Phactum

Professing themselves to be wise, they became fools... Romans 1:22

The Newsletter and Anti-Woo Woo Organ of the Philadelphia Association for Critical Thinking

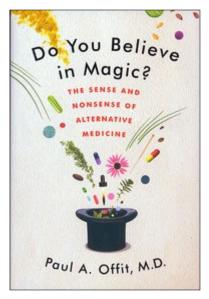
October 2013

editor: Ray Haupt email: phactpublicity@aol.com
Webmaster: Wes Powers http://phact.org/

PhACT Meeting - Saturday, October 19, 2013

at Community College of Philadelphia in Lecture Room C2-28 in the Center for Business and Industry at the corner of 18th and Callowhill Streets. At 2:00 PM.

Parking is available from 12:30 to 6:00 PM in the surface parking lot on 17th Street. All are Welcome. This event is Free and Open to the Public. Handicapped accessible.



Dr. David Cattell, Chairman of the Physics Department of Philadelphia Community College, will host Dr. Paul Offit, Chief of the Division of Infectious Diseases and the Director of the Vaccine Education Center at the Children's Hospital of Philadelphia, a Professor of Vaccinology, and a Professor of Pediatrics at the University of Pennsylvania School of Medicine.

"Do You Believe in Magic?:

The Sense and Nonsense of Alternative Medicine"

We live in a world filled with Magic, or at least promises of Magic. Look in most newspapers and popular magazines and there is usually a Daily Horoscope, there may be advertisements for cleaning products that remove dirt "as if by magic", classified ads for psychics and fortune tellers, and beauty products to dazzle the beholder. These things are all magical in their essence and for the most part are generally harmless enough sharing only the

(Continued on page 2)

on small-pox inoculation:

"In 1736 I lost one of my sons, a fine boy of four years old, by the small -pox, taken in the common way. I long regretted bitterly, and still regret that I had not given it to him by inoculation. This I mention for the sake of parents who omit that operation, on the supposition that they should never forgive themselves if a child died under it, my example showing that the regret may be the same either way and that, therefore, the safer should be chosen."

~ Benjamin Franklin (1709 - 1790)

common element that the customer's wallet is somewhat physically thinner at the end of the purchase or advisory session.

Enter Alternative Medicine. Like the magical nonsense mentioned above there is a distinct financial consideration. Usually the Alternative Medicine at hand is benign in that it causes no immediate direct short term danger. On a longer term basis the consideration is quite different and may result in aggravated conditions and even death when the breathless promises of magical Alternative Medicine cures do not materialize while Evidence Based Medicine has been shunned and the patient endangered.

Dr. Offit will discuss the history and shortcomings of many branches of alternative medicine and we hope attendees will find this presentation stimulating and thought provoking. Meanwhile, as we enter flu season, it is a good idea to get your flu shots and have your kids vaccinated, and if you do not believe me, then be sure to ask your doctor and please come to the PhACT meeting to ask one of the world's top experts on the matter of vaccines and of many other issues of modern medicine.

A book signing will follow Dr. Offit's discussion.

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Vaccination Opt-Outs Found to Contribute to Whooping Cough Outbreaks in Kids

http://www.scientificamerican.com/article.cfm?id=vaccination-opt-outs-found-to-contribute-to-whooping-cough-outbreaks-in-kids&WT.mc_id=SA_WR_20131009

Now here is an interesting little coincidence given that PhACT's October speaker, Dr. Paul Offit is an expert in vaccines for childhood diseases.

The October 2013 issue of Scientific American has an article By Tara Haelle discussing an outbreak of pertussis in California in 2010 that sickened about 9,000 children and

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some deaths did occur. There are multiple factors in that outbreak and others in the United States, but one powerful contributing factor in that situation was surely that of parents neglecting or refusing to have their children vaccinated for a variety of reasons beyond medical ones. Dr. Offit was interviewed for expert opinion in preparation of this article.

Whooping cough, or pertussis, is a highly contagious bacterial infection in the lungs that causes violent coughing and sometimes lasts for months.

