain and oppressor, and Jacobs is the poor victim, who to escape his advances has two children with another man, Dr. Sands. With the exception of a few angry outbursts of violence, Flint’s sexual harassment is less physical than mental and verbal. Because of the audience, Jacobs never directly quotes his foul words, but gets the point across with phrases like “...talk such as would have made the most shameless blush...” or “...oaths terrible enough to palsy a man’s tongue” (Jacobs 91, 119). Not only does she discuss Flint’s harassment in detail, but also the oppressive cruelty of his jealous wife, another villain unique to the female narrative (Jacobs 49-54). Despite Jacobs’ format, borrowed from the romantic novel, she still feels the need to remind her female audience that her journey ends not in marriage, but in freedom (Smith xxxvi).

These unique aspects made the female narrative outstanding propaganda for the abolitionist movement, and the movement for women’s rights, which was a parallel movement at the time (Quarles xx). Jacobs states that women suffer more in slavery, which is supported by the numerous chilling stories of rape, sexual torture and heartbreaking separations from family and children, adding to the adversity of the male slave (Jacobs 119).

Since the slave narrative had such an important role in history, there is no doubt that the slave narrative genre is equally as important to the historian. Because of the unique aspects of these poignant stories however, the narratives require their adaptation to the unique set of problems they give them.

It was necessary for the authors, for the purpose of good storytelling and length, to take literary license in editing their story. They emphasize events that would interest their audience, and leave out

the more normal and monotonous events of their lives in slavery. Equiano makes no effort to cover this up in his narrative, telling his reader "it would be tedious and uninteresting to relate all the incidents which befell me during this journey..." (Equiano 32). Jacobs admits to changing the names of people and places in her story (Jacobs 1), while pouring her tale into a romantic mold for her Victorian female audience (Smith xxxi). Even the slave narrative's most celebrated author, Frederick Douglass, shows his use of literary license in the differences between his first and second narrative. For example, in his first fight with Covey he is alone, and in the second version there is a woman watching who does not choose to intervene (Berlin n. pag.).

As mentioned before, the "cookie cutter" pattern has been used by many authors of narratives, whether by the slave himself or by his writer. While this functioned as an appropriate guideline for many slaves to publish their stories, it also shaved off and curtailed much of the originality and individuality in the stories, creating a large portion of the genre that follows the same blueprint (Gates x). Twentieth century historian E. H. Carr speaks of these primary modifications as a frustrating disadvantage, as the content has been previously selected and the account preprocessed, not allowing the historian the freedom to interpret and judge the pure form of what happened (Carr 12). Unfortunately, because of this modification and alteration, the pure story is lost; the very form of history historians treasure and search for in their journey to assemble these fragments of history into a meaningful picture (Carr 24).

In most cases, slave narratives were not only edited by the original author but went through many changes and stages, passing through the hands of editors, publishers, and abolitionists. This shortens the historian's view of the pure story even more, replacing it with a deceptively advantageous ignorance (Carr 13). Exaggeration and emphasis on certain events may present false impressions and in turn create an imbalance when the historian takes these documents and attempts to assemble a historical model from them. John W. Blassingame expresses this view when he calls Jacob's narrative simply "not credible," "too orderly" and "too melodramatic" (Gates xvi). Some whites reacted in a similar way to the narratives, "...often [dismissing them] as mere antislavery propaganda" (Adams n. pag.). Some narratives were written extraordinarily well, adding more doubt that these mostly inexperienced writers could produce such works without considerable help. Some did receive help, as Prince dictated hers, Jacobs was helped by abolitionist Lydia Maria Child (Jacobs 7), and because most of the ex-slaves were unable to write, most slave autobiographies were ghostwritten by abolitionist authors (Quarles xvi).

As exhibited by these problems, examining every minute detail that poses as a fact in order to assemble the history of slavery is an inappropriate usage of the slave narrative, and is far from the intended purpose of the author. As contemporary historian Dr. Ira Berlin points out, as in any painful event, there are two sides to slavery, history and memory. History can be criticized, contested and looked at with the traditional skeptical historian's eye. Memory on the other hand, like those shared in slave narratives, consists of emotions and personal stories and should not be analyzed with the same harsh skepticism (Berlin n. pag.). According to these standards, the slave narrative is definitely a memory.

The historian must instead look at the context surrounding the slave narrative, as well as its role and impact on history, asking the all-important questions of why and how, because there are so many other dry one-dimensional documents to answer other questions (Carr 113). This is where the study of the slave narrative's motifs and literary strategies work so well within history, giving the reason why the narrative touched its audience.

Let the historian ask of the narrative, "How did you impact your readers?"

The answer lies in what John A. Collins of the Massachusetts Anti-Slavery Society once wrote to William Lloyd Garrison: "The public [has] itching ears to hear a colored man speak, and particularly a slave. Multitudes will flock to hear one of his class" (Gates xi). This was 1842, the

height of importance for the slave narrative and the abolitionist movement, with the Civil War looming on the horizon. Three years later, Frederick Douglass published his first narrative and sold 30,000 copies in the next five years, reaching France, England, Ireland and the United States (Quarles xxxi). Solomon Northup's 1853 narrative sold 27,000 copies in two years (Gates xi).

Ironically, these narratives would not get the most attention or the biggest sales. Harriet Beecher Stowe's Uncle Tom's Cabin sold 300,000 copies in its first year (Dudley 130). Stowe, a white woman, wrote this fictional imitation of a narrative in 1852 after several influential slave narratives, including Douglass's, Equiano's and Prince's, had been published, and after much influence by the abolitionist movement (Sunshine n. pag.). Out of the very audience Prince and Jacobs tried so hard to address and reach, comes one of the most influential novels of the nineteenth century, sparking conversation and debate over slavery in white households all over America, primarily in the North (Adams n. pag.).

Let the historian ask of the narrative, "How did you and your author fit in to the Abolitionist movement?"

By the early 1800s, the antislavery movement was already producing volumes of literature in many different forms, including, newspapers, periodicals, sermons, children's publications, speeches, abolitionist society reports, songs and illustrations (Library n. pag.). Especially in Garrison's forceful abolitionist policy, the narratives, with their numerous biting criticisms of slavery, fit right in, and were published not only separately, but in his newspaper the *Liberator* (Quarles xx). Garrison even wrote a preface to Frederick Douglass's first narrative, describing the public speech as another important role of the ex-slave:

I shall never forget his first speech at the convention...the powerful impression it created upon a crowded auditory, completely taken by surprise — the applause which followed...There stood one, in physical proportion and stature commanding and exact—in intellect richly endowed—in natural eloquence a prodigy—in soul manifestly "created but a little lower than the angels"—yet a slave, ay, a fugitive slave. (Garrison 4)

Like his slave narrative, the people support Douglass because of his unpracticed emotion, honesty and humble status yet powerful story, gravitating toward him more than the white abolitionist speakers who did not have any comparable strife to back up their devotion to the cause, or the humility. This incident shows precisely the explosive role of the slave narrative within the antislavery movement.

Let the historian ask of the narrative, "Besides the Abolitionist movement, how did you affect history?"

As previously mentioned, they combated the idyllic pictures of the "happy slave" and the romantic plantation promoted by slaveholders and white literature. The more controversial and popular the narrative, the more it instigated arguments and conversation within the white population, especially before the Civil War. After the War, they served as reminders of the institution that divided the nation (Adams n.pag). They proved beyond doubt that blacks could master the arts, shattering the early "scientific" idea that they were destined for slavery (Gates ix).

Fortunately, even for the historian who has his mind set on extracting facts and historical judgments out of the slave narrative, slave narratives are advantageous because of their sheer numbers and variety. When studying a broad and often intimidating subject such as slavery and its history, the historian must consider not only the "typical" slave story that many of these narratives contain, but remember to utilize the many different situations that reflect the varying conditions of slavery. Although it is known that many of the authors of the genre followed a pattern, the diverse range of experience and situation offered in the over 6,000 slave narratives available, 200 of which

are book-length, is still essential to gain knowledge of the similarly wide range of the subject (Campbell n. pag.). Equiano's story, besides showing both mild and harsh versions of bondage, details slavery in Africa as well as the notorious Middle Passage (Gates xiv). A historian should always be on a quest for knowledge and information concerning their area of study; therefore the wide selection of slave literature available to them will always be to their advantage.

Slave narratives are written in the first person, allowing the historian to see and think like a slave. This advantage is described by Carr, who declares, "History cannot be written unless the historian can achieve some kind of contact with the mind of those about whom he is writing." Here the skeptical fact-oriented historian can use the narrative itself, even while edited and "impure" in the class of memory, because the clear ideas and thoughts of the slave allow them the "imaginative understanding" they need to write an effective history (Carr 27).

Because literature is such a vital part of history, it has the potential to be endlessly useful to both the literary critic and the historian: that is, if they ask the right questions, look for appropriate meaning, and use an interdisciplinary approach. This is especially true in the literary genre of the slave narrative, with its unique strategies, devices and formula designed for a powerful persuasive effect, which, although born from the evils of slavery, were instrumental in the destruction of it. Since the ever-changing history of slavery and the immortal memory of the slave narrative genre cannot outshine each other, they should be joined, elevating both, giving the world a higher understanding of one of the most unforgettable times in world history (Berlin n. pag.).

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Transformation in Gram-Positive Bacteria versus Gram-Negative Bacteria

by Donna Zeman

ABSTRACT

Following certain protocols, induced laboratory transformation with the pBLU plasmid containing an amp^R gene was fairly easy to accomplish in gram-negative *Escherichia coli* (*E. coli*). This may be due in part to its initial outer membrane, with its porin protein channels and Bayer patches, which can allow for passage of large molecules, such as DNA. This researcher desired to achieve similar results in gram-positive *Staphylococcus aureus* (*S. aureus*). Both types of bacteria display the ability to become antibiotic resistant, therefore, proving the possession and subsequent expression of antibiotic resistant genes. The variable in question is the difference in composition and structure of the gram-positive cell wall, (as compared to the gram-negative cell wall), and the permeability of such for large DNA molecules to enter the cell. The reported findings show that the induced laboratory transformation following the exact same protocols as were performed with *E. coli* was not successful in *S. aureus*. The failure to affect transformation may be due to the thicker peptidoglycan layer contained in its cell wall and, therefore, a lesser degree of permeability. Another explanation may be the cutting up of DNA by nucleases before it enters the cell. Treatment of *S. aureus* (and of gram-positive bacteria in general) with electroporation, lysozyme, and /or a different divalent cation, may render the cell more permeable, leading to favorable transformation.

INTRODUCTION

The year was 1928. Fred Griffith was a British medical officer in the Ministry of Health in London who was studying the bacterium, pneumococcal pneumonia, which causes pneumonia. (Today this bacterium is known as gram-positive *Streptococcus pneumoniae*). At the turn of the century, pneumonia was the leading cause of death in the Western Hemisphere, and its victims were not just limited to the aged or infirm. Researchers abroad and in the United States were striving to find a cure or at least a way to treat it successfully. Antibiotics had not made their way into medical treatment of bacterial infections just yet. In one of many laboratory experiments, Griffith mixed two strains of the bacteria, a pathogenic one and a harmless one. The pathogenic form produced an external polysaccharide coating that caused colonies to appear smooth when grown on the surface of agar medium in contrast to the harmless form, which does not have the external polysaccharide coating and therefore appear as rough colonies. In a series of steps, he found that by mixing heat-killed cells of the pathogenic strain with those of the living harmless strain, he somehow "transformed" the harmless strain into a pathogenic one. He called this phenomenon "transformation" (Campbell, Reece, Mitchell, 1999). At the time, it was not known that DNA was the source of genetic information. Eventually this initial research and the subsequent research of Oswald Avery, Maclyn McCarty and Colin MacLeod led to the discovery of DNA as the "transforming principle" (McCarty, 1985). This in turn has led to a better understanding and broader knowledge not only to genetics as a whole, but specifically to the world of bacterial genetics and antibiotic resistance.

As Fred Griffith must have felt a mix of emotions (excitement, amazement and a strong desire for further research), this researcher, too, experienced a similar reaction upon her first encounter in a

learning laboratory experiment involving the successful laboratory induced transformation of *E. coli* with the pBLU plasmid, which contains an ampicillin resistant gene (ampR) and a beta-galactosidase (X-gal) gene (kit from the Carolina Biological Supply Company), (Rapoza et al., 1999). A subsequent laboratory experiment involving the process of Gram-staining to differentiate bacteria based on the difference in composition and structure of their cell walls was also performed. These two laboratory exercises, plus the knowledge of the looming world-wide threat of antibiotic resistant bacteria, set the stage for further investigation by this researcher.

In this experiment, the researcher will attempt to successfully induce laboratory transformation of gram-positive *S. aureus* with the pBLU plasmid DNA (5,437 base pairs in size) containing an ampicillin resistant gene (ampR), and a beta-galactosidase gene (as a color marker). The same methods, procedures, applications and materials that were successfully utilized in the above-mentioned experiment with gram-negative *E. coli* were employed. The concerned variable is the difference in composition and structure of their cell walls. While the rate and effectiveness by which each transform might be affected by these differences, both bacterial types exhibit the ability to transform and express antibiotic resistance. The emergence of penicillin resistant strains of *S. aureus* was first seen in the 1950s, followed by resistance to more powerful antibiotics such as tetracycline and the aminoglycosides (Caruana, 2001), therefore proving conferral and uptake of resistant genes by this bacteria. Besides the successful laboratory induced transformation of *E. coli* with the ampR gene, the wild-type has also displayed antibiotic resistance (Lewis, 1995).

Generally, bacteria can be classified into two types – gram-positive and gram-negative. This classification is made based on distinguishing between differences in composition and structure of their cell walls. The “Gram” refers to the gram-staining method developed in 1844 by a Danish physician, Hans Christian Gram (Gram Staining, n.d.). Today, this method still serves as one of the most important and widespread staining techniques for bacterial classification. The way their cell walls retain or lose the initial crystal violet-iodine complex and/or the subsequent safranin stain indicates whether a bacterium is gram-positive or gram-negative. Gram-positive bacteria have a high affinity for the initial crystal violet-iodine complex and will retain it through the decolorizing alcohol rinse, appearing purple to purplish-brown in color. Gram-negative bacteria have a low affinity for the initial crystal violet-iodine complex and will lose it through the decolorizing alcohol rinse, instead retaining the subsequent safranin stain, appearing bright pink to red in color. This is due to the differences in the amount of the substance, peptidoglycan (also called murein), each contain in their cell walls. Gram-positive cell walls are much richer in this substance than are gram-negative cell walls. Peptidoglycan is what traps and retains the initial dye aiding us in distinguishing between the two types of bacteria (Campbell, et al., 1999).

Antibiotic resistance by bacteria in general, whether it is in gram-positive or in gram-negative bacteria, has become an alarming and frightening world-wide fact. Misuse and overuse of antibiotics have rendered bacteria resistant to the ravaging and devastating effects an antibiotic produce. Bacteria, being the resilient creatures they are, have adapted and prospered over the millennium to often hostile and ever-changing environments. It is no wonder that they have adapted and become resistant to antibiotics in a world where antibiotics are used freely. Ampicillin is a modification of penicillin and belongs to the group of antibiotics known as Beta-lactams. The Beta-lactam antibiotics bind to and inhibit enzymes needed for the synthesis of the peptidoglycan cell wall. They are especially lethal to dividing bacteria, as defective walls cannot protect the organism from bursting in hypotonic surroundings. A bacteria who has acquired the ampR gene has developed resistance to the antibiotic’s ravaging and devastating effects upon it because of the gene’s ability to synthesize the enzyme, Beta-lactamase, which breaks the Beta-lactam ring, a crucial place in the antibiotic’s molecular chemical chain (Bacteria n.d.). Other resistant genes might code for “efflux” pumps that eject antibiotics from cells (Levy, 1998).

In the scope of bacterial genetics, transformation is defined as the uptake and incorporation of free naked DNA by a host bacterial cell from its surrounding environment resulting in the transfer and expression of genetic information. This free DNA can be small, fragmented linear pieces of DNA or whole plasmids. With fragmented DNA, once inside the cell, the base sequence of the new DNA is compared to the host bacterium's DNA. If enough similarity exists between the two, the new DNA can be substituted for the homologous region of the bacterium's DNA, resulting in recombinant DNA. If no homology exists, the new DNA is not incorporated and is broken down by intracellular enzymes. A plasmid is a small, generally circular and double stranded DNA molecule, which has an origin of replication, and can exist as separate from the bacterial chromosome (nucleoid region). Because plasmids have an origin of replication, it can be copied by the host's DNA replication enzymes and passed on to the host's daughter cells and expressed, even though it has not been incorporated into the bacterium's own genome. Occasionally, a plasmid can reversibly integrate as an episome with the host chromosome by homologous recombination if similar sequences are present. Given their versatility, plasmids make useful tools for researchers and molecular biologists as they can serve as gene vectors. Plasmids exist naturally. They are small in size, ranging from 1,000 to 200,000 base pairs as compared to the genome of *E. coli*, which contains 4.6 million base pairs. Plasmids frequently contain genes that confer resistance to antibiotics. The incorporation of plasmids, and subsequent transfer and expression of genetic information, cause a change in the phenotype and/or genotype of the cell, therefore "transforming" it (Campbell et al., 1999, Rapoza et al., 1999, Micklos, Bloom, 1988, Rudin, 1997).

Generally, bacteria do not like having foreign plasmids within them as this hampers their growth and size. As a result, there is always tremendous pressure on cells to get rid of their plasmids. They are usually not essential to the survival of the host; however, in a certain environment a plasmid that contains a gene that (when expressed) is beneficial to the host in that particular environment, the host becomes favorably "transformed" and allows it to flourish and survive. Having a plasmid carrying a gene that codes for antibiotic resistance is advantageous. In general, life on earth has evolved in response to adaptation to an environment. Certain organisms, such as molds and yeasts, secrete antibiotics which give them the capability to compete against other organisms, such as bacteria, for nutrients and space. The aim of this is to "kill" the organism they are in competition with. Containing a plasmid carrying an antibiotic resistant gene is beneficial to the bacteria, and an evolutionary counter-response. Antibiotics secreted by those molds and yeasts exert a selective pressure for the evolution of antibiotic genes that are stably inherited by bacteria (Micklos et al., 1988).

In addition to transformation, there are several other ways by which bacteria acquire genes conferring antibiotic resistance. In transduction, genetic information is transferred from one bacterium to another by means of a bacteriophage. A bacteriophage is a virus that infects bacteria. The virus attaches to the cell wall of a host and injects its chromosome into the host. Host DNA is hydrolyzed and viral DNA and proteins are made. The completion of viral reproduction ends in the death of the host cells, resulting in the lytic cycle. When the host cell lyses, newly reproduced bacteriophages are released and the cycle repeats itself, with the bacteriophage attaching to and injecting its genome into a new host bacterium. If a small piece of the host's degraded DNA is accidentally packaged with the bacteriophage, this small DNA piece might be injected into a new host cell, and can subsequently replace the homologous region of the new host cell's chromosome, resulting in a change in genotype. Occasionally, the new bacteriophage may be packaged with bacterial DNA instead of viral DNA. If this is the case, whole plasmids may be transferred between hosts. In either case, genes for antibiotic resistance may be transferred between bacteria (Campbell et al., 1999).

Conjugation is another way that bacteria exchange genetic information. Although bacteria reproduce asexually, conjugation is a kind of “sexual transmission” between bacteria. In this process, a donor passes on part of its genome to a recipient. In gram-negative bacteria this is done by means of a sex pilus, which is a hollow protein filament found morphologically on the external of a bacterium. Conjugation in gram-positive bacteria does not involve pili, but rather involves the would-be recipient to secrete substances that prompt potential donors to form protein adhesions (clumping factors) on their surfaces that cause aggregation with the recipient cells. When the cells associate, they form the pores needed for DNA exchange. The genetic information passed on could become recombined with the host’s chromosome or exist as a separate plasmid in the host. Often “R” plasmids are passed on (R for resistance). Some R plasmids carry as many as ten genes for resistance to various antibiotics (Campbell et al., 1999, Levy, 1998).

Mutations are another way that bacteria become antibiotic resistant. In bacterial populations, mutations are constantly arising due to errors made during replications. If there is any selective advantage for a particular mutation, such as antibiotic resistance, the mutant will rapidly become the major component of the population given the fact that bacteria proliferate quickly and have short generation spans (Mayer, 2000).

While naturally transformable bacteria strains exist by means of possessing membrane proteins that facilitate the recognition and absorption of functional DNA, these are sufficiently rare that induced transformation is more important to geneticists and molecular biologists. As previously mentioned, plasmids can be used as vectors for carrying a gene of interest into an organism, and they are perfect since they do not need to be incorporated into the host’s own genome in order to be expressed. Even under the best of circumstances however, the uptake of a specific foreign gene by a cell is a relatively rare event. In order to facilitate this in induced laboratory transformation, cells need to be made “competent” and are done so by treatment most often with ice-cold calcium chloride (as a buffer) in the early log phase of growth. This is followed by adding the plasmid of choice, and subsequently subjected to a heat shock of 42°C (Micklos et al., 1988, Paustian, 2001).

As far as making cells competent, it is worthy to mention that although calcium chloride is most commonly used, several others, such as Mn^{2+} , Mg^{2+} , and multivalent cations have also been used. There are several explanations why divalent and multivalent cations are used. One idea holds that the ions and plasmids are given a chance to loosely associate with the cell membrane. When heat shocked, the ions are displaced, forming pores for the DNA to enter (Yal online). Another idea mentions that as chloride ions enter the cell, water molecules accompany them, causing the cell to swell and, therefore, the swelling of the cell is necessary for DNA uptake (Roe n.d.). Yet another mentions what happens to *E. coli*. Multivalent cations form a shield over the phosphate rich backbone of the DNA, and over the phosphate rich LPS core, so that these two polyanions could associate with each other, and not be electrically repulsed by their negative charges. A temperature at 0°C in conjunction with the cations crystallize membranes. Subsequently heat shocking the cells complements this chemical process and helps move DNA through the adhesion zones (Hanahan, 1987). No one can be absolutely sure what really happens, but weakening of the cell wall seems to be completely necessary in order for transformation to be effective.

PROCEDURES

In the following laboratory experiment, this researcher used ampicillin sensitive gram-positive *S. aureus* and gram-negative *E. coli*. *E. coli* was the control, since this organism had been previously demonstrated to be transformed successfully. *S. aureus* was the experimental. Cell suspensions for both organisms were distributed on Luria Broth (LB) agar plates, LB plates with the addition of ampicillin (LB/AMP), and LB plates with the addition of ampicillin and X-gal (LB/AMP/

X-GAL). The kit used was the pBLU Colony Transformation Kit, Cat. # RG-21-1146, from the Carolina Biological Supply Company, 2700 York Road, Burlington, North Carolina 27216-6010, and the suggested procedures.

1. Used sterile 15 mL tubes. Marked one SA+ (for *S. aureus* with plasmid), one SA- (for *S. aureus* without plasmid), one EC+ (for *E. coli* with plasmid), one EC- (for *E. coli* without plasmid).
2. Used a sterile transfer pipet to add 250 uL of ice-cold calcium chloride to each tube.
3. Placed all four tubes on ice.
4. Used a sterile plastic inoculating loop to transfer a cell mass about the diameter of a pencil eraser from isolated colonies of *S. aureus* from the starter plate into the "+" tube, and an equal amount into the "-" tube.
5. Suspended the cells by repeated pipetting with a sterile pipet.
6. Returned the tube to ice.
7. Used a sterile plastic inoculating loop to transfer a cell mass about the diameter of a pencil eraser from isolated colonies of *E. coli* from the starter plate into the "+" tube, and an equal amount into the "-" tube.
8. Repeated Steps 5 and 6.
9. Used a sterile pipet to add 10uL of pBLU plasmid DNA to "+" *S. aureus* tube. Used another sterile pipet to add 10uL of pBLU plasmid DNA to "+" *E. coli* tube.
10. Gently spun the loop, mixing the plasmid DNA with the cells.
11. Returned the tube to ice to incubate for 15 minutes.
12. Labeled media plates in the following manner:
LB-, LB+, LB/AMP-, LB/AMP+, LB/AMP/X-GAL-, LB/AMP/X-GAL+
13. Following the 15 minute incubation on ice, all tubes were placed in a test-tube rack and immediately given a heat shock by being immersed in a 42°C water bath for 90 seconds. The tubes were gently agitated in the water bath.
14. Tubes returned directly to ice for one minute.
15. Used a sterile transfer pipet to add 250uL of Luria broth to each tube, gently tapping each tube to mix the broth with the cell suspension.
16. Transferred all tubes to a test-tube rack at room temperature for a 15 minute recovery.
17. Used a sterile transfer pipet to transfer 100uL of cells (each time) from the *S. aureus* "+" tube to the "+" plates. Used a sterile transfer pipet to transfer 100uL of cells (each time) from the *E. coli* "+" tube to the "+" plates.
18. Used 6 glass beads per plate to evenly distribute cell suspension on agar surface.
19. Repeated Steps 17 and 18 for the *S. aureus* "-" tube and "-" plates.
20. Repeated Steps 17 and 18 for the *E. coli* "-" tube and "-" plates.
21. Let all plates rest for several minutes to allow cell suspension to become absorbed into the agar.
22. Removed glass beads from all plates by vertically inverting plates over a container.
23. Placed all plates in the incubator at 37°C for 26 hours.

RESULTS

TABLE 1 – *Staphylococcus aureus*

LB	+ PLASMID Lawn	-PLASMID Lawn
LB/AMP	0	0
LB/AMP/X-GAL	0	0

TABLE 2 – *E. coli*

LB	Lawn	Lawn
LB/AMP	192 White Colonies	0
LB/AMP/X-GAL*	137 Blue Colonies 161 Blue Colonies 162 Blue Colonies	0

*100 uL of cell suspension was distributed to each of three separat LB/AMP/X-GAL+ plates. Based on the total number of Blue Colonies received in all three plates (460), an average of 153 Blue Colonies was obtained. This average produced a t value = 18.7. This valus is significantly greater than the numbers on the probability chart, and puts the probability of significant difference greater than 99.99%.

DISCUSSION

For *S. aureus* (Table 1), lawn growths (bacteria continuously cover entire surface of petri dish) were obtained on both the LB+ plate and the LB- plate (Figures 1-C, Figure 2-C respectively), indicating that the organism was not compromised by the manipulative procedures. No growth was obtained on the LB/AMP- plate (Figure 2-B), nor on the LB/AMP/X-GAL- plate (Figure 2-A), indicating that the organism we started out with was sensitive to ampicillin. However, even with the addition of the plasmid to *S. aureus*, there was no growth on the LB/AMP+ plate (Figure 1-B), nor on the LB/AMP/X-GAL+ plate (Figure 1-A), indicating that attempted laboratory induced transformation with an ampR gene was not successful.

For *E. coli* (Table 2), lawn growths were obtained on both the LB+ plate and the LB- plate (Figures 4-B and Figure 3-C respectively), indicating that the organism was not compromised by the manipulative procedures. Growth of 192 white colonies was obtained on the LB/AMP+ plate (Figure 4-A), indicating that induced laboratory transformation with the ampR gene was successful. No growth was obtained on the LB/AMP- plate (Figure 3-B), nor on the LB/AMP/X-GAL- plate (Figure 3-A), indicating that the organism was sensitive to ampicillin. The three LB/AMP/X-GAL+ plates showed the following growth: 162 blue colonies (Figure 5-A), 137 blue colonies (Figure 5-B), 161 blue colonies (Figure 5-C and 6-A), giving an average of approximately 153 blue colonies per

plate. The growths obtained on these three LB/AMP/X-GAL+ plates indicate that the induced laboratory transformation with the ampR gene was successful. In addition, the organism expressed the Beta-galactosidase gene, as evidenced by the blue color of the colonies. The blue color was produced by the organism's ability to cleave the X-gal that was added to the media in this plate. Based on calculations as per the Carolina Biological Supply Company, a transformation efficiency of 1.53×10^4 was calculated. The literature from Micklos states a successful transformation efficiency range of 10^5 to 10^7 (using the calcium chloride procedure). The results obtained fall at the low end of this range.

Induced laboratory transformation using the same methods, procedures, applications and materials was not successfully accomplished in gram-positive *S. aureus* as it had been in gram-negative *E. coli*. The difference in composition and structure of the cell wall very likely impedes uptake and incorporation of the plasmid. The presence of the initial thick peptidoglycan layer in *S. aureus*, with its heavy cross-linkage and interpeptide bridges suggests retardation and/or obstruction of large molecules, such as DNA, from entering the cell. The additional possession of nucleases may also be a hindrance, by means of possibly "chopping up" the plasmid before it enters the bacterium.

Peptidoglycan is composed of an overlapping lattice of modified sugars that are cross-linked by amino acid bridges. A single peptidoglycan unit can be linked with other units via covalent bonds to form a repeating polymer, resembling multiple layers of chain-linked fence. The molecular makeup of these layers varies among species. Gram-positive bacteria have these interpeptide bridges, while gram-negative have few or none at all. The degree of cross-linking determines the degree of rigidity. The peptidoglycan can be thought of as a strong, woven mesh that holds the cell shape. It is not a barrier to solutes, as the openings in the mesh are large, and all types of molecules can pass through them. Under the peptidoglycan mesh (also called the murein sacculus) (Boyd 1984) is the cytoplasmic membrane, a phospholipid bilayer with membrane-spanning proteins. Gram-positive bacteria possess a thick peptidoglycan layer and then the cytoplasmic membrane. Gram-negative bacteria are more complex and different in structure, possessing an outer membrane that is chemically different from the cytoplasmic membrane, the peptidoglycan layer, a periplasmic space, and finally the cytoplasmic membrane (Paustian, 2001).

In Gram-positive bacteria, the peptidoglycan is heavily cross-linked, and wraps around the entire cell. It accounts for 50% of weight of the cell and 90% of the weight of the cell wall. It can be 20-80nm thick (Paustian 2001). The *S. aureus* cell wall contains teichoic acid, a secondary polysaccharide, that is covalently linked to muramic acid and links various layers of the peptidoglycan mesh together, suggesting structural support. About half of the teichoic acid is intertwined within the peptidoglycan, and half is exposed on the surface and forms part of the receptor for various bacteriophages. Teichoic acid contributes to the negative charge associated with the cell wall (Boyd, 1984). Several other factors are also present, such as bound coagulases (clumping factors used in conjugation), nucleases (DNase and RNase), and penicillinase, which help protect the bacterium from invasion by other organisms (*Staphylococcus Summary*, online 2000).

Gram-negative bacteria are structured more complexly than are gram-positive bacteria. They possess an outer membrane external to a thinner layer of peptidoglycan, and a periplasmic space in between the peptidoglycan and cytoplasmic membrane. The outer membrane and cytoplasmic membrane adhere to each other at several hundred zones called Bayer patches (Salton, Kim, online). These zones break up the continuity of the peptidoglycan layer, and may contribute for transport of larger molecules. The outer membrane is a lipid bilayer similar to a cell membrane containing lipids and proteins, but also includes lipopolysaccharides (LPS) on its external side. LPS is significant in membrane transport, and is an endotoxin. LPS, which includes O-antigen, a core polysaccharide, and Lipid A (the toxic component of LPS), coats the cell surface and works to exclude large hydrophobic compounds such as bile salts and antibiotics from invading the cell. This relative impermeability to

hydrophobic compounds may explain the large numbers of gram-negative bacteria, such as *E. coli*, which are present in the intestinal tract, where bile salts are continuously present (Boyd, 1984, Paustian, 2001). Included in the the outer face of the LPS are embedded transmembrane proteins porins. Porins are trimeric B-barrel proteins, which form pores and/or channels for transport of various molecules (Porins, online). This provides for migration of these molecules into the periplasmic space for transport across the cytoplasmic membrane. The peptidoglycan layer is thinner and less heavily cross-linked. It can be about 10nm thick, only 15-20% of the cell wall, and accounts for only 5-10% of the weight of the cell (Paustian, 2001). The periplasmic space contains various enzymes such as proteases and lipases, which break down many of the solutes transported across the outer membrane into small units before their final transport across the cytoplasmic membrane. It also contains proteins that function to detect the environment and transport needed nutrients into the cell. The periplasmic space can also act as an osmotic buffer zone between the cytoplasm and its external environment (Boyd, 1984).

Possessing an initial outer membrane and a thinner peptidoglycan layer suggests more permeability of large molecules, such as DNA, in *E. coli*. Additionally, the possession of porin proteins (with their channels) spanning the outer membrane, and Bayer patches which adhere the outer and inner membranes and may also form channels, could contribute in facilitating the uptake, (hence the incorporation), of DNA in the cell.

More recently, a technique involving electrical charge has been used to render cells permeable to DNA. This process is called electroporation, and utilizes a brief electrical pulse to temporarily and reversibly permeabilize a cell (Samuels, online). This leaves the cell riddled with orifices, which are large enough to allow for passage of DNA molecules (Pollack, 2001).

Another method that would render cells more receptive to DNA uptake would involve using a degradative enzyme, such as lysozyme, to remove the heavy peptidoglycan layer. Lysozyme is found in saliva and tears and breaks down cell wall components. Interestingly enough, this enzyme is an important part of mammalian defense against bacterial invasion (Paustian, 2001).

Utilizing a different divalent cation, such as Mn^{2+} or Mg^{2+} , in combination with either electroporation or lysozyme may give the desired results.

Both of these procedures, and varying the divalent cation, may be successful protocols leading to a more efficient transformation rate in induced laboratory transformation.

CONCLUSION

Induced laboratory transformation using a 5K base paired plasmid was not successful in gram-positive *S. aureus* as it was with gram-negative *E. coli*. The concerned variable is the difference in composition and structures of their cell walls, which has been reviewed. This researcher would like to conduct future experiments, perhaps using different bacteria (both gram-positive and gram-negative), and one of the additional techniques mentioned.

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The Differences and Similarities between Plato's THE REPUBLIC and Jean-Jacques Rousseau's THE SOCIAL CONTRACT

by Joanna Caccavo

The concept of the perfect state is fantastic enough to be summarily dismissed by realists yet seductive enough to have been the subject of heated debate for centuries. It is, in fact, a fundamental theme in political philosophy; although no two philosophers have the same concept of the ideal socio-political body, upon close inspection their seemingly contrasting ideas sometimes reveal common attitudes and thought patterns. Such is the case with Greek philosopher Plato (428-347 BC) and French philosopher Jean-Jacques Rousseau (1712-1778). Their political treatises on the nature of the perfect state—Plato's *The Republic* (375 BC) and Rousseau's *The Social Contract* (1762)—use different rhetorical styles and approaches to their subject matter, but despite the two millennia time gap, both works reveal similar fundamental attitudes. These similarities become apparent however, only after extended analysis of the differences.

This essay will first examine the discrepancies between the ideas presented in *The Republic* and *The Social Contract*, then focus on the similarities.

Varying Purposes

The perfect society described in Plato's *The Republic* is essentially a "utopia." The word, literally translated as "nowhere," was first coined by Thomas More in the 16th century and refers to a perfect but imaginary and impossible society. Plato, consistent with this definition, did not present his vision of the ideal state as a blueprint, but as a way of examining the idea of justice. As Socrates says to Adeimantus¹ towards the beginning of *The Republic*, "If we were to look at a community coming into existence, we might be able to see how justice and injustice originate in it" (58). Indeed, the first section of his treatise is a dialogue purely on the nature of justice, and the presentation of the ideal state is mixed in with examinations of the soul, enlightenment, and illusions, as they pertain to the idea of justice. It is not surprising, therefore, that Plato's imaginary republic is never referred to as a practical way of ordering society. It is, essentially, a rhetorical device.

Jean-Jacques Rousseau's *The Social Contract*, unlike *The Republic*, does not describe the definitive perfect state but rather addresses the problems of the states of his time and suggests qualities of an ideal state. Rousseau examines the political system in more detail than Plato does, and expresses more concern with the maintenance of the state and the balance of power within the state than its actual establishment. Rousseau's absolute statements of what a state is and should be mark a distinctly different purpose than Plato's more idealistic vision of what a state might be in a world of perfection. The earnestness of his rhetoric is as much a testament to *The Social Contract* being a response to the politics of Rousseau's time as the author's direct statement that public opinion (the "general will") is "a part of law that is unknown to our public theorists" (90 Rousseau).

¹ Although *The Republic* was written in dialogue form, with Socrates and other characters as speakers, it is highly doubtful that the treatise is simply a recording of a conversation, and thus I refer to all ideas expressed by Socrates as those of Plato.

Creating a Republic

Plato structures his republic on the principle that people are ignorant, pleasure loving, and corrupt. In his "Allegory of the Cave," a section of *The Republic*, Plato portrays people as prisoners of ignorance who mistakenly believe that shadows of people and objects are real and good. Since the populace is unaware of the benefits of civil society, state must use "persuasion or compulsion to unite all citizens and make them share together the benefits which each can individually confer on the community" (263 Plato).

Jean-Jacques Rousseau, on the other hand, establishes his republic on the idea that the populace holds the power of the state and is bound together by a "general will." The general will is the indestructible common will and desire of all the citizens of a state for the public good. This idea dismisses Plato's notion of the citizenry as an ignorant body unaware of truth and goodness. While Rousseau believed in the fallibility and corruption of individuals, he also believed in the infallibility and simple moral purity of a citizenry: "the general will is always in the right and always tends to the public welfare" (66). It is upon this idea of a general will that Rousseau bases his republic.

Leaders of the State

Plato was more interested in the guardians of his republic than in its citizens. The key to a pure and stable republic, Plato says, is the education of its "philosopher rulers." An oligarchy of these wise and virtuous philosopher kings, Plato explains, must live without luxury but be devoted to the welfare of the state, and be its watchdogs. Plato believed that this oligarchy of rulers; hand picked at childhood, raised under austere conditions, and carefully educated; could resist corruption, ignorance and selfishness. Plato's emphasis on education must be specially noted, for he believed that all societal troubles spring from ignorance, as evidenced in his "Allegory." Thus it is education that makes the guardians of his proposed republic fit to rule.

Rousseau distrusted the leaders of states as much as Plato distrusted their citizens. Unlike Plato, Rousseau believed that sovereignty lies in the people and the general will. The ruler and the government have only two purposes: to create laws and legislate, based on the decisions made by the general will. Rousseau believed, as Plato did, in the likelihood of a state's ruler(s) to become corrupt but, unlike Plato, he saw few means of preventing the corruption. In *Social Contract*, he questions the ideas that Plato based his republic on when he asks, "If the education given to royalty naturally corrupts its recipients, what is to be expected from a succession of men brought up to reign?" (Rousseau 109). The ruler and government were not so important to Rousseau as the relationship between them and the citizens of the state.

The Ruler/Government and the Citizens

As noted by Sean Sayers, author of *Plato's Republic: An Introduction*, *The Republic* contains "no framework of individual rights, and no mention even of a constitution" (33). However, Plato most likely trusted that in his perfect society there would be no need of written laws. He believed that his society could be controlled with strictly imposed morals and myths. As Socrates tells Glaucon, "we shall lay it down that older men are to have authority over all younger men" (191 Plato). This statement emphasizes Plato's basic trust in the power of age, knowledge and reason to draw respect and obedience from the ignorant masses. Specific examples of imposed regulations do not appear often in *The Republic*, probably because it is implied that properly educated rulers will naturally know what is right for the state, and that the citizens of the state will recognize the wisdom of the rulers and submit.

In contrast to Plato, Rousseau distrusted governments and rulers. The state is formed, Rousseau believed, through a "social pact" (54-56), a pact Christopher Bells in his translator's introduction interprets as "both the creation of a unified social entity consisting of a number of individuals, and their acceptance of that entity's authority over them" (xv Bells in Plato). As a result of this social pact, Rousseau maintains, sovereignty lies not in the ruler, as Plato believed it to, but in the citizen body. Thus the ruler can make no decision unless under the direction of the general will. Rousseau expected citizens of a state to monitor their government through assemblies, which Rousseau calls "a shield for the body politic and a check on the government" (125). This frequent pure expression of the general will is, Rousseau believed, the only way the civil state could be kept to the conditions of the original social contract (125).

Similarity Revealed

As different as the views of Plato and Jean-Jacques Rousseau are on the idea of the perfect state and despite the disparity of the societies in which they were raised, some common ground can be found. Though writing in two very different eras, Plato and Rousseau were both political theorists in times of change, and in fact, Rousseau did study Plato's works (109 Rousseau). The similarities between ideas expressed in *The Republic* and *The Social Contract* betray fundamental attitudes distilled from the writers' experiences.

Civil Control and Religion

Despite Rousseau's emphasis on freedom and equality in the perfect state, further inspection reveals his state to be as controlling as Plato's. Just as Plato advocates the spread of myth to bend the minds of all members of the state into obedience, Rousseau preaches an absolute submission to the general will. As he states early in *The Social Contract*, "What a man loses by the social contract is his natural freedom and an unlimited right to anything by which he is tempted and can obtain" (59). Not only may the individual not do anything he pleases, "if anyone refuses to obey the general will he will be compelled to do so by the whole body" (58 Rousseau). As to the church and its relationship to the state, both Rousseau and Plato believed that there should be no separation. Plato calls "faithless men" "perfect specimens of injustice" (336) who have no place in his republic. Rousseau, holding a similar attitude, believed that nonbelievers of the state religion are criminals, and that the state "cannot force anyone who does not believe in them [but] can banish from the state anyone who does not believe them" (166). While he doesn't suggest that religion should be used to control the people, as Plato does, Rousseau still believed in the necessity of state command over religion.