I, the editor of this newsletter, can attest to the nastiness of whooping cough. I had contracted that disease when I was, in 4th grade. I was a sick puppy and missed about three months of school on that occasion. I never forgot the attacks of coughing and gasping for breath that could occur at any time and would likely occur if I had exerted myself in any way, even to walk up one flight of stairs.

As a kid I also had measles and chicken pox. Except for a day or two of fever those two diseases were sort of fun as I was out of school for a week and stayed with my grand-mother until I was well. I do not recall being terribly ill, just a lot of embarrassing red spots. Whooping cough was another matter. It was no fun and even after I was well enough to attend school I did not feel energetic for another month.

I was fortunate in that I never had complications from those diseases, but some do, the complications being far worse at times then the initial sickness.

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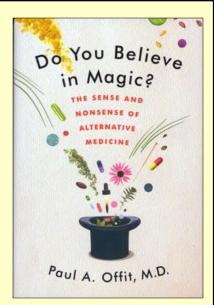
Do You Believe in Magic?: The Sense and Nonsense of Alternative Medicine by Paul A. Offit

Publisher: Harper; 1 edition (June 18, 2013) Hardcover: 336 pages ISBN-10: 0062222961 ISBN-13: 978-0062222961

The following review was written by Dr. David Cragin, a toxicologist and longtime member of PhACT's Council.

Have you ever wondered about the basis of alternative medicine? How did the various types get started?

E.g., How did chiropractic get started? It was in 1895 by a mesmerist, Daniel Palmer, who used magnets to treat his patients. When a deaf individual came into his office, Palmer wondered if his spine was misaligned and tried to realign it. When he did, the man's hearing recovered. This might have made sense except that the 8th cranial nerve which conducts nerve impulses from the ear to the brain doesn't travel thru the neck.



Or why according to accupuncture does the body have 12 meridians? Because there were 12 great rivers in ancient China. Why is the number of acupuncture points about 360? This was based on the number of days in a year. Offit is sensitive in his coverage, noting that the ancient physicians who started the practice were forbidden from dissecting human bodies and knew little about the internal organs or most importantly the nervous system.

Offit provides these and other fascinating tidbits that will give you a new perspective on alternative medicine. Offit provides both historical context as well as what modern science tells us about these practices. He discusses the scientific studies of the various disciplines of alternative medicine and what they have found.

As someone who teaches health-based risk assessment at two universities, it's great to see a thoughtful in-depth look at an area most of the public sees as risk-free. Whether you are scientist, health professional or someone with an inquiring mind about health, you'll learn much from reading this book.

Deadly Choices:

How the Anti-Vaccination Movement Threatens Us All.

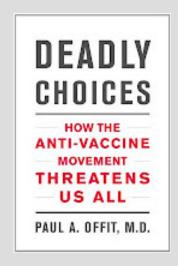
By Paul Offit, MD

Publisher: Basic Books; 1 edition (December 28, 2010) Language: English Hardcover: 288 pages ISBN-10: 0465021492 ISBN-13: 978-0465021499

There's a silent, dangerous war going on out there. On one side are parents, bombarded with stories about the dangers of vaccines, now wary of immunizing their sons and daughters. On the other side are doctors, scared to send kids out of their offices vulnerable to illnesses like whooping cough and measles--the diseases of their grandparents.

How did anyone come to view vaccines with horror? The answer is rooted in one of the most powerful citizen activist movements in our nation's history. In Deadly Choices, infectious

disease expert Paul Offit relates the shocking story of anti-vaccine America--its origins, leaders, influences, and impact. Offering strategies to keep us from returning to an era when children routinely died from infections, Deadly Choices is a vigorous and definitive rebuttal of the powerful anti-vaccine movement.



Letters to the Editor

Editor: A friend of mine emailed me some comments about the series "The Wire", including some comments about the election years of governors in Maryland and how they're incorrectly portrayed in the series (which takes place in Baltimore, and is the best TV series ever). I wanted to check that, so I went to Wikipedia and typed in Governor of Maryland. As I was typing "Governor", at exactly the same time I heard my daughter, in another room, speak the word "governor" to my wife. (I didn't know why. After this coincidence happened I asked her and she told me she was talking about an emergency drill held at Logan Airport in Boston today, the governor of Massachusetts stating that it was really stupid for holding it on 9/11.)