The strict civil control advocated in both *The Republic* and *The Social Contract* is not unique in the field of political philosophy. Thomas More's *Utopia* and Edward Belamy's *Looking Backwards*, which both propose perfect societies, contain similar ideas of control. Control, indeed, is the defining factor in these authors' proposed societies, for control carefully utilized has often been presumed to lead to order, the friend of all states. Plato wrote in reaction to the chaotic politics of Athens; Rousseau reacted to the political concept of the divine right of kings and to other political writers of his time. As an underlying theme, civil control is fundamental.

Eventual Decay

Plato and Rousseau, despite their enchantment with perfection, understood its fragility. As noted earlier, neither intended their republics to be blueprints, and the attitudes displayed in *The*

Republic and *The Social Contract* show decidedly negative outlooks on the fates of even the most perfect of states. Plato, fascinated with metaphysics, states that “whether a thing is natural or artificial...it is at least subject to change from outside if its condition is good” (77) and goes on to say that any change made to perfection must be a change for the worse. Though Plato does not explicitly state that his ideal civil construction must decay, he implies that even if his republic could exist, its perfection would soon disintegrate.

Rousseau, too, believed that absolute perfection, even imagined absolute perfection, could never maintain itself. While discussing state religion, he says that a state of pious Christians could not exist because “this society, with all its perfection would be neither the strongest nor the most durable of societies [...] its very perfection is a fatal defect” (164). Furthermore, he professes that “every government in the world [...] sooner or later usurps sovereign authority” (133) which, in Rousseau’s eye, means that sooner or later the “general will” will be silenced, and the state will decay into ruin.

One could explain both Plato and Rousseau’s acknowledgements of the fragility of perfection by noting that neither considered individuals very reliable or predictable. Plato disliked societies ruled by the people because in such societies “the young man’s mind is filled [...] by an invasion of pretentious fallacies and opinions” (318). Rousseau asserts that “as soon as the body politic is born [it] tends ceaselessly to its destruction, in the same way as old age and death eventually destroy the human body” (118) because of the varying interests of its citizens. This acknowledgement of human nature is also found in More’s fanciful utopia and in Belamy’s science fiction-like future society. These authors’ common acknowledgement of the fallacies of human nature spans the centuries of political philosophy.

Concluding Notes

A careful analysis and juxtaposition of Plato’s *The Republic* and Jean-Jacques Rousseau’s *The Social Contract* is imperative to the understanding and appreciation of the authors’ concepts of the perfect state. The contrast is sharp—their views of the citizenry and rulers of an ideal state, as well as the relationship between the two forces, are dramatically different—and it reflects the changes in political thought over the millennia. The similarities, however, are more surprising. The perceptions that control is necessary in a perfect state, and that even the most perfect of states is ephemeral if not impossible, are common not only to Plato and Rousseau, but also to other political writers. Together, both similarities and differences link authors who lived two thousand years apart and outline some basic concepts of political philosophy.

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The American Welfare State: Its Past, Present and Future

by Rory Doyle

There has been no greater issue in American domestic policy over the last one hundred years than the welfare state. The debate over how to support the countless number of Americans who have yet to bear the fruit of our nation's unparalleled opportunity has produced a long-standing conflict of ideological beliefs within our government. The level to which the Federal government should intervene in the state-run programs supporting welfare has been at the center of this debate. Depending on which political philosophy has been in control of the Congress and Oval Office, significantly different pieces of legislation have been written into law outlining the extent to which the Federal government may assist impoverished Americans. Liberal legislation has given the Federal government a wide role and abundance of resources to combat poverty, while more conservative reforms have limited the Federal government and given the separate states the power to administer and control their own assistance programs. Our nation has experienced periods where one philosophy was more prevalent than the other, yet both have had a tremendous effect on the successes and failures of the American welfare system.

To properly evaluate the welfare system and its level of effectiveness, both past and present, one must analyze two separate areas: the growth of the system since conception through policy and legislation, and the effect the present welfare structure has had on the individuals it is responsible for assisting. By understanding past and present incarnations of the system, one can effectively conclude that substantial efforts must be made to transfer the control of welfare back into the hands of the Federal government. There is substantial evidence to suggest that the states are ineffectively assisting the needy, leaving them with little possibility for advancement.

It is the belief of this writer that the welfare legislation of the past decade has tragically altered the system. What remains is a policy of pushing the poor into an unstable job market, while leaving them without the support and training necessary to rise out of the poverty in which they have been grounded. State governments are more concerned with welfare-to-work statistics than with the dire situation they are pushing these individuals into. In short, the recipients of state programs are being left without the "safety net" they have been provided in the past. Millions of Americans are being deserted in a social and economic position that is no greater than the one in which they began. Without significant reform, our nation will soon experience a crisis of poverty matched only by the Great Depression, and future generations of American youth will fall victim to the same vicious cycle conservative leaders believe they have prevented. more concerned with welfare-to-work statistics than with the dire situation they are pushing these individuals into. In short, the recipients of state programs are being left without the "safety net" they have been provided in the past. Millions of Americans are being deserted in a social and economic position that is no greater than the one in which they began. Without significant reform, our nation will soon experience a crisis of poverty matched only by the Great Depression, and future generations of American youth will fall victim to the same vicious cycle conservative leaders believe they have prevented.

Part I: Historical Context

To understand the growth and subsequent decline of the American welfare system, it is

necessary to focus on three important periods in its history: the birth of the system under President Franklin D. Roosevelt, the tremendous transformation of it under President Lyndon B. Johnson, and the effective demise of the system under President Bill Clinton. By analyzing each President's perspective on the welfare system, their vision for its future, and the legislation passed under each respective administration, one is able to understand the need for dramatic reform of the present system. Once the history of welfare is understood, the direction in which it is heading becomes evident.

In the late 1920s, the nation began to realize that a majority of Americans were living in horrible conditions and desperately struggling to support their families. The great American dream that had been realized by so many had escaped so many more. Just as the middle class had been shocked in the late 1890s by the photographs of slum life in Jacob Riis's book *How the Other Half Lives*, the Federal government was now aware that something was terribly wrong (Brinkley 636). Poverty had become a very real issue in America, and by the height of the Great Depression, it had turned into an epidemic. Almost 25% of the adult male work force was unemployed with no prospect of improvement in the near future. A significant and immediate response was needed from the Federal government, and that initiative came in the form of the New Deal.

During his first one hundred days in office, Franklin Roosevelt presented Congress with a wide range of programs that came to be known as the New Deal. Historian Alan Brinkley called the New Deal the "most important single piece of welfare legislation in American history" (Brinkley 875). This program was a direct response to the economic and social crisis gripping the nation. It aimed to stabilize the economy and banking system, while providing job opportunity to the unemployed. It was the personal assistance programs that became the foundation for the welfare system. It was programs like the Federal Emergency Relief Administration (FERA) and the Civil Works Administration (CWA) that introduced to the political landscape the idea of Federal responsibility for the poor. These programs provided the states with grants for what would effectively become unemployment insurance, while creating thousands of Federal jobs that would employ individuals in desperate need of work (Brinkley 881). Later, Roosevelt would sign into law legislation dealing with housing assistance, youth development, and Federal loan assistance. In 1935 he created Social Security, an assistance program to the elderly that is still highly depended on today. While these programs were relatively ineffective at the time [it is estimated that one out of five members of the work force was still unemployed two years after the programs were created (Berkowitz 13)], they helped create the foundation of the Federal welfare system that would exist for the next fifty years. It is interesting to note that while Roosevelt was a liberal and while he birthed the most liberal domestic policy America has ever seen, his view on welfare would be considered today as rather conservative. His vision focused not so much on the role of government, but more on the purpose of Federal assistance to the poor. In his budget address on January 4th, 1935, he said, "Continued dependence upon relief induces a spiritual and moral disintegration fundamentally destructive to the national fiber. To dole out relief in this way is to administer a narcotic, a subtle destroyer of the human spirit" (Davies 1).

The next significant period in welfare's history was in the 1960s, under the administration of Lyndon Johnson. His Great Society program was a significant reform of the Roosevelt system that had survived relatively intact for over two decades. In the spirit of the New Deal and the recently slain John F. Kennedy's New Frontier program, Johnson's "war on poverty" sought to expand the reach of the Federal government into aspects of poverty other than unemployment (Berkowitz 1036). He created the Medicare and Medicaid systems, in which the government would guarantee medical coverage to any American who could not otherwise afford it. He created community action programs where citizens would have an increased power and influence in the programs directly affecting their

neighborhoods. This was done by the administration under the assumption that not even the Federal government could fully understand the intricate components of an impoverished area, and who would be better equipped to solve these intricacies than the individuals living with them daily. Johnson also drastically increased funding to education and public housing and created the food stamp program. It can be said that his overall belief was that the resources of the Federal government were limitless, and that by assisting the poor in as many ways possible, you would provide them with a strong enough foundation that would enable them to escape the poverty trap for good. The number of Americans living below the established poverty line had dropped by nearly half under Johnson and his Great Society program (Brinkley 1038), so in the short term his beliefs were accurate.

The final substantial piece of legislation, that would come to end welfare as the country had known it for over fifty years, was enacted under Bill Clinton in 1996. The Personal Responsibilities and Work Opportunity Reconciliation Act (PRWORA) transferred the control over the welfare system from the Federal Government to the states independently. The act reduced the role of the Federal government to that of providing the separate states with block grants to administer their distinct assistance programs, and created the Temporary Assistance to Needy Families program which would basically oversee the distribution of Federal funds. It gave the states complete creative control over the way in which they would administer and enforce their programs. It called for strong requirements in welfare-to-work transfers, and if a state was not successfully moving their benefit recipients into the job market, the Federal government would partially cut their funding until the numbers began to improve. It allowed the states to impose their own time limits on the length an individual could receive welfare benefits, whether they found a job or not, and that limit usually was no longer than two months. Individuals would have to show proof of job searching to the states if they hoped to continue receiving benefits during the allotted time period. Those with disabilities or work-inhibiting injuries would remain protected, but the majority of recipients would have no such protection regardless of their working status. In effect, the reform ended the idea of assistance to the poor. Either you found a job and began providing for yourself, or you would be left with no support at all.

Part II: Current Situation

Five years have passed since the Personal Responsibility and Work Opportunity Reconciliation Act was signed into law, and there are both encouraging and damaging statistics beginning to surface as to the system's effectiveness so far. Before a theory can be developed as to the success or failure of the system, it is necessary to become familiar with the facts. The Department of Health and Human Services reports that from August 1996 to June 2000, the number of welfare recipients nationally has dropped from 12,241,000 to 5,781,000, a decrease of almost 53% (DHHS 1/19/01). Likewise, in the department's report to Congress in 1999, they stated that the number of working welfare recipients nationally had reached an all-time high of 33%, compared to just 11% in 1996 (DHHS 12/01/01). These statistics show a positive increase in the effectiveness of the welfare system's ability to push individuals towards self-dependency. They show that even among the groups still receiving some welfare assistance, more individuals are entering the job market and in effect moving towards a life of productivity and success.

The separate states are also showing positive figures in the way of welfare-to-work transfers. While a number of states show only modest declines in the number of welfare recipients they have overseen between August 1996 and March 1999, most show a decrease of at least 30%, while 29 states report having a drop in recipients of at least 50% during that period (Rodgers 178). The state of

Wisconsin, which has been at the forefront of welfare reform since the late 1980s with their W-2 program, reports an 81% decrease in welfare caseloads during the period from August 1996 to March 1999 (Rodgers 158-180). That is the third highest percentage in the nation, coming from a state whose W-2 program was basically the model for the PRWORA. If the statistics are proof alone that the current system's effectiveness is ending welfare dependency, then one can conclude that the PRWORA of 1996 is the greatest welfare reform in history.

But there exists a separate group of statistics that counter the ones previously mentioned. These statistics show that while a record number of recipients are being transferred from governmental assistance to self-dependency, the overall betterment of these individuals is questionable. Between 1998 and 2000, only ten states recorded a decrease of more than 1% in average poverty rates (Census 12/01/01). Only one of those states, Mississippi, posted in the top five nationally in welfare recipient decrease from August 1996 to March 2000. So while more people are being taken off of welfare and placed into employment, the national poverty levels remain unchanged. This fact alone signals that something is wrong with the welfare-to-work system, and that the "work first" policy is detrimental to the individual.

The jobs that these people are attaining are often part-time positions found at the bottom half of the job market and generally paying around the minimum wage (Rodgers 181). Former recipients are being hurried into jobs that they are either not keeping for an extended amount of time, or that are so low paying that even with their present jobs, they are no better off than when they were fully dependent on welfare. The idea that any kind of work is better than every form of welfare is fundamentally flawed. The statistics prove that instead of being provided with economic and social opportunity, many former recipients are being stripped of the little support they have, leaving them with nothing.

One reason why the states have been ineffective in transferring welfare-dependent individuals into sufficient jobs is the funding system. As stated in Part I, under the PRWORA, the Federal government provides the states with block grants to fund their individual programs. The states are required to continue spending a set percentage of their own previous funds towards welfare, and if they fail to meet the Federal requirements for welfare-to-work caseloads, then they are forced to spend even more of their own money (Rodgers 146). So, in effect, the more individuals they put into jobs, the more money they save that can be put towards other projects. It is not the intent of this writer to imply that the states are transferring former recipients into employment simply to save money. But the idea of success being measured in monetary value, rather than in helping as many impoverished individuals possible, is worthy of consideration.

Under the PRWORA, one billion dollars will be distributed over five years, beginning in 1999, to the states successfully moving the most people from welfare to employment (Rodgers 146). One billion dollars can go a long way towards building highways, buying textbooks, and paying public servants, and it could save the states the millions of dollars they would otherwise spend annually on such projects. In the current system success equals money, and to assume that this is not on the minds of the people running the programs is foolish. It is possible that a state such as Wisconsin, who posts one of the highest transfer percentages in the nation, but who has experienced little change in unemployment and poverty statistics over that same time, is conscious of their ineffectiveness in providing individuals with decent jobs. But those in charge of the system would rather see their welfare-to-work numbers stay high than take the financial hit a sudden change in policy might bring. Competition between the states for Federal funding is high, and the effect this has on the welfare recipient is undoubtedly negative.

Part III: Proposed Solutions

It is unquestionable that the current state-based welfare programs are in need of dramatic reform. There is too much evidence suggesting that the system is failing and that millions of Americans are suffering from its effects. While not enough time has passed to effectively evaluate each component's pros and cons, some reforms can already be deemed necessary, and these changes must be initiated immediately. Otherwise, our nation will soon be faced with a poverty crisis of tremendous proportion.

First, and most importantly, the Federal government must reassume the administrative power it has had in the past. The states are not equipped to handle such a complex issue as welfare alone, and they simply lack the broad resources necessary to combat a problem rooted in so many different facets of society. The potential abuses of the system that may be committed at the state level would not exist at the Federal level. Federal agencies employ the best and brightest minds our nation has to offer, and it is not that state officials lack the capability to understand or deal with such an issue, but that they may not be aware of the growing national trends a Federal worker is familiar with. While distinct in its manifestation from state to state, the root of poverty is spread across every region. It is destroying every inner-city community across this nation and only one widespread concerted effort will be effective at breaking it down.

Second, with the increase in Federal intervention must come a multi-fronted assault on poverty. Assisting the unemployed until they can find work is not the solution. Neither is finding welfare-dependent individuals a job and leaving them to fend for themselves in an unstable job market. Steps must be taken to improve public education because through education you provide an impoverished child with the intelligence, capability, and motivation to escape the cycle of poverty. You show them there is more to the world than the crime, drugs, and hopelessness they see in their neighborhood every day; you teach them that through discipline, determination, and self-confidence they can open the doors of opportunity and achieve great success. There must be a greater effort to get the drugs and guns out of the inner cities of America. You do not solve the problem by throwing every offender in prison under the Rockefeller drug laws or "Three Strikes/You're Out" policy. You must infiltrate the communities with support groups, town meetings, and counseling services, so as to build a stronger sense of community and develop personal relationships. The common individual must be given greater political power and influence into the programs directly affecting his or her community. Nobody understands the problems of a neighborhood better than the people who live with them every day. By giving them more authority in the welfare system, you not only benefit the system, but you instill within the individual a sense of purpose and accomplishment. This in turn carries over into other parts of their lives, hopefully improving their situation and thus decreasing welfare dependency.

Finally, a greater focus must be placed on finding welfare-dependent individuals good jobs. The Federal government must take steps to ensure the individual is in a position to move up the professional ladder, by their own hard work, and improve upon his or her economic status. People can no longer be pushed into dead-end positions were they remain hovering around the poverty line. A greater emphasis must be placed on the Welfare to Work Partnership created by President Clinton. Under this program, private corporations commit to hiring welfare-to-work participants, and over eight hundred companies have pledged themselves so far (Rodgers 152). This creates the opportunity for individuals to work and excel in a corporation, where the room for expansion is great and the possibility for success is even greater. The creation of similar programs would present a substantial job market to welfare recipients and undoubtedly benefit both them and the program.

America's welfare state is at a crossroads. Either reforms similar to the ones outlined in the previous section are enacted soon, or the welfare system collapses and the country is left with a poverty epidemic like nothing seen since the Great Depression. The reason why the current state-based welfare system has produced some positive results is that, for the most part, the past five years have been a period of record economic expansion. The booming economy has produced thousands of new jobs, leaving the states with a huge market to transfer welfare recipients into. But as the current Recession begins to affect a greater portion of the job market, many of these positions filled by former welfare recipients will disappear, leaving them with no support from either the Federal government or the individual states. Unemployment numbers should start rising, and a large portion of those newly unemployed will be people who, theoretically, were jobless just months ago.

Poverty is a problem with no easy solution. While extremely important, the welfare system is only one part of a greater answer. Numerous actions must be taken in many different areas if America's lower class is ever to rise out of the depths of impoverishment, and significant reforms must be reached in both Federal and State government to make these actions effective. Without them there is no solution, and without a solution the American dream will never truly be a reality.

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Stress: The Root of All Evil

Identifying and Managing Stress in Your Life

by Kellie Yaskanich

Stress, once dubbed the “epidemic of the ‘80’s,” by *Time* magazine (June, 1983), is now believed to play an adverse role in the lives of as many as forty-three percent of all adults. Seventy-five to ninety percent of all visits to primary care physicians are for stress-related complaints or disorders. It has also been linked to all of the leading causes of death including heart disease, cancer, lung ailments, accidents, cirrhosis, and suicide. On average, nearly one million workers are absent on any given workday due to stress related complaints and it is believed to cost industry more than 225 million lost workdays annually (American Institute of Stress (AIS), 2001).

As defined by the “father of the modern stress theory,” Hans Seyle (1974), stress is the non-specific response of the body to any demand made on it. The source of stress may be internal thoughts and emotions, or external environmental factors. Everything has some effect on the body: good, bad, acute, chronic, severe or minimal (Huffman, et. al., 2000). A basic understanding of what stress is, its physiological and psychological symptoms, its general causes, and ways to recognize them are all instrumental to finding effective methods of stress-management. Learning how to cope with this potentially detrimental and everyday element of life can lead to a healthier and longer life.

Seyle made the distinction between positive forms of stress (eustress), negative forms (distress), excess stress (hyperstress), and inadequate levels of stress (hypostress). Stress in the right quantities and of the right kind promotes motivation in an individual, encouraging success while helping to prevent boredom from a lack of stimuli. In short, it is good for us. Distress, on the other hand, can be extremely detrimental to all aspects of human well being including the behavioral and cognitive processes of the mind; it disrupts the body’s steady state of normal functioning—homeostasis. In general, when speaking of stress, it is distress, that is most commonly being referenced (Huffman, et. al., 2000, and Manning, et. al., 1999).

In 1936, Seyle identified the generalized physiological reaction, which results from exposure to extreme stressors, as the General Adaptation Syndrome (GAS). The GAS is broken down into three stages: the alarm reaction, the stage of resistance, and the stage of exhaustion (Huffman, et. al., 2000, and Manning, et. al., 1999).

In the first stage, the alarm reaction, temperature, blood pressure, blood fluid and potassium levels are initially decreased. The body then enters an aroused physiological state to help cope with the stressor, releasing powerful hormones called catecholamines, specifically adrenaline and noradrenaline. Sporadic heart-rate surges and elevated blood sugar levels generally accompany this state. It also causes a rerouting of the blood from the digestive organs to both the skeletal muscles and the brain, quickened blood clotting, increased rate of breathing, and a release of pain-killing endorphins and hormones. These allow for increased visual and auditory sensitivity. Prolonged endurance of this stage can cause sickness or even death, or in the case of less severe stressors, it can lead to the second stage of the GAS (Huffman, et. al., 2000, and Manning, et. al., 1999).

Decreased sexual desire, persistent tiredness, and tightness of the neck and shoulder muscles physiologically characterize this next stage, the resistance stage. The behavioral symptoms may include tardiness, missed deadlines, excess smoking, eating and sleeping, as well as increased caffeine and alcohol or drug consumption. Psychological characteristics such as procrastination, resentment, loneliness, a lost sense of humor, a cynical or indifferent attitude, and a sense of constant

worrying are common. When the natural resources of the body are exhausted, the final stage of the General Adaptation Syndrome, the exhaustion stage, begins (Huffman, et. al., 2000, and Manning, et. al., 1999).

The stage of exhaustion, formally referred to as a breakdown, is now commonly known as burnout. Chronic sadness or depression, mental fatigue, a sense of hopelessness, and an overall desire to "quit" are common characteristics. The ability to make decisions, even minor ones, is often difficult and withdrawal from friends, family, and life routines is common. (Huffman, et. al., 2000, and Manning, et. al., 1999).

At this stage, it is not uncommon for the sufferer to experience chronic headaches, physical fatigue, and stomach or bowel problems. By now the immune system is considerably weakened and the breakdown of tissues increases the chance of an infection occurring. Continual strain on the heart and the blood vessels resulting from the body's continuous state of excitement eventually takes its toll and heart disease is a common result. The weakening of the body's natural immune system increases the body's susceptibility to colds, flues, infections and other diseases. When the body's resources for combating stressors are depleted, sickness and/or death becomes possible (Huffman, et. al., 2000, and Manning, et. al., 1999).

Walter Cannon's fight-or-flight syndrome illustrates this destructive process. Any threat to the body or the psyche of the individual triggers the activation of a subcortical component of the brain, the hypothalamus. It, in turn, activates both the endocrine system and sympathetic component of the autonomic nervous system (Huffman, et. al., 2000, and Manning, et. al., 1999).

Within the endocrine system, the pituitary gland releases adrenocorticotrophic hormone (ACTH) into the blood stream. This stimulates the outer layer, or cortex, of the adrenal gland to produce large quantities of neurotransmitters called glucocorticoids, which include cortisol, a chemical known to raise blood sugar levels and quicken the body's metabolism rate. Corticosteroid hormones, released in this process, increase the energy available and prevent inflammation of body tissue (Huffman, et. al., 2000, and Manning, et. al., 1999).

Simultaneously, neurotransmitters within the sympathetic nervous system activate the medulla, near the brain stem, resulting in the release of adrenaline (epinephrine) into the bloodstream. A release of catecholamine hormones allows the body to prepare mobilization. Glucose levels are increased to fuel muscle and nervous system activities. Noradrenaline (norepinephrine) increases heart rate and blood pressure.

Altogether, however, it takes only seconds for the body to reach optimum preparation for fight-or-flight (Huffman, et. al., 2000, and Manning, et. al., 1999).

While this natural defense system is believed to have been extremely beneficial to our ancestors for survival, it plays no real role in today's modern society. The human body has yet to adapt to our contemporary behavioral routines—it is not often that we are attacked by a fierce lion or neighboring tribe on the way to work each day. We seldom need to escape from or battle with predators for survival. Instead, our "battles" are often fought on the freeway or the checkout line at the grocery store (Huffman, et. al., 2000).

The physical enhancements that accompany the sympathetic response to stress are futile in combating modern stressors. The traditional outlet for this mounting energy is not realistic today, and therefore the energy is instead stored. The level of metabolites in the bloodstream increases and internal organs undergo harmful deterioration. The heightened stress level begins to take its toll and heart attacks, strokes, ulcerative colitis and other serious health concerns are common aftereffects.

In extreme cases, stress has been linked to disorders such as depression, post-traumatic stress disorder, hypertension, cardiac disease, increased cancer susceptibility, and even schizophrenia. In the case of schizophrenia, however, it is more of an enabling factor than it is a root cause.

Fortunately, most stress does not lead to such severe abnormalities. In the case of depression and post-traumatic stress disorder, an overall sense of learned helplessness dominates the psyche, preventing the individual from conquering the source(s) of their stress. The body weakens and becomes an easy victim for many viruses and diseases, including cancer cells. In this condition, the body is unable to defend itself. (Huffman, et. al., 2000, and Manning, et. al., 1999).

Hypertension is a common cardiovascular disorder characterized by excessive muscular tension and chronically elevated blood pressure. Essential hypertension, being the most common form of hypertension, appears to have no medical basis for the condition (Manning, et. al., 1999). Hypertension and heart disease now account for more than half of all deaths in the nation. They are not only two of the most common, but also the deadliest of all stress-related disorders. Although modern medicine has helped to reduce the threats imposed by many diseases such as tuberculosis and pneumonia, the fast-paced lifestyle of the twenty-first century is a breeding ground for stress-related disorders. Its far-reaching tentacles have become the nation's number one killer (Corbin, et. al., 2001).

When faced with a stressor (any stimulus which causes stress), which causes emotions of fear, anger, or anxiety, the hypothalamus activates the sympathetic nervous system; this results in the transmission of biochemical impulses which constrict the arteries. The resulting blood pressure elevation is sustained for as long as the threat is present.

People with essential hypertension tend to exaggerate stressful situations and hence, suffer prolonged blood pressure increases, making them a strong candidate for stroke. Aneurysms result when the extra pressure in the cerebral blood vessels causes weakened or clogged vessels to burst. The probability of suffering a heart attack increases in hypertensive people. High blood pressure forces the heart to work harder and accelerated wear and tear on the organ is inevitable. Combined with smoking, high cholesterol, obesity, or diabetes, the risks magnify. Prolonged hypertension can cause driving surges of blood with the potential to damage the inner linings of the arteries. When the lining is roughened, fats are deposited, narrowing the inner diameter of the blood vessels, forcing the heart to pump the same amount of blood through a smaller opening. Thus, the amount of pressure needed to pump the blood through increases (Manning, et. al., 1999).

Coronary heart disease has also been positively correlated with high blood pressure and, contrary to popular belief, can develop early in life (Manning, et. al.)

Modern behavioral and cognitive practices also help to stack the deck against us. Today's fast-paced lifestyles place greater demands upon us than in times of yesteryear, and therefore, poor nutritional habits have become the norm and sleep habits are often inadequate. These secondary factors contribute the body's inability to cope with demands made on it. Consequently, a "catch-22" cycle initiates: poor nutrition and sleep deprivation prevent homeostasis and decreases immune system efficiency. This, in turn, hinders the ability to cope with tomorrow's stressors. These stressors, combined with new ones, continue to take their toll and nutritional habits deteriorate and sleep becomes impossible, again effecting coping ability. This perpetual cycle is difficult to overcome. If not addressed, the wear and tear on the body eventually results in organ failure (Corbin, et. al. 2001).

To compound this problem, some individuals are inherently prone to higher stress levels through genetic factors. For many others, a fast-paced lifestyle manifests the many detriments. Certain human behavioral characteristics have been specifically attributed to promoting higher stress levels. The Type A personality, which has been linked to higher levels, possesses qualities such as intense ambition, competition, drive, constant preoccupation with responsibilities, great time urgency, and a cynical, hostile outlook (Friedman and Rosenman, 1959 in Huffman, et. al., 2000). Specific characteristics of the Type A personality: hostility, anger, and vigorous speech, are the most damaging and lead to a heightened reaction of the sympathetic nervous system, increased stress

levels, and greater susceptibility to coronary heart disease. Many researchers believe that aggression results from both environmental factors and genetic predisposition; leaving individuals little choice but to find effective ways of management (Huffman, et. al., 1999)

In the fast-paced world of today, stress is unfortunately as much a part of everyday life as coffee in the morning; it is an intricate part of life changes, long-term circumstances, daily hassles, frustrations, and conflicts. Events that are stressful to some, however, may not pose the same threat to others. Whether a person perceives the specific event(s) as positive, threatening, or irrelevant, determines the level of stress inflicted (Lazarus and Folkman, 1984 in Huffman, et. al., 2000).

For example, if Christie, who is 16 years old and lives home with her parents, free of financial burdens, loses her job as a grocery store clerk, the stress caused from that loss may not be as great as if Karen, who is 32, unmarried with two children, loses hers.

Life changes are generally the most traumatic of the stressors and can again be positive or negative. Examples of significant life changes include: rape and childhood abuse, death of a loved one, starting a new job, moving, becoming a parent, marriage, work schedule shift, or learning of a terminal or permanent illness (Huffman, et. al., 2000). Many of the victims of the recent World Trade Center attack have undergone several severe life changes since September 11. In short, life changes are events that disrupt the routine flow of our daily lives, both large and small.

In the late 1960's psychological researchers Thomas Holmes and Richard Rahe developed the Social Readjustment Rating Scale (SRRS) to aid in rating these life changes on the severity of their impact (Huffman, et. al., 2000).

Chronic stressors, endured over an extended period, may not initially appear to be an immediate threat. The impact of these types of stressors intensifies the longer that they are endured. These might include enduring a chronic or terminal illness, involvement in a bad marriage, holding a meaningless or monotonous job, or even exposure to a loud and chaotic environment such as a construction site or assembly line. Often times, the pressures of work-related stress play adversely on personal relations, in turn, causing unwarranted tension at home and inevitably more stress (Doby and Caplan, 1995; Piorkowske and Stark, 1985 in Huffman, et. al., 2000).

Hassles are the little things. Individually, they are minute and insignificant in themselves—necessary, but inconvenient. Some examples of hassles are the morning commute, laundry day, or vacuuming. Effective planning and proper time-management help to reduce the amount of stress suffered from these everyday bothers (Huffman, et. al., 2000, and Manning, et. al., 1999).

Frustration occurs when the desire to achieve a specific goal is blocked beyond immediate control. It creates an unpleasant state of tension, anxiety, and heightened sympathetic activity within the autonomic nervous system (ANS). Frustration can result from an admission rejection to your college of choice, a concert sell-out before getting your tickets, or a traffic jam that causes you to be late for an appointment. Frustrations are specific to personal motivations and are caused by the inability to achieve that goal (Huffman, et. al., 2000, and Manning, et. al., 1999).

Conflicts occur when a choice is present which causes a negative emotional state resulting from an inability to choose. Conflicts come in three basic varieties: approach-approach, avoidance-avoidance, and approach-avoidance. Approach-approach conflicts occur when both choices are favorable, both having benefits, or comparable outcomes. This type of conflict produces the least amount of stress of the three. Avoidance-avoidance conflicts occur when a choice must be made and the outcome of either choice is undesirable. Cancer patients who are given the choice between certain death and the limited hopes of chemotherapy are faced with this type of decision. Approach-avoidance conflicts are those in which the choice made will lead to both positive and negative effects and the chooser is left to evaluate the pros and cons of each. These types of choices are easier to analyze than avoidance-avoidance conflicts and generally produce only moderate levels of stress (Huffman, et. al., 2000, and Manning, et. al., 1999).

Having identified all of the possible sources and scenarios of stress, it becomes easy to see why it had been dubbed an epidemic; it is everywhere and inescapable. Stress doesn't have to dominate your life though. Fortunately, researchers have developed many methods to manage and minimize the destructive capabilities of stress. Successful stress management depends greatly upon an individual's belief system, social supports, environment, routines, and overall sense of well-being and physical health. It is also dependent upon the specific stressor(s) involved, the degree of severity, and any correlation with or proximity to other stressors. In general, two basic types of coping skills are employed depending upon the conditions: *emotion-focused forms of coping* and *problem-focused forms of coping* (Huffman, et. al., 2000).

Emotion-focused forms of coping are those in which the methods used rely on altering one's perception of the stressful event. Psychological defense mechanisms such as rationalization and denial are common examples of emotion-focused coping. Problem-focused forms of coping, on the other hand, use problem-solving techniques designed to either decrease or eliminate the source of stress. These techniques involve identifying the stressor, generating possible solutions, choosing the correct one, and then applying the solution, thereby eliminating the stressor (Huffman, et. al., 2000).

Unnecessary arterial buildup can be minimized by learning to control the autonomic system's reaction to stressful events. Effective stress-reducing techniques often include some form of physical exercise to help use up the unwanted fatty tissue stored in the arteries, increase blood flow, and increase oxygen uptake. Other forms of stress management, like problem-solving techniques, mediation, or anything else that lessens the likelihood of overreaction to a stressor, help to limit the impact on health and the body (Corbin, et. al). For a long and healthy life then, it is essential to develop adequate coping skills to help limit the adverse environmental effects that inhibit us mentally, emotionally, and physically (Huffman, et. al., 2000, and Manning, et. al., 1999).

According to Dr. Dennis Waxman, of the Liberty Professional Plaza, high stress levels consume great quantities of Vitamin B from the body's reserve. Therefore, a diet that is high in Vitamin B, yet otherwise balanced, will help to defeat some of the negative effects of stress, like fatigue. This, combined with adequate sleep and regular exercise, keeps the immune system functioning at high capacity.

Exercise has proven to release natural biological painkillers called endorphins into the bloodstream. It improves the cardiovascular and coronary systems allowing for increased blood flow, and therefore oxygen and nutrients to the brain. This energizes the thought process for productive solution-orientated brainstorming while, at the same time, dulling the emotional and physical pains imposed by the stressor(s) (Corbin, et. al., 2001).

Other key elements to successful stress-management include: an optimistic frame of mind, an accurate perception of the events involved and their inevitable impact, a prioritization of values, and a dependable social support-network (Manning, et. al., 1999). When life's little annoyances are beyond control, stressing over them becomes a futile act. St. Francis of Assisi once asked, "Give me the serenity to accept what cannot be changed, courage to change what should be changed, and the wisdom to distinguish one from the other." (Benjamin, G. as cited in Manning, et. al., 1999). Defense mechanisms, such as denial, can be a hindrance to this belief; therefore, an accurate perception of events is crucial to success. (Huffman, et. al., 2000) On the other extreme, those who are highly critical of themselves and others often suffer low-self esteem and depression because unmet expectations promote disappointment, anger, and frustration. Man has proven capable of handling as many as four primary tasks comfortably. Prioritizing values and limiting the number of major commitments to three, leaving one opening for any unexpected emergencies, dramatically reduces the likelihood of stress-related 'burnout' (Manning, et. al., 1999).

The Greek philosopher Aristotle once wrote, "Moderation, moderation, everything in moderation." (Aristotle as cited in Manning, et. al.) Moderation means to avoid the extremes in life

and to seek balance in all of life's functions. If, however, it is not possible to cut back on current obligations, the delegation of some of the responsibilities may be a feasible solution, which possesses many benefits within itself. A strong social support network consisting of friends, families, coworkers, therapists, counselors, and/or support groups, is also invaluable in handling stress. It has also been well-documented, as the science of psychology can attest, that talking problems out with a trusted someone can alleviate many of the psychological and physiological detriments of stress. (Manning, et. al., 1999)

Other techniques for reducing or eliminating stress come from the beauty of living itself. Stop and enjoy the little things in life; take notice of everyone and everything that you encounter. Help others. Helping others is a natural way to "de-stress." Take up a hobby. A hobby allows for a mental break from the harshness of stressors; it allows for a time of solitude and regrouping. If the hobby is a physically active one, it also helps to achieve physical fitness, improved cardiovascular fitness, and the release of endorphins and other neurotransmitters to aid in combating an imposing stressor. The "decompression chamber" is a coping technique that uses any routine, specific to the individual, to make the daily transitions from home to work and work to home to prevent the intermingling of the two environments. This transitional period might be in the form of a specific activity or may involve a special place; whatever it consists of, it should allow for a reflection of past events and for preparation of future ones. It helps to focus on the positive aspects of life (Manning, et. al., 1999).

These techniques work best to reduce or eliminate stress when applied in conjunction with one another. No one technique alone is effective in all situations. By correctly identifying the specific causes and the resulting effects of a stressor, the appropriate coping skills can be effectively applied and the healing process begun (Corbin, et. al., 2001).

When improperly managed, stress can lead to a number of physical and mental disorders, many of which are potentially fatal. Effective stress-management skills offer the best defense known to protect against its unyielding wrath. So, be a statistic—be part of that forty-three percent of Americans suffering from the aftermath of daily wear and tear—or apply the techniques shown here and take control of your life. Seyle offers this advice:

True age depends largely on the rate of wear and tear, on the speed of self-consumption; for life is essentially a process which gradually spends the given amount of adaptation energy that we inherited from our parents. Vitality is like a special kind of bank account which you can use up by withdrawals but cannot increase by deposits. Your only control over this most precious fortune is the rate at which you make your withdrawals. The solution is evidently not to stop withdrawing, for this would mean death. Nor is it to withdraw just enough for survival, for this would permit only a vegetative life, worse than death. The intelligent thing to do is to withdraw and expend generously, but never wastefully for worthless efforts. (Manning, et al., p.12)

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Challenging Identities in the World of Drama

by Lori Tse

One way to examine human nature on a much deeper level is through literature. Of all the different genres available, dramatic literature is composed specifically for live audiences with the intent to represent or challenge a particular society with its political, social, and aesthetic attitudes. The theater as a mode of cultural tradition and community provides an environment that is conducive to critiquing and reflecting upon social attitudes. It is through dramatic literature that early and postmodern dramatists such as Susan Glaspell, August Wilson, and David Henry Hwang collectively challenge traditional notions of gender and cultural identity as objects already predetermined and suggest through their plays that these ideas are fictional constructs determined by society at that time.

Susan Glaspell examines the traditional roles of women during the beginning of the 20th Century in *Trifles* and challenges the concept of gender identity and perceived truth by implying that they are merely social constructs determined within a male dominated society. Written in 1916, Glaspell critiques the relationship between truth, power, and gender. The title of the play is most fitting as Glaspell reveals how it is often the “trifles” of a women’s world that are regarded as insignificant and unimportant to men as they view these qualities as inferior and feminine. This becomes increasingly evident as the female characters in the play remain in the kitchen and are often ridiculed for their keen observations while the men search the rest of the farmhouse for any important clues. Ironically, it is the women who eventually discover the truth amidst all their “trifle” worrying. In this way, the women ultimately end up with the power as they knowingly conceal the evidence from the men in order to protect their female counterpart, Minnie Foster.

By giving the women the upper hand, *Trifles* seeks to subvert our notions of reality and truth in relation to gender. A woman playwright ahead of her time, Susan Glaspell founded the Provincetown Playhouse along with her husband, George “Jig” Cram Cook, where she wrote many of the plays produced there. Both desired a type of theater that would deal with existing contemporary issues in a more realistic fashion than had previously been attempted in American theater. After Glaspell’s play *Trifles* was first presented, it held the promise of a new and innovative approach used in drama that would soon become recognized throughout the theater district in New York (Kennedy 2). Instead of producing plays that were largely commercial, American theater began producing worthwhile plays written by playwrights who treated contemporary ideas and lifestyle in way that was clearly more realistic.

Glaspell’s revolutionary ideas become apparent through the roles of Mrs. Peters, Mrs. Hale, and even Minnie Foster. After discovering the gruesome truths that ultimately lead to the murder of John Wright, Mrs. Hale solemnly states, “I know how things can be-for women. I tell you, it’s queer, Mrs. Peters. We live close together and we live far apart. We all go through the same things-it’s all just a different kind of the same thing” (953). This comment reveals the truth associated with the feelings of hopelessness and despair that existed among women in a patriarchal society. Unfortunately, the recognition of this fact comes too late for Minnie Foster as her character eventually resorts to murder. She literally chokes the life out of her husband in response to his constant efforts at choking her off from everything that brought her any enjoyment in life. Although the conflict is never openly resolved, because readers are only left with the two women, Mrs. Hale and Mrs. Peters secretly conspiring with each other, *Trifles* still becomes an important play in the development of American realism. Glaspell’s play is based on the realistic elements of women

coming together in order to support their female equivalent during a time of crisis. This final act of resistance reveals Glaspell's attempt to critique the created realism of the patriarchy and the male theater. After *Trifles*, realism soon becomes the dominant mode of theater. In this regards, Glaspell paves the way for future playwrights such as August Wilson whose plays embody realistic techniques as he critiques similar issues that become even more complex in a later society.

August Wilson questions issues of both cultural and gender identities several decades later in his play *Fences*. Although written in 1985, the play is set in 1957 and depicts the challenges that African-Americans faced prior to the civil rights movement. The historical context surrounding that era included the great migration of descendants of African slaves from down south to northern cities in search of a better life for themselves and their families.

In a period of twenty years, from 1910-1930, approximately one and a half million African Americans left the rural and urban areas of the South in search for better opportunities in the industrial cities of the North, such as New York, Chicago, Philadelphia, Detroit, and the city where the play's setting takes place, Pittsburgh. In his article entitled "Saying Goodbye to the past: Self-Empowerment and History," Douglas Anderson eloquently sums up two decades of transition for the African American. He writes,

The migrants left racial violence, segregation, and disfranchisements in the South. They also left a Southern economy hurt by a boll weevil invasion that reduced cotton yields, low cotton prices, and a pattern of Northern investment that turned the South into a dependent colony with a shrinking labor market. They were drawn to the North by the promise of higher wages and, after 1916, by the employment possibilities created when World War I stopped the flow of European immigrant labor. In leaving for the industrialized cities of the North, the migrants hoped to find not only higher wages but also economic and political equality, educational opportunities, and social justice (Anderson 2).

Unfortunately, this promise of a better future would never be realized in the North. Instead of finding their hopes and dreams come true, the migrants suddenly found themselves living another real life nightmare. Wilson describes this predicament in the introduction of his play when he speaks of the receptiveness towards European immigrants compared with descendants of African slaves. Unlike the immigrants of Europe whose dreams and hopes eventually became realized, African Americans were once again left out of the equation. Wilson describes the paradoxical effects of this journey north when he states, "They came strong, eager, searching. The city rejected them and they fled and settled along the riverbanks and under bridges in shallow, ramshackle houses made of sticks and tar-paper" (1036). This information included in Wilson's opening statement reveals just one aspect of the inequitable treatment forced upon Blacks once they migrated north. Instead of finding success, their future looked bleak and dismal compared to the immigrants arriving from Europe. What they found instead was discrimination, jobs that no one else wanted, segregation, and substandard housing and education. According to James Grossman in *Land of Hope: Chicago, Black Southerners, and the Great Migration*, "The dreams embodied in the Great Migration eventually collapsed under the weight of continued racial oppression and the failure of industrial capitalism to distribute its prosperity as broadly as the migrant's expected." Weighed down once again by racial discrimination and oppression, the migrants' future began to lack the zeal and optimism it once had at the onset of their journey. The African American dream was once again denied.

Men like Wilson's protagonist, Troy Maxson, were literally "fenced" in from any type of progress during that time. As a Black man, Troy's life consists of family responsibilities, constant poverty, and a dead end job collecting other people's trash. Unfortunately, time is not on Troy's side as he was a promising athlete who played in the Negro Leagues in 1947 before the color barrier was

broken, and baseball became integrated. In many ways, Troy's embittered feelings relating to his past and present situation contribute immensely towards his overwhelming desire to satisfy his needs by having an affair with Alberta. He defends his actions to Rose by stating, "I can step out of the house and get away from the pressures and problems...be a different man. I ain't got to wonder how I'm gonna pay the bills or get the roof fixed. I can just be a part of myself that I ain't never been" (1053). To Troy, this was his way of rejecting society's notions of cultural identity by stepping outside of his own "fence."

Troy's deliberate attempt to challenge his own cultural or racial identity is clearly more pronounced throughout the play than Rose's less subtler stance on issues relating to gender. Besides being the typical stand-by-your-man woman, Rose possesses great insight and inner strength that seems to refute any notions of her being weak or inferior. This becomes evident when she tells Troy, "I gave eighteen years of my life to stand in the same spot with you. Don't you think I ever wanted other things? Don't you think I had dreams and hopes? What about my life? What about me? Don't you think it ever crossed my mind to want to know other men?" (1053). Despite being hurt and angry over her husband's unfaithfulness, Rose's resolve to stay with Troy and raise his new baby daughter, Raynell, are fine examples of her character being fenced in by her gender.

Through the character of Rose, Wilson implies that notions of gender are often fabricated by society. This becomes clearly evident when Rose suggests to Cory that his father and her marriage, whether right or wrong, was just a product of the times. Doubly oppressed because of gender and race, she announces, "I married your daddy and settled down to cooking his supper and keeping clean sheets on the bed. When your daddy walked through the house he was so big he filled it up. That was my first mistake. Not to make him leave some room for me" (1059). Unfortunately, these were the roles that society dictated at that time for women in general. All other opportunities were severely limited to her gender. She makes this point when she says, "It was my life and I didn't have to live it like that. But that's what life offered me in the way of being a woman and I took it. I grabbed it with both hands" (1061). Rose's identity was clearly mapped out for her as a young woman of color. Realizing this fact at an early age, Rose simply grabbed onto Troy as if her life depended on it, and made the best of her situation by being a good wife and mother. Hence, it can be seen how family responsibilities contributed immensely towards her being further fenced in by gender.

Wilson continues to extend this critique of gender in his play through the characterization of Troy. Traditionally, as the man of the family, Troy is expected to be the breadwinner and sole provider. Perhaps he learned this from an early age from life in the Deep South when he states, "My daddy ain't had them walking blues! What you talking about? He stayed right there with his family" (1048). Although Troy's father was "as evil as could be," he always provided for his family. This surely impacted Troy as a young child, and this same mentality is revealed later in the play when Troy implores Rose to forgive him for his past infidelities in order to help raise his newborn infant who is now motherless. After singing a gentle lullaby to his daughter he solemnly pleads, "She's my daughter, Rose. My own flesh and blood. I can't deny her no more than I can deny them boys" (1055). He takes his responsibility seriously, and in the process Troy becomes fenced in even further by this newest addition as his family responsibilities continue to grow.

Issues of being fenced in by one's identity continue to be explored on an international level by postmodern playwright David Henry Hwang in *M. Butterfly*. Written in 1988, *M. Butterfly* is a brilliant critique of Western attitudes towards the feminization of Eastern culture. Through appropriation, Hwang seeks to reveal the disastrous effects that can result from Western stereotyping of Eastern countries as depicted in Puccini's 1904 opera, *Madame Butterfly*. This beloved opera is a key component in *M. Butterfly* as it reflects the central character, Gallimard's fantasy notions of Eastern women. Set in a Paris prison cell, the play takes place recalling the decade 1960-1970 in

Beijing, and from 1966 to the present in Paris. Although Gallimard's character is from the West, he is a weak individual who desires to someday have his own symbolic *butterfly* to control and dominate. However, the tables turn when it is actually Gallimard who ends up being controlled by Song Liling when their predetermined roles are suddenly reversed. Ironically, this is foreshadowed in the beginning of the play when Song comments, "I will never do Butterfly again, Monsieur Gallimard" (1066). To Song, the unfavorable role of butterfly inaccurately portrays the East as frail and submissive when compared to the West.

Realizing that this is a love story only from a Western man's perspective, Song uses this knowledge to her advantage as she manipulates the situation as only an actor can do. After all, she is a theatrical performer who is specifically trained to temporarily assume the actions or lifestyle of another. Thus, Song's pretense of being the submissive oriental woman in her relationship with Gallimard is clearly an act performed to create a position of power. Being a man himself, Song recognizes the importance of this representation when she states, "Only a man knows how a woman is supposed to act" (1077). This ultimately gives him the upper hand in his deceptions towards Gallimard, which contributed greatly towards its success. Additionally, this comment solidifies Hwang's belief that one's identity is often socially constructed within a patriarchal society.

Identity as a social construct becomes more evident when Gallimard requests that Song undress for him. This request exemplifies Gallimard's strong desire to completely dominate Song as she is placed in this most vulnerable state. His reasoning is "-that it will remove the only barrier left between us" (1076). However, by exposing herself in this way, Song runs the risk of exposing her maleness. Ironically she agrees and says, "Well, come strip me. Whatever happens, know that you have willed it. Our love, in your hands. I'm helpless before my man" (1076). Her willingness to strip may have been just another ploy she uses against Gallimard by reinforcing his own beliefs of power. Once Song reveals that she is pregnant with his child, Gallimard forgets his request and joyously announces, "I want to marry you!" (1076). By not pressing the matter, Gallimard reasons that perhaps deep inside he already knew that Song was indeed a man. He claims "Happiness is so rare that our mind can turn somersaults to protect it" (1076). Thus, Gallimard's willingness to protect his fantasy notions of *butterfly* essentially allows his mind to continue playing tricks when it suddenly becomes apparent that he was very close to losing this fictional identity written exclusively by men living in a Western society.

Hwang's notions of identity are further dramatized when Song enlightens the audience during the courtroom scene. She reveals two rules when it comes to understanding Western culture. The first one is, "Men always believe what they want to hear. So a girl can tell the most obnoxious lies and the guys will believe them every time..." (1081). Rule number two states, "As soon as a Western man comes into contact with the East-he's already confused. The West has sort of an international rape mentality towards the East" (1081). This rape mentality is clearly seen in stories such as *Madame Butterfly* where the East is viewed as weak and inferior. By viewing a country as such, the power to dominate and control becomes necessary to the countries that view themselves as masculine as they penetrate their own ideas and beliefs upon a Western perceived submissive colony or country. Song nicely sums up this type of aggressive thinking when she says, "...I am an Oriental. And being an Oriental, I could never be completely a man" (1081). To Gallimard, Song was simply a fantasy stereotype who would always be inferior to his Western ways.

By being Oriental, Song was provided with an identity fictionalized by Western society that leads to her becoming Gallimard's fantasy stereotype in the first place. In essence, this was the one of the main reasons contributing towards Gallimard having an intimate relationship for 20 years with a man whom he believed to be a woman all along. It may also have been Gallimard's fantasy to be the butterfly himself when he says during the last scene,

Yes-love. Why not admit it all? That was my undoing, wasn't it? Love warped my judgment, blinded my eyes, rearranged the very lines on my face...until I could look in the mirror and see nothing but...a woman.

Consequently, the roles become openly reversed when Gallimard adorned with make-up, wig, and kimono, announces to the world that, "My name is Rene Gallimard-also known as Madame Butterfly" (1084). Tragically, he takes his life while music from the "Love Duet" plays loudly in the background. In this way, Hwang frees his characters, Gallimard and Song Liling, from the traditional stereotypes that society ultimately created for them by intentionally reversing the roles of the dominant West. His reversal thus indicates a form of resistance against society's role in fictionalizing notions of one's own cultural identity. East is suddenly placed in the dominant position when the Westerner, Gallimard, kills himself while Song stands over him dressed as a man. Gallimard's death symbolizes the sad ending to a great Western love story.

Although these plays are written within a span of 72 years, all three playwrights artistically challenge issues relating to the social construction of one's identity. Glaspell and Wilson use similar techniques as they both employ aspects of realism that challenge society's views on gender. In addition to gender, Wilson also incorporates crucial issues pertaining to time and history as he reveals the *fenced in* effect that such elements produce. Hwang, on the other hand, uses postmodern devices as he delves deeper into exploring cultural identity by exposing Western stereotyping, and the exploitation of Eastern countries. All three plays successfully question various aspects of identity through the lives of realistic characters in such a way that is not only entertaining, but most importantly serves as a critique of Western ideology.

All three authors recognize society's function in predetermining the individual roles of its members for the sake of maintaining order. By assigning roles or identities, a system or hierarchy is thus created with the main objective of preventing disorder. This is what philosopher and theorist, Michel Foucault describes in his text Discipline & Punish: The Birth of the Prison as a power knowledge network. This power knowledge network is a system whose main objective is to normalize its citizens. One way this is accomplished is through the utilization of a gaze surveillance. This gaze network neutralizes resistance by creating a society of surveillance. The idea of constant surveillance functions within a larger society to penetrate ideologies that define a person's identity into the mindset of individuals. Foucault states, "The individual is no doubt the fictitious atom of an 'ideological' representation of society; but he is also a reality fabricated by this specific technology of power that I have called 'discipline'" (194). Fiction suddenly becomes translated into a reality, which works to conform the individual through discipline that remains unnoticed and unseen by those who succumb to this fabricated reality. This suggests that identities are not purely innate, but rather they are merely the fictitious results of ideologies that are constructed and represented through society at any specific time period. Foucault recognizes the negative aspects of this power and knowledge network when he concludes, "We must cease once and for all to describe the effects of power in negative terms: it 'excludes', it 'represses', it 'censors', it 'abstracts', it 'masks', it 'conceals'. In fact, power produces; it produces reality; it produces domains of objects and rituals of truth" (194). Notions of identity are contrived and shaped by an unseen power that seeks to conceal evidence of the individual's true self.

This "unseen" power becomes more evident in all three plays when the main characters are portrayed as either excluded and repressed because of gender or race, or as in the case of M. Butterfly, true identities are literally masked and concealed in the process. Power is thus exhibited when fictionalized identities become a reality when the characters are no longer seen as unique individuals, but rather as "objects and rituals of truth."

These rituals of truth, which are constructed and created fictitiously, become increasingly

dangerous and harmful to the individual when Foucault acknowledges, "The individual and the knowledge that may be gained of him belong to this production" (194). Identities thus become the by-product of societies, who in essence are the very "factories" that produce such "falsely contrived realities."

However, these realities soon begin to create great inner conflicts within the individual that extends like a ripple effect outwards into the larger community as well. Unfortunately, these conflicts suddenly become translated into elements of sexism and racism relating to gender and cultural identity, which Foucault explains with his theory regarding creating an efficient system with little effective resistance. Similarly, all three playwrights, Glaspell, Wilson, and Hwang reveal the effects of that system as their main characters construct ways in which they learn to resist and rebel against a system that is not only powerful, but invisible as well. Using both realism and postmodern devices, they challenge the traditional notions of gender and cultural identity as a reality when they attempt to resist falling prey to the large power knowledge network at work within society.

American drama in the 20th century has introduced numerous conflicts that deal with cultural and gender identity as it presents itself through various modes of theater such as realistic and postmodern plays. Theater has always been a powerful tool in examining and critiquing society in ways that induce audiences to ponder over these ideas long after the play is over. All three plays by Glaspell, Wilson, and Hwang encourage critical thinking as they introduce and question various notions of identity that are ultimately created and dictated by society. Characters such as Minnie Foster, Mrs. Hale, Mrs. Peters, Troy and Rose Maxson, and Song Liling dramatize a deliberate attempt at resisting the mechanisms of a power knowledge system. This resistance becomes evident when the characters seek various ways to prevent themselves from being categorized within a larger network whose only aim is to normalize and control its citizens. This is done in such a way that not only allows audiences to be entertained, but it encourages them to question where such notions are originally contrived.

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Social Anxiety

by Daniel Bogan

David, a neurologist in his mid fifties, dreaded Friday nights when his wife conducted dinner parties at the country club. The anxiety mounted as Friday slowly approached each week, and his anxiety about these events caused him to have trouble sleeping. He even resorted to drinking in order to calm himself and enable himself to get through the day. This anxiety consumed David and he found that his work began to suffer. At these dinner parties, David discovered he feared he would “make a tremendous fool of” (Marshall 5) himself. Millions of embarrassing possibilities constantly ran through his mind before and during these dinner parties, dominating his thoughts with what ifs, and further heightening his anxiety. He even engaged in avoidant behavior such as ordering small portions or not eating much because he invariably visualized himself choking or dribbling food on his lap, leading to crushing embarrassment and others’ inevitable negative evaluation of his worth (Marshall 5).

Fourteen-year-old Lawrence identified with David’s intense anxiety each morning when he attempted to go to school. Lawrence’s mother drove him to school, but his anxiety often rooted him to the car seat and prevented him from attending school. Furthermore, if he went to school, Lawrence felt uncomfortable around other students, and this anxiety caused him to throw up in the bathroom. He feared throwing up in the classroom and any resultant embarrassment (Beidel 33-4).

Although almost 40 years separate David and Lawrence, both have similar negative thoughts about their ability to fit in, and they have an intense fear of certain anxiety causing situations. They join 2.4 percent of the United States population who suffer from an anxiety disorder called social anxiety disorder which is also referred to as social phobia (Salkovskis 346). People with anxiety disorders experience anxiety which causes distress or disrupts their ability to function. According to *Psychology in Action*, social anxiety is characterized by an “intense fear of being negatively evaluated by others or of being publicly embarrassed because of impulsive acts” (Huffman 513). Social phobia can surface in everyone from a seventh grader to a neurologist, and it has debilitating effects on one’s present and future life, often leading to other mental health problems. Therefore, it is necessary that social phobics receive treatment. Two treatment options for social phobics are psychotherapy and pharmacological therapy. One type of psychotherapy, cognitive-behavioral therapy (CBT), is a more complete and effective choice than medication for social phobia.

An article in *U.S. News and World Report*, “Social Anxiety”, calls social anxiety “the third most common mental disorder in the United States” (“Social” 50). People with social anxiety experience feelings of panic and desperately try not to have to meet new people. Also, they believe others constantly view their actions negatively (“Social” 55). For example, Grace Daily feared eating in school because she perceived everyone was looking at her, and Roland Bardon refused to drive out of a fear of upsetting other drivers (“Social” 50, 52). Clinics, such as the Shyness Clinic in Menlo Park, California, exist for those suffering from social anxiety disorder, but patients often do not attend meetings because of the disorder.

At clinics, social phobics may be exposed to cognitive-behavioral therapy. This therapy seeks to change patients’ thought processes by “replacing faulty thoughts with realistic ones” (“Social” 53). Patients are taught that their fears are irrational such as in Bardon’s case where he was convinced his driving always made other drivers angry and they would surely honk at whatever he did while

driving. Instead, the patients must formulate rational thoughts which accurately portray the situation. The aim of CBT is to help patients learn what is necessary in order to "function adaptively in their interpersonal and intrapersonal worlds" (Heimberg 102), and CBT's effectiveness stems from its inclusion of many proficient techniques such as exposure, cognitive restructuring, and social skills training.

Exposure therapy is deemed "the key ingredient" (Beidel 221) for CBT, and it leads to decreased anxiety "regardless of which variation" (Beidel 221) of CBT is employed. Therapists will put patients in embarrassing or anxiety-causing circumstances in order to train them to overcome the panic and fear or to interact with others. Patients must learn not to reflexively flee fearful stimuli, but to experience situations and see that nothing bad will occur. Therefore, they will become more comfortable with what they had feared, their first reaction will not be to panic and leave, and their irrational thoughts will be proved wrong. Repeated exposure will force the social phobic to see that nothing bad happens and disprove the preconceived negative ideas of unavoidable doom. For instance, one therapist takes patients in an elevator several times to force patients to converse with unfamiliar people who are riding the elevator ("Social" 53). As other passengers do not reinforce the irrational thoughts in the patients' heads that something bad will take place or that they will be singled out and made fun of, the patients' perceptions start to change. The panic starts to lessen and they can begin to face situations they had previously avoided. Furthermore, behavioral therapists urge people with social anxiety disorder to stay in panic-causing situations since the anxiety will eventually dissipate and they will realize that there is nothing to fear.

Exposure's goal is for the patient to progressively feel less anxiety whenever one faces the fearful stimulus. If it isn't feasible to find the actual situation, imagined exposure can be used. This requires the patient to imagine the fearful stimulus for at least 90 minutes in order for flooding, maintaining contact with the greatest anxiety causing stimulus, to occur. In vivo exposure applies a real life situation and whether in vivo or imagined is practiced, the feared stimuli and all consequences must be accurately copied (Beidel 193, 197).

A patient's automatic thoughts are tested and disproved with exposure. Cognitive restructuring forces the patient to examine these negative automatic thoughts, evaluate their truthfulness, and then change them to realistically portray the situation. Disproving negative thoughts, such as catastrophizing or all-or-nothing, is important because it shows the patient that most consequences and embarrassment are only imagined (Marshall 179). This aspect is integral since anxiety comes from "inaccurate beliefs about the potential dangers posed by social situations" (Heimberg 102).

Social skills training (SST) is based on the idea that either social phobics do not have adequate social skills because of their lack of participation in social settings or that they just do not use their skills for fear of doing something wrong or being humiliated therefore causing their skills to suffer from disuse (Marshall 176). However, it is clear that they need confidence in their social abilities to overcome social phobia. SST teaches skills through modeling, rehearsal, and homework assignments where the patients put their skills to use where they will succeed and receive a positive response (Heimberg 103).

Pharmacological treatment for social phobia employs many different medications ranging from monoamine oxidase inhibitors such as phenelzine (Nardil) to selective serotonin reuptake inhibitors sertraline (Zoloft), paroxetine (Paxil), and fluoxetine (Prozac) (Beidel 145-7). Medication is effective for social phobia as evidenced by a study that compared cognitive-behavioral group therapy (CBGT) and phenelzine. 133 people participated in the study and were randomly placed into groups for CBGT, phenelzine, pill placebo, or educational supportive group psychotherapy. In this study, 75 percent of CBGT participants who finished the study and 77 percent of phenelzine completers were considered treatment responders. Therefore, medication and CBGT exhibited about equal efficiency.

Those in the phenelzine group performed better on several tests following the 12 week study than the CBGT group members. However, a subsequent six month study using these treatment responders displayed the superiority and longevity of CBT over medication. According to the follow up study, 50 percent of "phenelzine patients had relapsed, compared with only 17 percent of CBGT patients" (Heimberg 107) highlighting the sustainability of CBT treatment. Therefore, although phenelzine may work faster and be a few percentage points better than CBT in the short term, CBT, while still effective in the short term, is clearly more beneficial to the patients in the long term. This study determined that CBT may give "greater protection against relapse" (Heimberg 107) than medication.

CBT also proved to be as productive as medication in the short term according to a study comparing CBGT and clonazepam. In this study, 27 men and 18 women who met the DSM-III-R guidelines for social phobia were used. Those in the clonazepam group met weekly with psychiatrists to check dosage amounts and the psychiatrist attempted to convince patients to enter new social situations. In the CBGT section, there were 12 meetings of two and a half hours each during which these patients engaged in cognitive restructuring, exposure, rehearsal, and homework (Otto et al. 347). Forty percent (10 of 25) of the medication group did not finish the study and five of these left because of adverse side effects. On the other hand, only five out of 20 (25 percent) of CBGT participants withdrew, but none cited side effects, underscoring the potential drawbacks of medication which are not present for CBGT. At completion of the study, rates of remission were very close for each group, and five people from each group were considered in remission, demonstrating "that both were effective treatments and revealed few significant differences in efficacy" (Otto et al. 351). However, medication participants did receive some CBT when they were prodded to go into social situations which the study admits may have bolstered their improvement. In addition, more people left the pharmacological treatment compared to CBGT. This study also warns that after stopping the medication, patients often relapse and that there could be "slippage of treatment effects even if pharmacology is maintained" (Otto et al. 352). Conversely, CBT patients continued to improve after the treatment and there weren't any warnings that the effects of CBT may dwindle. Instead, CBT seems to perpetuate improvements (Otto et al. 352).

Even though medications for social phobia are successful, drawbacks exist. First of all, the "relapse rates for medications are quite high" (Biedel 155). If CBT has similar effectiveness rates as medication, yet is devoid of physical side effects and is long lasting, then there is no reason why CBT should not be considered the prime treatment for social phobia. Since social phobia deals with negative cognitions, a therapy which changes these negative thoughts and provides the patients with techniques to use in the future to prevent and alter these thoughts is much more sensible than a pill which teaches the patient nothing. Patients who rely on a pill instead of on themselves for help may not eradicate their negative thoughts about themselves because they need chemicals and not themselves to decrease their anxiety. Secondly, most medications have side effects. For instance, clonazepam, shown as effective as CBGT, can cause "unsteadiness, forgetfulness, and impaired concentration" (Biedel 160) in adults. Another disadvantage is that patients taking MAOIs are encouraged not to eat cheese, cocoa, or yogurt (Biedel 161). Sudden stoppages of certain medications such as benzodiazepines can lead to withdrawal symptoms as serious as seizures. Therefore, it is important that a patient carefully regulates dosage and the discontinuation of medication (Biedel 163-4). Once again, CBT patients do not have to worry about these problems or about adjusting dosage.

The most significant reason why CBT is better than medication is its effectiveness in the long-term since "the positive effects of the drug tend to dissipate rather rapidly once the medication is discontinued" (Biedel 165). In a five year follow-up study, Heimberg, Salzman, Holt, and Blendell used 19 participants from a previous study in which social phobics were exposed to CBGT or

educational support. None of these participants lost any improvement five years after the original study. Also, another Heimberg study discovered that at a six month follow-up, CBGT members were still improving. At the end of the first study, the CBGT group displayed about equal improvement as the placebo group which only talked about social phobia, but the CBGT participants far outperformed the placebo group at the follow-up (Biedel 170-71). It makes sense that CBT has enduring effects because these people learn skills that they can implement anytime, even when they are out of the therapist's office. This treatment has the potential to constantly foster improvement which cannot be achieved with medication. Also, medication holds a stigma while CBT includes techniques, that people not considered social phobics, try all the time. For example, people employ exposure therapy and challenge their automatic thoughts when they try something new that they were convinced they could not enjoy.

There is no evidence to support that medication plus CBT doubles the benefit, but medications may be helpful when combined with CBT. For instance, an antidepressant decreases a depressed social phobic's depression, thereby increasing the chance the patient will attend the therapeutic sessions and follow CBT techniques. In addition, medication reduces excessive anxiety enabling the patient to take part in exposure (Biedel 162).

The article, "School-Based Behavioral Treatment for Social Anxiety Disorder", describes a study conducted to determine whether behavioral therapy for adolescents with social anxiety disorder works in a school environment. It is necessary that social anxiety disorder is treated early in one's life, but the problem is often ignored or reasons are given to excuse the abnormal behavior (Masia et al. 780). The experimenters believed behavioral therapy in school would be more effective than if it took place in an office because school is a natural environment for the participants. In addition, students spend most of their time in school and many sources of anxiety and fear occur in school (Masia et al. 782).

Teachers in a suburban middle-class Long Island school were instructed about social anxiety disorder and then chose students whom they believed suffered from social anxiety disorder. Eleven out of 46 parents allowed their children to take part in the study and only six of these students met the study's criteria. To determine if the students were qualified, they underwent tests such as ADIS-C which measured the severity of the disorder from zero (none) to eight (severe). If they received a four or higher, they were eligible. Three white males and three white females from 14 to 17 years old participated. Each participant was assessed at the beginning and at the end of the treatment using an independent and a self assessment. For example, the Liebowitz Social Anxiety Scale for Children and Adolescents (LSAS-CA) determines the level of anxiety of a certain stimulus and the Fear and Avoidance Hierarchy (FAH) had students record anxiety levels for ten situations they feared the most (Masia et al. 783).

The therapy included 14 sessions and was called Skills for Academic and Social Success. The sessions "focused on education, realistic thinking, social skills training, and exposure" (Masia et al. 786). Exposure concentrated on specific fear-causing situations for each student. Furthermore, teachers extended exposure therapy to the classroom where they placed participants in fearful situations to make them learn to be more comfortable. Students applied what they learned in the sessions to panic-causing situations to help themselves feel more relaxed.

All participants were considered "treatment responders" (Masia et al. 785) according to the Liebowitz Social Phobic Disorder Change Form. Three students were "markedly improved" (Masia et al. 785) meaning they did not meet social anxiety disorder criteria any longer, while the other three "moderately improved" (Masia et al. 785) revealing that they showed improvement, but still displayed social anxiety disorder characteristics. Also, each student's LSAS-CA score decreased after treatment as did one's ADIS-C and FAH scores. This proved the success of the study since "the

severity of social phobia symptoms significantly decreased” (Masia et al. 786). There were many benefits of the program. Although the school was not overly supportive of it at first, upon witnessing the positive change in the students’ behavior, they later supported the program. The study displayed the effectiveness of behavioral therapy in schools for adolescents with social anxiety disorder.

Another study displays the effectiveness of pharmacological therapy, but it also includes the medication’s drawbacks. This article, “Sertraline in Children and Adolescents with Social Anxiety Disorder: Results of a Pilot Study” discusses whether the drug sertraline is effective and safe to treat children with social anxiety disorder. Sertraline is a selective serotonin reuptake inhibitor and it is effective for adults with social phobia. Fourteen children participated in this eight week study and their ages ranged from 10 to 17 years old. Also, they all positively met the DSM-IV social anxiety criteria. A variety of tests measured success and side effects (Compton et al. 564-5).

Sertraline was given to participants for eight weeks. The initial dosage was 50 mg./day and could not exceed 200 mg./day. Psychiatrists adjusted the dosage based on results and side effects. Two participants did not complete the study. One dropped out because of side effects while the other believed the treatment was not the best method for her problem. Side effects were found, but were alleviated by reducing dosage. At the end of the study, only one child received 200 mg./day, five took 150 mg./day, one was give 125 mg./day, and four received 100 mg./day (Compton et al. 568-9).

The results of the study reveal that “sertraline may be efficacious and well tolerated for preadolescents and adolescents with social anxiety” (Compton et al. 571). People who did not give the treatment classified 36 percent of the participants as treatment responders and 28 percent as partial responders. Psychiatrists involved in the treatment found a notable response in behavior occurring by week six. Although the sertraline treatment appears promising, the experimenters admit it is only a “short-term treatment” (Compton et al. 573).

The study concerning cognitive-behavioral therapy in schools is impressive. It makes sense to conduct therapy in an environment, school, where the participants face the fearful events. Furthermore, the effectiveness of the therapy was increased because the students could directly practice what they learned in the classroom. A pill might have reduced anxiety, but it would not have taught the students social skills. Also, teachers implemented exposure therapy when they called on the study participants to help them overcome their fears and use the skills they learned. According to that study, all of the participants made a friend and several decided to join a sports team following the treatment. The social anxiety disorder affected school work so it was interesting that teachers either ignored social phobia or did not try to obtain help for the students. Since the results of the study were positive, this treatment, CBT, may help students improve in school.

It is interesting that problems associated with social anxiety disorder cause a cycle because if these people remain isolated, they cannot learn skills needed later in life. Not having these skills leads to more feelings of inadequacy which further causes social phobics to avoid more situations. Therefore, identifying social phobics at an early age and giving them behavioral therapy will help prevent future mental health problems.

“Social Anxiety” mentioned that drugs may make a person with social anxiety disorder more insecure because taking drugs could reinforce the belief the something is wrong with the person. Therapy, specifically exposure and graded therapy, produced successful results. Most people did not want to go places or thought a certain food would taste horrible, but they made these judgments without even trying the new situation or food. Once they go to the place or taste the food, they might not think it is bad anymore. Therefore, therapy teaches people how to change their thoughts and gives them techniques to use in panic-causing circumstances while drugs do not offer the techniques to the patient. Even in the sertraline study, it was found that sertraline may only be a temporary solution and that several patients determined that the combination of therapy before the study and the medication was beneficial.

After reviewing research studies concerning treatment options for social phobia, CBT is shown to be a preferable choice compared to medication. CBT helps social phobics not only during the treatment, but also after the treatment sessions have concluded. Therefore, the treatment never actually ends once a patient leaves a therapist's office because CBT's benefits are sustained and patients can use CBT methods whenever they choose. This longevity is evidenced by effect sizes for follow-up evaluations of social phobics who underwent CBT. Effect size is "the number of standard deviation units of improvement" (Heimberg 104) for patients that receive a certain treatment in a specific study. For instance, a study by Hope et al. at a 12 month follow-up for CBGT found an 0.86 effect size for social phobia and an 1.03 effect size for a fear of negative evaluation scale. In addition, at a six month follow-up, Heimberg, Dodge, et al. determined an 1.15 effect size for social phobia and an 1.07 effect size for the fear of negative evaluation scale (Salkovskis 355). These measurements show the longevity and effectiveness of CBT. Besides these advantages, patients with CBT do not experience side effects or have to face the cost of medication.

Medication is becoming the popular treatment for social phobics even though American Family Physician stated that social phobia is not easy to spot since most people may feel "the types of fears and avoidance commonly associated with" (Talbot) social phobia. Therefore, there is no reason to indiscriminately dole out medication when CBT is safer and more effective in the long term. CBT uses common sense techniques that one can easily use anytime instead of relying on the magic chemicals inside of a pill. It has to be more valuable and satisfying to recognize what is wrong, identify the faulty thoughts, and restructure them instead of blindly trusting a pill. CBT is comparable to medication, such as Prozac, since it cures an illness, but it is a more powerful medicine for the mind that should be prescribed for social anxiety disorder. Cognitive-behavioral therapy and medication are both effective, but a lack of side effects and enduring benefits make cognitive-behavioral therapy the optimal treatment for social phobia.

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The Roots of the Current Crisis: Why Afghanistan?

by Cris Swanson

Not a single hijacker on board any of the September 11 planes was Afghani. In fact, most of them were Saudi nationals. They planned their terrible deed in Europe, not Afghanistan. Nor has it been shown that the government of Afghanistan trained or supplied them. Osama bin Laden, usually glad to take credit for violence against his enemies (and who is also a Saudi national), denied involvement. Yet, by the end of that horrific day in September the president of the United States was on television unofficially declaring war on the Taliban.

It all seemed to come out of nowhere, but what this paper will show is that the routing of the Taliban government had been in the works for months, and was the culmination of five years of failed talks between our government, the Taliban and U.S. oil companies. Understanding the current crisis means understanding the geopolitics of the Middle East and Central Asia, which means understanding the geopolitics of oil, which centers on Saudi Arabia. In an effort to shed light on the question of why we are bombing Afghanistan this paper will spend a great deal of time on Saudi Arabia, but first, a brief discussion of what motivates Osama bin Laden and the movement he represents. (The 9/11 terrorists may or may not have been directly linked to bin Laden, but they were certainly part of the "movement".)

Why Do They Hate Us?

This is an easy question to answer for one simple reason: Osama bin Laden has been telling us why he hates us for 20 years. He's been clear and consistent. Professor Noam Chomsky put it succinctly in a recent speech at MIT: The people of Islam are angry at the U.S. for its 1) support for authoritarian and brutal regimes in the region, 2) intervention to block any move toward democracy, 3) intervention to stop economic development, 4) policies of devastating the civilian societies of Iraq while strengthening Saddam Hussein, 5) with Britain, past support of Hussein during his greatest atrocities, such as the gassing of the Kurds, and 6) support for Israel's military occupation of Palestinian lands, now in its 35th year. This is quite different from the reasons some, such as the U.S. president, give for Islamic resentment of America. The New York Times expressed this other viewpoint on September 16: "The perpetrators acted out of hatred for the values cherished in the West as freedom, tolerance, prosperity, religious pluralism and universal suffrage." (Chomsky, 9/11 27)

Well, which is it? Do they hate us because we promote freedom, or because we deny freedom? The answer is it depends on whom in the Muslim world you talk to. Osama bin Laden wants his land - especially his homeland, Saudi Arabia - to revert to some imagined time past when everyone obeyed God, and nobody was decadent like America. Most Muslims don't agree with his vision, but many do resent the U.S. for the reasons Chomsky listed above, and so they support bin Laden's anti-American activities to some *extent*. In other words, those who want *less* democracy, like bin Laden, want American troops out of the Middle East, and those who want *more* democracy - a far greater number - also want the U.S. to butt out. While the democratic and antidemocratic forces within Islam are in conflict with each other, they are united in their anti-Americanism.

Saudi Arabia

It can be argued that America's ascent to world dominance in the last 50 years could not have been accomplished without our symbiotic relationship with Saudi Arabia. One of the world's most oppressive and corrupt regimes, it is also the world's largest oil spigot, containing one quarter of the world's known oil supplies (Silverstein). As we know, Osama is from Saudi Arabia and what he wants more than anything in the world is for the infidels to leave his beloved Holy Land. So a study of the war in Afghanistan leads inexorably to Saudi Arabia, no matter which thread you follow.

Let's begin at the beginning. As World War II drew to a close, President Roosevelt, observing that oil was crucial to the Allied victory, enjoined the State Department to study all known sources of oil and decide how the United States could best insure its future survival. Someone in State at that time would label Saudi Arabian oil reserves, "one of the greatest material prizes in world history" (Silverstein). Following the Yalta conference in February 1945, FDR met secretly with Saudi king Abd al-Aziz Ibn Saud - the progenitor of today's royal family - on a warship in the Suez canal. No records exist of the conversation they had, but it is widely believed that a deal was struck there that still stands today: American protection in exchange for access to Saudi oil. The U.S. protects the royal family not only from outside invasion, but also from internal revolution. The U.S. Department of Defense played a central role in organizing, equipping, training and managing the Saudi Arabian National Guard (SANG), which protects the royal family and important oil installations. It's not a coincidence that in 1995 al-Queda bombed the U.S. headquarters of a program to train the SANG in Riyadh (Silverstein).

U.S. military presence there has steadily increased over the decades. From 1945 to 1972, primary responsibility for defense of the region was delegated to Great Britain, but when they pulled back "east of the Suez" in 1971, the U.S. stepped up. In 1979 three things happened in that area of the world that greatly increased U.S. presence there and the importance of Riyadh: the Soviet Union invaded Afghanistan, the Shah of Iran was overthrown by the Ayatollah Khomeini, and Islamic militants staged a brief rebellion in Mecca.

The Shah of Iran had been a puppet of the U.S., installed with help from the CIA in 1953 when Prime Minister Muhammad Mosadagh nationalized Iran's oil fields (Betz D5). In response to the events in 1979, President Jimmy Carter issued a new formation of U.S. policy known as the Carter Doctrine: any move by a hostile power to gain control of the Persian Gulf area would be regarded "as an assault on the vital interests of the United States of America" and would be resisted "by any means necessary, including military force" (Klare).

Carter also initiated covert operations against the U.S.S.R. in Afghanistan - with a lot of help from Saudi Arabia, who helped to fund the *mujahideen* (and later, the Taliban) - because he saw their action as a threat to U.S. dominance in the gulf. President Reagan accelerated Carter's covert and overt moves and issued a codicil to the Carter Doctrine: the U.S. would not allow the Saudi regime to be overthrown by internal dissidents, as occurred in Iran. "We will not permit [Saudi Arabia] to be an Iran," he told reporters in 1981 (Klare).

August 2, 1990 saw the invasion of Kuwait by Iraq. Two days later, President George H. W. Bush decided at a meeting at Camp David that the U.S. must take immediate military action to defend the Saudi kingdom against a possible attack by Iraq. Secretary of Defense Dick Cheney was dispatched to Riyadh to persuade the royal family to allow the deployment of ground forces on Saudi soil and the use of military bases for air strikes against Iraq (Klare). Osama bin Laden refers to this as the U.S. invasion of Saudi Arabia (*Chomsky*, 9/11 15). To this day, the United States maintains thousands of troops there, and continues to use Saudi Arabian air bases to strike Iraq on an almost daily basis.

Oil has made the Saudi royals very wealthy, and they return the favor to the U.S. by being the

top importer of weapons in the world. They even buy arms they don't need, if it helps the U.S. economy. This buys them political capital in Washington (Silverstein). The downside of the wealth story is that almost none of it is shared with the population. While the royals are among the richest people in the world, their subjects are among the most oppressed. There is 30% unemployment. Religious police enforce prayer. Women are made to cover their entire bodies in public. Meanwhile, accounts appear in the press of Saudi princes' drunkenness and debauchery. Needless to say, a wide rift exists between the people of Saudi Arabia and their ruling family. They see their government squandering the oil wealth on their lavish lifestyles and useless weaponry. In response to criticism of corruption, the Saudi regime has outlawed all forms of political debate: there is no parliament, no free speech, no political party, no right of assembly. U.S.-trained security forces quash overt expressions of dissent. It is out of this milieu that Osama bin Laden and many of his followers, including top lieutenants, have come (Silverstein).

So dependent is the U.S. on Saudi Arabian oil that we turn a blind eye to all of their brutality, even as we bomb a country that is almost exactly the same. The one difference, as we will see, is that the U.S. could not gain influence over the Afghani government, although it tried.

In a final irony, as of about ten years ago, the royal family began funding terrorist organizations like al-Queda, mostly as a form of self-protection (Palast).

The Bush Family

A discussion of Bush ties to Mideast oil is provided here not to charge extensive corruption or criminal activity - the reader is left to his or her own favorite conspiracy theories on that subject - but rather, they simply cannot be ignored if we are to paint as complete a picture as possible of the roots of the current crisis. One pertinent question should be asked, however: how wise is it to allow oil executives to run the regulatory branch of government? Isn't it like letting the fox guard the hen house?

The Bush family has been running oil companies since 1950. They and their friends have been shuttling back and forth between energy industry boardrooms and the halls of government power ever since. The current president's grandfather, Prescott Bush, helped raise \$350,000 for son George to start Zapata Petroleum just before he became senator from Connecticut in 1952. George made millions, and when Zapata merged with Penn to form Pennzoil in 1963, his new company lawyer was none other than James Baker, future Secretary of State and George W.'s lead man in the Florida election fiasco of last year (Cave, "United States").

In 1978 young George W. entered the oil business when several of his father's friends invested in his firm Arbusto (Spanish for "Bush"). W. didn't have as much luck as his father in finding oil and spent most of the time in the red. After several resuscitations by generous Bush family friends, Arbusto finally merged with Harken Energy in 1986. Two years later, the Bush power connections paid off when Abdullah Taha Bakhsh, a former director of Saudi Arabia's income tax department, purchased an 11 point stake in Harken. That same year, Harken won a contract for oil-drilling in Bahrain, despite a total lack of international experience. That deal turned George W.'s fortune around. After a lifetime of failure and mediocrity, he was now a player on a powerful trajectory that took him all the way to the White House. And he owed it all to a Saudi (Cave, "United States").

In one of the more tangled threads of the current situation, it turns out that the Bushes and the bin Ladens have been commingling their fortunes in various investments for some time now. Damien Cave reports, "The bin Laden family and other members of Saudi Arabia's oil-wealthy elite have contributed mightily to several Bush family ventures." Ex-President George Bush works for an investment firm called the Carlyle Group. They are an exclusive group of wealthy and well-connected men who invest in defense contracts among other things. They include among their

numbers James Baker, a few former Secretaries of Defense, the Saudi royal family, and the bin Laden family, who withdrew their money from Carlyle after the terrorist attacks. George W. Bush once received fees as director of a subsidiary of the Carlyle Corporation (Palast; Cave, "United States".)

We have been told that the bin Ladens have disowned Osama, the black sheep. New reports, however, are casting some doubt on this. Bob Woodward, of Watergate fame, recently wrote in the Washington Post that high-ranking intelligence people told him that the FBI is tracking at least two other bin Laden brothers suspected of terrorist activities in this country. One of Osama's sisters-in-law said in an interview with ABC News that she believes the bin Laden family is still continuing to fund Osama's activities (Palast).

None of this is mentioned to accuse the Bush family of wrongdoing, but to show that things are not as they seem on the surface, and the world in which there are definite good guys and bad guys exists only in Hollywood movies and on right-wing talk radio. It is worth mentioning who President George W. Bush has brought with him to Washington. Vice-President Dick Cheney spent the late 90's as CEO of Halliburton, the world's largest oil services company. In 1998 and 1999 he oversaw \$23.8 million in sales of oil rigs and equipment to Iraq, the country he helped punish as George H. W. Bush's Secretary of Defense. National Security Advisor Condoleezza Rice sat on the board of Chevron from 1991 to 2000, and even had an oil tanker named after her. She was hired for her expertise on former Soviet states and spent much of her time at Chevron working on prospective deals in the Caspian region. Bush's Commerce Secretary, Donald Evans, was CEO of natural gas company Tom Brown, Inc., who also employed Secretary of Energy Spencer Abraham. Lastly, a great number of White House staffers, including top White House economic advisor Lawrence Lindsay, worked for Enron, (formerly?) the world's largest energy trader and Bush's biggest benefactor (Cave, "United States").

It is interesting to remember that during the crises of 1979, Jimmy Carter championed the exploration of alternative energy resources and conservation as a way to wean America off of her dependency on Mideast oil, and to extricate herself from the constant turmoil of that region, not to mention the hypocrisy of supporting undemocratic regimes. What chance is there that an administration so dripping with hydrocarbons will do something similar this time? Had we taken the advice of the peanut farmer from Georgia then instead of following Ronald Reagan in the opposite direction, would the Twin Towers still be standing in lower Manhattan today?

Finally, according to the Center for Public Integrity, of the top ten lifetime contributors to George W. Bush's war chests, six either come from the oil business or have ties to it (Cave, "United States").

There may be at least one disturbing consequence of Bush's ties with Saudi elites. Two separate sources have reported that American intelligence agencies were ordered by the Bush White House to "back off" investigating Saudi terrorist leads, including the bin Ladens, although this policy was reversed after Sept. 11. The authors of *Bin Laden: The Forbidden Truth*, a new book recently published in France, claim they were told by former FBI deputy director John O'Neill that "the main obstacles to investigating Islamic terrorism were U.S. oil corporate interests and the role played by Saudi Arabia in it" (Godoy). O'Neill resigned in protest over the obstruction in July, and in a stunning coincidence, accepted a position as security chief of the World Trade Center, where he died in the collapse. Another quote from the same book reads: "Under the influence of U.S. oil companies, the government of George Bush initially blocked U.S. secret service investigations on terrorism, while it bargained with the Taliban for the delivery of Osama bin Laden in exchange for political recognition and economic aid."

A second source of this story is an interview on "BBC Newsnight" with *Guardian* reporter Greg Palast, who claims he received a phone call from a "high-placed member of a U.S. intelligence

agency.” In the interview Palast says that while there’s always been constraints on investigating Saudis, under George Bush, it’s gotten much worse. After the elections, agencies were told to “back off” of the bin Ladens and the royal family, which angered agents. It must have been one of those angry agents who leaked the secret FBI document that the BBC report was based on: #1991 WF213589, which emanated from the FBI’s Washington field office. When lawyer Michael Wildes tried to show FBI agents 14,000 documents that implicated Saudi citizens in the financing of terrorism and more, they refused, saying they were ordered to “see no evil” (Palast). The documents were brought to the U.S. by Wildes’ client, a Saudi diplomat who had defected.

Several days after the attack on America, a special charter flight took off from the same Boston airport as the hijackers had. While Attorney General John Ashcroft was busy rounding up over a thousand mostly-innocent Middle Easterners living in America, 11 members of Osama bin Laden’s family flew safely to Saudi Arabia. They were officially “above suspicion”, even though the FBI wanted to investigate more than one of them for suspected terrorist activities, according to the secret FBI document (Palast).

Afghanistan

So - the hijackers were mostly Saudis who probably worshipped another Saudi, Osama bin Laden, who wants American troops out of Saudi Arabia. Why, then, is the U.S. bombing Afghanistan? Oh yeah, that’s right - the Taliban is harboring bin Laden and they refuse to turn him over. But lots of countries are harboring terrorists and refuse to extradite them, including the United States. If bin Laden had been living in Algeria would we now be bombing their government? Probably not.

The real, widely unknown answer is that the U.S., Russia and others were planning for an October invasion of Afghanistan since last summer, and in fact American “advisors” were already stationed in neighboring Tajikistan (Arney). The effect of Sept. 11 was to give the U.S. overt and unilateral control over what was going to be a more covert and multinational operation. How else do you explain President Bush’s same-day declaration of war, and the four-week buildup before the bombing? Operation Desert Storm took six months to put together. Why was Afghanistan about to be invaded in the first place? Let’s begin, once again, at the beginning:

When the Soviets invaded Afghanistan in the 80’s, the CIA joined with Pakistani, British and Saudi intelligence to recruit, train and arm the most extreme Islamic fundamentalists to fight a “Holy War” against Russia. These were the *mujahideen*. When Russia pulled out in 1989, the terrorists set their sights elsewhere, and after the 1991 Gulf War America became a prime target (Chomsky, “New War”).

The U.S.S.R. disintegrated and several Central Asian republics gained their independence, including Uzbekistan, Turkmenistan and others. In 1994, huge oil and gas reserves were discovered in Kazakhstan and Turkmenistan, and the entire Caspian Sea basin. In fact, while the oil deposits of the Caspian region don’t rival those of the Gulf states, the natural gas deposits there are the richest in the world. Suddenly, U.S. oil and gas companies, supported by the U.S. government, became very interested in Central Asia. American oil companies have acquired the rights to as much as 75% of the output of Kazakhstan and Turkmenistan, but they haven’t been able to get the stuff out of those landlocked countries. Old Russian pipelines are expensive and in need of repair. The western route is through Iran and the eastern route is through China. The cheapest and quickest route would be south - through Afghanistan (Tanter; Martin).

In 1995 the U.S., Pakistan, Saudi Arabia and others formed the Taliban and sent them into Afghanistan from Pakistan to take over the country. In spite of its brutality and oppression of women, the Taliban regime was supported by the government of the United States, at least tacitly, in

the hopes that they would be a stabilizing force. (It's interesting to note that neither the Clinton nor Bush administrations ever placed Afghanistan on the official list of countries that sponsor terrorism. To do so would have forbidden oil and gas companies from doing business with Kabul) (Martin).

By 1997, the ruling elite in the U.S. was foreseeing possible war in Central Asia. American troops and the CIA had followed in the wake of oil contracts, and special forces began joint operations with Kazakhstan and Uzbekistan, training for intervention in the mountainous region to the south, including northern Afghanistan. According to Bob Woodward, the CIA has been mounting paramilitary operations in southern Afghanistan since 1997.

One company that tried mightily to do business with Kabul was the Houston-based energycorporation Unocal. Unocal favored the idea of a pipeline across eastern Afghanistan and spent much of the 90's trying to make it happen. Unocal led a multinational consortium of energy corporations who made an agreement with Turkmenistan, Uzbekistan, Afghanistan and Pakistan in 1997 to build a large Central Asian Gas pipeline (Centgas) through southern Afghanistan to Pakistan and India. The \$1.9 billion pipeline would be 120 cm in diameter and 1271 km long. To win over Afghanistan, the consortium offered an array of inducements: tax revenue on every cubic foot of oil passing through every day; fax machines, generators, tee-shirts; and a donation of \$500,000 to the University of Nebraska for courses in Afghanistan to train 400 teachers, electricians, carpenters and pipefitters (Tanter; Lees).

In December of 1997 a delegation of high-ranking members of the Taliban government flew to Houston to be treated to a long weekend of luxury and pampering at the homes of Unocal executives. They stayed in five-star hotels and were chauffeured in a company minibus. Unocal even paid to send delegate Mullah Mohammad Ghaus, a leading member of the Taliban ruling council, to a local optician to receive help for his war-torn eyes. This story appeared in the British press at the time: "Oil barons court Taliban in Texas", by Caroline Lees, www.telegraph.com.uk, Dec. 14, 1997. She also states that Unocal and the Taliban "are about to sign a \$2.8 million contract."

At the end of their stay in Houston, the Taliban delegation flew to Washington to hear U.S. Department of Energy officials sing the praises of the Centgas pipeline. Richard Tanter lists several reasons for U.S. government interest in a Central Asian pipeline: 1) to draw Central Asian states away from Russia, 2) to thwart development of Iranian influence in the region, 3) to diversify sources of oil and gas, 4) to benefit U.S. oil and gas companies, and 4) to provide prosperity to the local population, which would in turn lead to stability.

Everything looked good for the Centgas Pipeline Consortium in 1997, but 1998 brought upheaval and uncertainty. The Taliban was being excoriated in the world press for its human rights violations, especially against women, and in August of that year U.S. embassies were bombed by al-Qaeda in Kenya and Tanzania. Before the month was out, President Clinton was bombing training camps in east Afghanistan in retaliation. The UN Security Council demanded the Taliban hand over bin Laden to "appropriate authorities". Four months later, Unocal pulled out of Centgas.

If the turmoil in Afghanistan could end, there were billions of dollars to be made by American and Japanese companies, by the Turkmeni, Afghani and Pakistan governments, and the U.S. would control Central Asia, the area former National Security Advisor Zbigniew Brzezinski once referred to as the key to world dominance (Tanter). The Clinton administration demanded that the Taliban hand over Osama bin Laden and imposed economic sanctions. Pipeline talks languished.

Through 1999 U.S. pressure on Afghanistan increased. On February 3, Assistant Secretary of State Karl E. Inderfurth and State Department counterterrorism chief Michael Sheehan traveled to Islamabad, Pakistan, to meet the Taliban's deputy foreign minister, Abdul Jalil. They warned him that the U.S. would hold the government of Afghanistan responsible for any further attacks by bin Laden. Also in 1999, the Clinton administration and then-president of Pakistan Nawaz Sharif agreed to a joint covert operation to kill bin Laden. Washington would supply satellite intelligence, air

support and financing while Pakistan supplied Pushtun-speaking operatives to penetrate southern Afghanistan and carry out the killing.

The Pakistani commando team was up and running and ready to strike by October, 1999. Clinton aides were delighted at the prospect of a successful assassination, with one quoted by the Washington Post, saying: "It was like Christmas." On October 12, General Pervez Musharraf led a military coup in Islamabad and halted the mission (Martin).

The government of George Bush began to negotiate with the Taliban immediately after coming to power in February of 2001 (Godoy). Policy shifted from limited incursions to capture or kill Osama binLaden to preparing for a more robust military intervention directed at the Taliban as a whole. Most of 2001 was spent in the hopes that the Taliban regime could be "a source of stability in Central Asia that would enable the construction of an oil pipeline across" Afghanistan (Godoy). The French authors Brisard and Dasquie (*Forbidden Truth*) claim the Bush administration was willing to accept the Taliban government, despite charges of sponsoring terrorism, if it cooperated with plans for the development of oil resources in the region (Martin).

Several meetings were held between U.S. and Taliban diplomatic representatives throughout the year at various places - Washington, Berlin, Islamabad (Godoy). In March, an emissary from Kabul arrived at the White House with presents for the new president, including an expensive Afghan carpet (Martin). That same month, *British-based Jane's International Security reported that Washington was working* with India, Iran and Russia "in a concerted front against Afghanistan's Taliban regime," by helping the Northern Alliance (Bedi).

On May 23, an executive at Unocal (and a former member of the Reagan and Bush I administrations), Zalmay Khalilzad, was tapped to join the National Security Council as senior director for Gulf, Southwest Asia, and Other Regional Issues (Martin). On June 26, the magazine *IndiaReacts* ran an article describing the developing confrontation: "India and Iran will facilitate U.S. and Russian plans for limited military action against the Taliban if the contemplated tough new economic sanctions don't bend Afghanistan's fundamentalist regime." America and Russia were to combat the Taliban from the front with the help of two Central Asian countries, Tajikistan and Uzbekistan, said the magazine. The anti-Taliban move followed a meeting between Colin Powell and Russia's foreign minister, and later between Powell and India's foreign minister in Washington. In early June, Russian President Vladimir Putin told a meeting of the Confederation of Independent States that military action against the Taliban was impending (Martin).

A four-day meeting in mid-July in Berlin may go down as an historic turning point in world history. It was at this meeting that American diplomats openly threatened the Taliban and Pakistan, and revealed their intentions for an invasion "before the snows start falling...by the middle of October" (Arney). The meeting was one of several U.N. meetings called "6+2", for six Afghani neighbors plus the U.S. and Russia. Sometimes the Taliban had representation, but they refused to attend this time. The purpose was to discuss a political settlement for a coalition government for Afghanistan. Present at that meeting was Pakistan's Minister for Foreign Affairs, Naif Naik. Mr. Naik's interviews on the BBC and on French television have provided us with a lot of information about what went on there. The American delegation discussed the attitudinal shift from Clinton to Bush and strongly suggested that military action was an option. Had the Taliban accepted the coalition supported by the group they would, in Minister Naik's words, "have immediately received international economic aid....And the pipelines from Kazakhstan and Uzbekistan would have come" (Godoy).

The Taliban refused to accept U.S. conditions and talks degenerated swiftly. At one point in negotiations the U.S. delegate, Tom Simons, told the Taliban, "either you accept our offer of a carpet of gold, or we bury you under a carpet of bombs." Simons also is reported to have said, "either the Taliban behave as they ought to, or Pakistan convinces them to do so, or we will use another option."

Naik says that the words Simons used were “military operation” (Godoy).

Minister Naik was told by senior American officials that military action against Afghanistan would go ahead by the middle of October. He was told that unless Osama bin Laden was handed over swiftly America would take action to kill or capture bin Laden and Mullah Omar, the Taliban general. The wider objective, he was told, would be to topple the Taliban regime and install a transitional government. The U.S. would launch from bases in Tajikistan where American advisors were already in place. U.S.-Taliban talks broke off on August 2 after a final meeting between U.S. envoy Christina Rocca and a top Afghani representative in Islamabad (Martin). Five weeks later, Islamic fundamentalists flew jets loaded with fuel into the World Trade Center and the Pentagon. The U.S. president immediately declared war on Afghanistan.

Epilogue

There are so many questions to be answered, especially this one: Who perpetrated the acts of September 11? The hijackers are dead and nobody has taken responsibility. The only thing we know for sure about them is that they were of Middle Eastern appearance, because that is how they were described by passengers who called out on their cell phones. Whatever evidence the White House has they are keeping secret. Why?

Were Sept. 11 and the assassination, just days before, of the head of the Northern Alliance preemptive strikes by al-Queda, who knew an invasion was imminent? Did lust for power and wealth blind the Bush Administration to the consequences of their aggressive negotiating tactics? Will neutralizing Afghanistan and Iraq stabilize the Caspian and Gulf regions, making them safe and profitable for oil companies, or will it further inflame anti-American passions, eventually engulfing the globe in a world war? And what about the disturbing reports that Bush ordered the FBI and secret service to “see no evil” when confronted with evidence that Bush allies and co-investors are sponsoring terrorism? Is it treason, or do we see no evil in George Bush?

The answers seem to lie in the opposite direction than the administration is going in. Instead of taking on the preposterous job of “ridding the world of evil”, why don’t we do something that makes sense - rid America of its oil addiction? Dick Cheney may laugh at people who believe in conservation, but look what it did for California last spring. No more energy crisis, and it took responsible government leadership to make it happen.

America needs to disengage itself from the Middle East if we are to live in peace, and that means conservation and alternative fuels. Some will argue that in a free-market economy nothing can replace cheap Saudi oil. But there is nothing free-market about troops, bombs and CIA agents. In peacetime the U.S. spends \$40 billion a year defending its interests in the Gulf (Silverstein). A fraction of that could be used to subsidize alternative fuel industries and a conservation campaign, with dividends paid in independence, security and peace. Not to mention the positive impact on the environment. We’ve tried it Ronald Reagan’s way. It made us fabulously wealthy (well, some of us), and it made us a lot of enemies. Maybe we’re finally ready for Jimmy Carter’s way.

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Animated Children's Story or Adult Horror Movie: Tracking the Headless Horseman on Film

by Joseph A. Ryan

In Washington Irving's short story *The Legend of Sleepy Hollow*, the Headless Horseman is the ghost of a Hessian trooper, haunting the hollow in search of his head. As far as the reader knows, the ghost is not a murderer, only menacing. Irving's text was aimed at a sophisticated reader, one who could enjoy and understand its ironic subtleties, figurative language, and sense of history, while savoring the ambiguous ending. When Walt Disney adapted the story as part of an animated children's movie, he armed the Horseman with a huge sword and a penchant for decapitation. By turning the Horseman into a menacing potential killer, and sculpting his pumpkin head into a Halloween jack-o'-lantern, Disney unknowingly influenced the way the specter has been portrayed on film ever since.

Although it's believed that "Biograph, Selig and Thanhouser are among the companies that produced early silent versions of this story" (Emmens 146), little documentation is available about them. Three others silent versions are well documented; two one reel shorts (1908/Kalem and 1912/Eclair) that are extremely rare, and according to Zoran Sinobad, the Reference Librarian in the Moving Image Section of the Library of Congress, "considered lost, making the Will Rogers feature *The Headless Horseman* (1922/Hodkinson) the earliest surviving motion picture based on Irving's story." Putting in perspective that the first movie was shown in 1895, and the landmark *Birth of a Nation* was released in 1915, it is remarkable that six different versions of this century old fable had been filmed by 1922.

By titling their film *The Headless Horseman*, the producers were already recognizing the Horseman (America's first movie monster) as the signature image of the tale. Even though Will Rogers had the star power and is featured in virtually every scene, the picture was still called *The Headless Horseman*. The Horseman actually only appears in two relatively brief scenes in the movie, as a shadowy ghost with skeleton hands at his headstone near the very beginning of the movie and during the climatic chase finale. This second time though, he is not ghostlike, but very real. He chases the trembling Ichabod to the bridge and throws a pumpkin that hits him in the head. As Ichabod heads off into the woods, the Horseman lifts his disguise to be revealed as Brom Bones. The mystery and ambiguity that ended Irving's short story is lost.

Dutch-American Ubbe Iwerks sketched the first of the many animated versions of the legend in 1934. Iwerks was the original creator of Mickey Mouse, and "was an animation genius, perhaps the greatest of all time, whose contributions to the art in the 1920s and 1930s helped make animation much more appealing to a wider audience" (Smith 260). Iwerks produced *The Headless Horseman* during a ten-year hiatus from Disney (1930-1940) when he ran his own animation company.

As in the original short story, the mere fact that the Horseman is headless ghost is what scares Ichabod. The Horseman carries no decapitating devices, and although he is seen in Ichabod's imagination poking him with a bayonet, when the actual ride comes, like his film predecessor and the short story, he carries only a pumpkin.

Iwerks too, makes it very clear that Brom Bones was the Headless Horseman. In an added twist though, he does allow Ichabod to make some headway when he shows up at Katrina and Broms' wedding as the decapitated equestrian and scares them both away. In the end, Iwerks was never able to outdo the creativity of the shorts Disney was producing at the time. As Leonard Maltin relates, "A

prime property like *The Headless Horseman* yields (only) routine results because of the staff's inability to build vivid dramatic situations" (Maltin *Mice* 191).

In 1944, the movie *Curse of the Cat People*, an in-name only sequel to 1942's *Cat People* was released. It draws heavily on *The Legend of Sleepy Hollow* to tell the tale of Aimee, a young girl who lives in Tarrytown and spends an inordinate amount of time daydreaming (not unlike the townspeople of Sleepy Hollow). She hears the tale of the Headless Horseman who, according to the movie, if you are not careful, will pick you up and, "...swing you to his saddle-bow and then forever you must ride. Always his cold arms around you, clasping you into the cavity of his bony chest." "What was told as a quaint and entertaining legend, having no real bearing on her life, returns to haunt the child at various times, repeatedly intruding its frightening reality into her fragile, formative world" (Telotte 121). This is the first indication on film that the tale of the Headless Horseman is one that children could especially identify with.

Aimee, like Ichabod, and most children for that matter, has such a vivid imagination; the line between what is real and imagined is often blurred. Producer Val Lewton (who grew up in Port Chester, just a few miles from Tarrytown) and Screenwriter DeWitt Bodeen pay extensive homage to Irving's story. They begin the movie with Aimee and her classmates heading out across the actual bridge in Sleepy Hollow that was the centerpiece of Ichabod's ride. Aimee's father, although referencing what happened with his first wife, could just as well have been talking about the gullible Ichabod when he said, "I know what can happen when people begin to lie to themselves, imagine things." Aimee has a nightmare about the Headless Horseman, and towards the climax of the film she approaches the old Sleepy Hollow bridge at night and is terrified as she hears the clatter of galloping hooves drawing ever closer.

In October of 1949, Walt Disney, (with Ubbe Iwerks now back in the company) released its version of the legend as half of their eleventh fully animated feature called *The Adventures of Ichabod and Mr. Toad*. Disney was going through a tough time at the box office after World War II, and though not a total bust, the film certainly didn't help the bottom line. Disney's "annual report for 1949 had to announce an operating loss of \$93,849" (Hollis and Sibley 59).

In the following years, "both sequences (have) proved to be hardy Disney perennials, in single reissue and television exposure" (Maltin *Disney* 92). This massive saturation began in 1955 when Disney chopped the Ichabod segment out of the movie and used it for the first of many times as the Halloween segment of their hugely successful television show *Disneyland*. This was at a time when, according to a chart in *The Complete Directory to Prime Time Network and Cable TV Shows*, the show was routinely receiving forty shares of the television audience and ranked fourth amongst all prime-time shows for the year (Brooks and Marsh 1260). It was this same thirty-three minute section they released to theatres as *The Legend of Sleepy Hollow* in 1958. Through the 1960s and 1970s the segment became a Halloween staple, and in the 1980s and 1990s, the newly formed Disney channel also repeated the crayon colored cartoon endlessly. When Disney plunged head first into the video market, they released the Ichabod short in several different forms, on its own, in its original form with Mr. Toad, as part of several Halloween compilations, and along with other Disney shorts. What would have become a forgotten film release, instead developed into a cherished television tradition.

The story "for the most part it is presented in a rather pedestrian manner, but the final sequences, in which Ichabod is pursued by the Headless Horseman, are outstanding, with the drama building to a fine pitch of excitement" (Finch 281). Watching the movie today, it's hard to believe that this sequence was filmed over fifty years ago. "The chase through Sleepy Hollow when Ichabod is pursued by the terrifying Headless Horseman is the studio at its best" (Hollis and Sibley 162). It was this powerful interpretation of the Headless Horseman's ride that would eventually propel Disney's version of the story and the Horseman himself to the head of the pack.

Just before the fateful ride, Brom sings the song *The Headless Horseman*, and warns that he

“rides one night a year (Halloween)...looking for a top to chop” and “he needs your head.” He illustrates his message by slicing off the head of a scarecrow (are you paying attention Ichabod?). When the chase scene arrives, we realize Disney is the first to arm the Horseman with a sword. While other versions of the specter were merely menacing, Disney’s is the first true headhunter. When the bloodless, comedic, yet thrillingly scary ride ends, for the first time on surviving film, Brom Bones is not revealed to be the Horseman. No wonder this ride is so much scarier than ever before. Not only is he trying to cut off Ichabod’s head, but Disney also holds tight on the relief valve.

Disney’s Hessian is actually much more in line with the attitude of the real Hessian soldiers. These mercenaries were feared by “the Americans (who) cried out against the bloody pursuit of the Hessians and their refusal to accept surrender” (Eelking 35)

Disney was the turning point for two other key aspect of the story. This was the first version to eliminate all references to the African-American characters in the story (and they have not been put back in any filmed version since). They also armed the Headless Horseman with a glowing jack-o’-lantern rather than a pumpkin, even though jack-o’-lanterns and Halloween would have been unheard of in the late 1790s of America, especially in an insular Dutch community like Sleepy Hollow. “Halloween has its ultimate origins in the ancient Celtic harvest festival, Samhain, a time when people believed that the spirits of the dead roamed the earth. Irish settlers brought their Halloween customs - which included bobbing for apples and lighting jack-o’-lanterns to America in the 1840s” (Henderson and Thompson 110). The Halloween connection was such a natural that, as the Disney version became more exposed, no longer was *The Legend of Sleepy Hollow* just a story that took place in the fall. From now on, like the jack-o’-lantern itself, it would almost always be linked with Halloween.

The 1950s was the golden age of Television, and *The Legend of Sleepy Hollow* was adapted for the new medium in several different ways. In 1958, Shirley Temple made her television-acting debut in a special live presentation of the tale on her *Shirley Temple’s Storybook* series. Shirley played Katrina, and Boris Karloff, dressed as Washington Irving, was the narrator. Unfortunately, although other episodes from the series are available, since this one was done mostly live, with the Headless Horseman’s ride on film, there is no video available. This seems to be the case for many of the programs broadcast during this time. For instance, when Will Rogers Jr. took his dad’s role of Ichabod in a half hour tele-drama of *The Legend of Sleepy Hollow*, broadcast on CBS on Halloween night in 1952.

Besides Disney’s regular airing of their version, the 1960s was a relatively quiet time for new adaptations of the story. The only references were a 1960 Halloween episode of the syndicated series *Reading Out Loud* featuring Garry Moore reading *The Legend of Sleepy Hollow*, and the use of the 1922 Will Rogers version (edited to fit a 30 minute program) on the 1960 ABC series *Silents Please*.

By the 1970s, Disney’s *The Legend of Sleepy Hollow* had reigned on the big screen and television for almost a quarter century as the definitive filmed version of the tale. One of the most dramatic effects the Disney version had, was to link the story to children’s animation. With success comes imitation, and the first attempt to emulate Disney’s achievement came the day after Halloween 1970, when CBS’s *Famous Classic Tales* aired the Australian produced *The Tales of Washington Irving*. It featured half-hour, animated versions of *The Legend of Sleepy Hollow* and Irving’s other most popular short story, *Rip Van Winkle*. Before the opening credits roll, we get a glimpse of the Headless Horseman as he is seen later in the movie. This version, portrays Headmaster Crane as a child abuser, beating and berating what he calls the “wretched children.” Its Headless Horseman does not carry a decapitation device, but does throw a jack-o’-lantern at the end of a very short and not very imaginative ride.

Before the advent of cable television’s niche marketing, Saturday morning television was

children's animation headquarters. The Headless Horseman made the first of his many appearances on Saturday morning TV in 1971, on a Halloween episode of the ABC cartoon series *The Funky Phantom*. The story starts when a group of teenagers get a flat in modern day Sleepy Hollow. They discover Ichabod's great, great, great grandson is now the town's Schoolmaster, and it turns out, this version's Headless Horseman as well. This is the only animated version of the tale that came after Disney's to not have the Headless Horseman use a jack-o'-lantern for his head. He instead carries a head made up to look like one from the revolutionary war.

A year later, in 1972, Pyramid films commissioned actor John Carradine (who grew up in Peekskill, just north of Sleepy Hollow) to narrate an animated version of the short story that was marketed for use in schools and later as half of a video put out by the popular children's publisher Golden Books. Since it was originally intended for students reading the short story, the headless apparition seen here, like the short story, is merely a menace, doesn't carry any large blades, but does use the now obligatory jack-o'-lantern instead of a pumpkin.

Hanna-Barbera, the producers of *The Funky Phantom* were obviously big fans of the Headless Horseman, and brought him back to Saturday morning in the 1976 *Scooby-Doo/Dynomutt Hour* episode entitled *The Headless Horseman of Halloween*. The story revolves around a party that Ichabod's great, great granddaughter (friends of the Scooby-Doo gang) throws on Halloween Night at her Sleepy Hollow mansion. The Headless Horseman (with a jack-o'-lantern for a head) threatens to take Shaggy's head, but he bears no decapitation devices, and we soon learn he is after the Crane jewels and not a noggin.

In October of 1979 the Canadian Broadcasting Corporation broadcast the animated *New Misadventures of Ichabod Crane* starring the Amazing Kreskin as the pedagogue. The writers kept some elements of the story, but constructed an entirely new plot in which Ichabod triumphs over the Headless Horseman (who is really a witch in disguise) with help from his horse Gunpowder, a talking dog, and even Rip Van Winkle. Even though Ichabod's name is in the title, it's the Headless Horseman who we see before the opening credits even roll. Obviously inspired by Disney, this specter is the only animated one since theirs to brandish a sword. He has an even bigger cape than Disney's and carries a flaming jack-o'-lantern as well. In a wonderful twist of irony, the witch brings a field full of scarecrows to life to chase down Ichabod, who then uses the witches' spell book to turn himself into the Headless Horseman and chop off each of their heads.

The undead just won't die, so in 1987, the animated Saturday morning series *The Real Ghostbusters* head out after *The Headless Motorcyclist*. Not unlike the *Scooby-Doo* version, the setting is the present, with the Ghostbusters hot on the trail of a headless motorcyclist who throws a flaming head (actually a motorcycle helmet) at descendants of Ichabod Crane. Much more clever (for Saturday morning television anyway) than *Scooby-Doo*, the show takes many of the elements of the Irving story (which they retell as part of the plot) and twists them to fit their situation. Their client is "Kate" rather than Katrina; one of the Ghostbusters becomes a sort of Ichabod; and the headless motorcyclist (who has the emblem of a jack-o'-lantern on his cycle) won't travel over bridges.

The following year, the TV series *Alf*, which already had a half hour animated Saturday morning version on NBC, began producing a second half-hour of animation called *Alf Tales* which retold famous stories. The fourth episode of the series was a Halloween special: *The Legend of Sleepy Hollow*. This version uses modern-day New York City as its Sleepy Hollow. Alf gets a job as a photographer at the city newspaper published by Baltus Van Tassel. Katrina is his flirtatious secretary/daughter and Brom Bones is the city editor. Brom has recently broken the story of a mysterious Headless Horseman who uses a jack-o'-lantern for his head. After a Halloween party at the Van Tassel's midtown mansion, it's revealed that half the town has dressed up as the Headless Horseman at one time or another. As Ichabod and Katrina ride off over the Brooklyn Bridge, in the

background we see the Statue of Liberty holding, not a torch, but a jack-o'-lantern.

Showtime aired an animated version of *The Legend of Sleepy Hollow*, narrated by Glenn Close, as part of a children's series from 1988. The Horseman seen here carries jack-o'-lantern, of course.

By the 1990's the children targeted cable television network Nickelodeon had adapted the tale for two of its shows. In a 1994 episode of *Are You Afraid of the Dark?* called *Tale of the Midnight Ride*, a teen learns not to horse around with the legend, and the following year, the show *Rocko's Modern Life* did a take-off on the story in a Halloween episode entitled *Sugar Frosted Frights*.

Many producers, still holding on to the idea that the story appealed mostly to children, tried their hand at telling the tale with live actors. Vincent Price, never one to tarry, was the host of the 1979 CBS Halloween special *Once Upon a Midnight Scary*, a compilation of three scary tales for children. The idea was to show just enough of the story to get kids interested in reading the source material. *The Legend of Sleepy Hollow* segment begins at Katrina's party and wastes no time setting up the dynamic between Ichabod and Brom Bones. When Ichabod heads out on his fateful ride, the Headless Horseman is seen carrying an actual head. He throws it at Ichabod, and it flies face first at the screen. The next morning, we see a jack-o'-lantern smashed on the bridge. The viewer is then encouraged to "pick up the book and see what you think really happened."

Halloween night in 1980, NBC aired a version of *The Legend of Sleepy Hollow* that was nominated for an Emmy Award for Outstanding Children's Program. This time, Jeff Goldblum took on the role of Ichabod during his semester in Sleepy Hollow. The Headless Horseman (or his likeness anyway) makes many appearances throughout the film, as the custom-bound residents of the Hollow torment Ichabod for not believing in spirits. When the climatic chase scene arrives, there are two Headless Horsemen who meet almost head on! We are made aware one is Brom Bones. The other, we assume, is the real dominant spirit of Sleepy Hollow. Again, with a tip of the hat to Disney, the real Headless Horseman carries a huge sword and a glowing jack-o'-lantern. This is the only live action version aimed at children that uses the sword. The new twist here is that he chases Brom Bones, and throws the gourd at him instead of Ichabod, who winds up chasing after both of them.

Shelley Duvall's Tall Tales and Legends children's series on Showtime took a stab at *The Legend of Sleepy Hollow* in 1985. Ed Begley Jr. plays a decidedly middle-aged Ichabod and Beverly D'Angelo has to be the oldest Katrina on film. This version makes no bones about the Halloween connection. Right from the opening scenes of dialogue there is talk about the bad things that happen on Halloween night. Katrina's party is a Halloween party, and at eleven-o'clock Halloween night they all gather to tell Halloween ghost stories. Brom Bones tells the story of a highwayman who lost his head and haunts the Sleepy Hollow road on Halloween night "looking for a fresh head to snatch and put on his own shoulders." That night, the midnight trooper chases Ichabod through the woods carrying a flaming jack-o'-lantern which he throws as Ichabod flees headlong into the night. The next scene shows Brom bragging to friends about scaring Ichabod out of his wits. It seems all is revealed until the narrator comes on and shows us what happened the night after Halloween when the headless headhunter appears to the frightened Brom Bones in the woods.

In 1998, the PBS children's series *Wishbone* took on the subject in a special Halloween edition. Wishbone is the name of a terrier dog that tells classic stories interwoven with a contemporary story with similar themes. This Horseman carries the jack-o-lantern with the biggest flames of any interpretation.

The Disney version's saturation by the early 1970s had not just turned the Headless Horseman into a character in a children's story. They had also portrayed him as a would-be killer, who was now instantly recognizable and ripe for exploitation in films targeted for adults. The 1972 extremely low-budget horror movie *Curse of the Headless Horseman* was the first film in which someone actually dies because of the Headless Horseman. The plot deals with a group of hippies trying to

make an old-west theme park profitable as they are methodically either injured or killed after seeing the Headless Horseman. This Headless Horseman carries his detached head and splatters blood from it onto unsuspecting hippies who are then "cursed." Although it has little to do with the original story, the screenwriters do tip their hats to the classic story when, after they are warned of the beheaded specter by an old man, one of the hippies mutters, "Who does he think he is, Washington Irving?"

The Horseman has also figured prominently in series television over the last few decades, many times as a suspected killer in shows aimed at an adult audience. Jessica Fletcher was sent to discover the identity of the beheaded one in 1987's *The Night of the Headless Horseman on Murder She Wrote*. Krusty the clown opened *The Simpson's* 1995 Halloween Special: *Treehouse of Terror VI* as the Headless Horseman, and the Sci-fi channel got into the act just this past year in an episode of their new series *The Chronicle* where the Horseman is suspected in a series of decapitations.

In 1999, fifty years after the Disney release, three different adaptations of the short story were released within a month's time. The first came from the fledgling Odyssey television network which "had their highest rating for any program to date" (Francis 14) for their live action version starring Brent Carver as the headstrong Ichabod. The very first shot in the movie, where Ichabod is perched in an open field as if a scarecrow, is stunning. It's made clear this time, that the decapitated phantom rider is searching for a head to replace his own. One of his victims was found with his head pulled down into the Horseman's grave. "His neck was stretched as if the Headless Horseman wanted to take it for his own." Borrowing from the Jeff Goldblum version, two Headless Horsemen show up on that fateful night. One is Brom Bones. The other, the real galloping Hessian of the hollow, who picks up the pumpkin Brom had used (this is the only post-Disney version to use a pumpkin) and throws it at Ichabod. He has no sword, does no neck stretching, and is not very menacing. It's a very enjoyable story, but not a very thrilling climax.

Five nights later, FOX broadcast what they billed as the first 3-D, animated, feature length film for television: *The Night of the Headless Horseman*. Typically FOX, the network that brought us such classics as *When Pets Attack*, this version is aimed directly at the teen and young adult demographic that enjoys a little gore with their classic literature. In fact, this is the first filmed version where we actually see the Headless Horseman behead someone (that doesn't even happen in *Curse of the Headless Horseman*). Ichabod is invited by Katrina to a Halloween quilting frolic, and upon leaving, half a century after Disney first gave him the idea, the Horseman appears carrying a long sword and a flaming jack-o'-lantern.

Almost three weeks later, Tim Burton's *Sleepy Hollow* was released to theatres. Burton turns the short story upside down and drowns us in atmosphere. He keeps the setting of time and place, but changes the plot dramatically. In an almost color-free film (except for the orange glow of a jack-o'-lantern or the red of gushing blood), Ichabod is now a constable in New York City, sent to Sleepy Hollow to investigate the mysterious, headline-making homicides that have occurred there.

Christopher Walken, who plays the film's Headless Horsemen when he has his head, portrayed a schoolteacher in the 1983 film *The Dead Zone*, in which he urged his students to read Washington Irving's *The Legend of Sleepy Hollow*. Walken's Horseman has the highest body count (eighteen) and the most screen time of all the headless riders. He carries a huge sword and still throws a flaming jack-o'-lantern at Ichabod.

Most interestingly, this is also the version with the happiest of endings! While most adaptations either follow the ambiguous ending of the short story, or reveal Brom Bones to be the Horseman, here Ichabod is truly the hero and gets not only the girl, but an adopted son as well! Even Disney couldn't pull that off.

In an interview which took place on the Halloween before the movie opened, Burton said he wanted to remake the film because he "was taken by the powerful image of the Headless Horseman,

it's such an icon. You don't see too many movies with main characters that don't have a head! I was very aware of the story, it was burned in my psyche and consciousness, but I had never actually read it. I had seen the Disney cartoon" (Burton). Like so many directors before him, Burton's main influence for his adaptation was Disney's film, not Irving's short story.

Burton had been an animator at Disney in the early 1980s. You can spot in his film, several blatant references to Disney's version of the legend. The most obvious are the frogs that chirp Ichabod's name, the old windmill scene (a scene Disney stole from their own short *The Old Mill*, and a homage to *Frankenstein* as well), and when Ichabod rides his horse backwards while being chased by the Headless Horseman. Burton also throws in a reference to Rip Van Winkle when he has Ichabod say, "I could sleep for a century."

With the amazing amount of hype surrounding the three different movie versions that were released in 1999, an exploitation version of the tale wasn't far behind. The movie *Sleepy Hollow High* was released directly to video in 2000, in time to beat Burton's *Sleepy Hollow* to the shelves. The producers spent most of their money on the packaging. *Sleepy Hollow* is in huge lettering with *High* in much smaller letters beneath it all surrounding an evil looking jack-o'-lantern.

Very cheaply shot directly to digital video, *Sleepy Hollow High* concerns the story of five delinquent teenagers forced to clean up the haunted Sleepy Hollow Campgrounds on Halloween afternoon. The Headless Horseman decapitates and mutilates them one by one. In the only clever homage to Irving's story, the Horseman gives chase through the woods trying to behead the chaperoning teacher (who doesn't stand a ghost of a chance). This midnight rider carries a big sword and wears a pumpkin head that's painted to look like a jack-o'-lantern.

Washington's Headless Horseman is not the only one to make it to the screen however. Captain Mayne Reid's 1866 book *The Headless Horseman* has been made into a motion picture twice, once in Mexican (*El Ultimo Mexicano*), and the other a Russian version (*Vsadnik Bez Golovy*) that is one of that country's all-time biggest hits. There was also a 1950s movie serial in Mexico called *El Jinete Sin Cabeza* that consists of three separate full-length motion pictures revolving around a Headless Horseman character, and a 1939 British comedy called *Ask a Policeman* that revolved around a sleepy town invaded by a Headless Horseman driving a flaming horse-drawn hearse.

In the 1959 movie *The Headless Ghost*, a group of teenagers invade a haunted castle trying to help a headless ghost retrieve his head. Though not a Headless Horseman picture per se, the movie poster featured a giant ghost about to throw his head at the teens who are running from the castle. The similarity to the Sleepy Hollow story from the poster alone is clear. There is even an animated Estonian film about a Headless Horseman! It is hard to know if any of these were influenced by *The Legend of Sleepy Hollow* or by the myriad of other Headless Horseman tales that can be found around the world. Washington himself has admitted he adapted his tale from European folklore, "especially Karl Musaeus' German folktale *Volksmarchen*" (Hoffman 347).

Of the dozens of motion picture adaptations that we can trace back directly to Washington Irving, the Walt Disney adaptation, even though it was only marginally successful when it was first released, has become the touchstone version. Its influence can be seen in every single filmed interpretation that followed it through their use of either the Halloween connection, the jack-o'-lantern, the sword, or some combination of the three. Not one of these appeared in the original short story or any surviving filmed version of the tale pre-Disney. The Headless Horseman-Halloween paradigm, initiated by Disney, is now a part of our culture. Even Historic Hudson Valley's official "Legends" weekend in Sleepy Hollow (a real town since 1996 when North Tarrytown officially changed its name) is always the weekend closest to Halloween.

Through a slice of timeless animation, the Disney team brought the Headless Horseman to the forefront of the story and expanded dramatically his appeal to children. At the same time, they made

him a potential killer, influencing other filmmakers to view him as much more than just a character in a children's story, but a horror that could haunt adults as well.

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