Howard J. Wilk

Philadelphia,

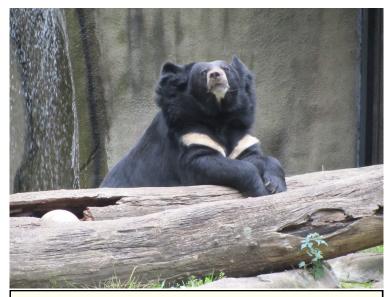
Editor's note: Howard collects coincidental happenings in his life on a casual basis. Professor David Spiegelhalter of Cambridge University also does so on a more scientific basis and would like to know of little coincidental incidents in your life. Check out this website:

http://understandinguncertainty.org/coincidences

Editor: Could one see an Abominable Snowman right here in Philadelphia? Some reports of this supposedly hairy, gigantic biped of Asia were thought to be due to misidentifications of known animals such as of the Asiatic black bear (Ursus thibetanus). Bears are hairy and big and may seem to be bipeds if seen standing on their hind legs when trying to get a

better look at or smell of some distant creature in order to identify it. And a living specimen of the Asiatic black bear is currently residing in the Philadelphia Zoo!

Don Nigroni
Glenolden, PA



Asiatic black bear at the Philadelphia Zoo. Photograph taken by Don Nigroni on September 26, 2013

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Your thoughts and opinions are important. Why not share them with other Phactum readers? We appreciate letters and articles about almost any topic. We would very much like correction on matters of factual error and polite expression of disagreement of opinion. You may rebut the ill-tempered Editor's ramblings with impunity as we promise not to stick pins in effigy dolls. Original poetry is welcome.

Send submissions to the Phactum Editor at: phactpublicity@aol.com



"Fix reason firmly in her seat, and call to her tribunal every fact, every opinion. Question with boldness even the existence of a God; because, if there be one, he must more approve of the homage of reason, than that of blindfolded fear."

~ Thomas Jefferson (1743 - 1826)

Various Ruminations

of Woo Woo and Real Science

Collected/Written by Ray Haupt (with help from others)

Legal Troubles

Get a load of this!!

It seems that Donald Eugene Miller Jr of Fostoria, Ohio was declared dead in 1994. This year, early October 2013, Mr. Miller walked out of Hancock County Probate Court still legally dead despite his vigorous protestation concerning his own life status. Mr. Miller may not collect Social Security because he is dead. Meanwhile, Mr. Miller's wife has been collecting death benefits from Social Security. One wonders if the Internal Revenue Service has regulations about taxing the Walking Dead.

Presumably Mr. Miller can not vote for the inconvenient reason of being dead. I suggest he move to Philadelphia to have that right restored according to our time honored local custom.

http://www.thecourier.com/Issues/2013/Oct/08/ ar_news_100813_story2.2013,Oct,08&c=n



Cartoon by Dave Lowe http://www.paraabnormalthecomic.com/

Good Quack / Bad Quack

There are good quacks and bad quacks. A good quack is the sound a duck makes. A bad quack is someone pretending to be a doctor. (You'd be better off visiting the duck with your ailment.)

If you ever get a chance to interview a celebrity duck, prepare to write the word quack in your notebook many, many times, because that's all that ducks can say. The way you spell animal sounds changes depending what language you speak. In English a duck quacks, but in Danish a duck "raps," while Indonesian ducks "wek," and Romanian ducks say "mac." And that "MD" who isn't really a doctor, but is good at pretending to be one? He's a quack. If you ever meet a quack that "quacks," please run.

This little entry was shamelessly plagiarized from: https://www.vocabulary.com/dictionary/quack

Two Good Quacks

And they are not ducks!

The Quackometer (http://www.quackometer.net/) is a

UK based website operated by Andy Lewis, the inventor of the quackometer and also a blogger. The Quackometer is dedicated to exposing alternative medicine and other woo woo nonsense. Andy Lewis writes: "The Quackometer and blog are experiments in critical thinking. If you read what I am writing, I very rarely venture past



using a basic understanding of science. Most of the time, what I am doing is spotting common errors of thinking and argument, such as post hoc thinking, magical thinking, selective thinking and appeals to authority. As such, examining the claims of alleged quacks rarely relies on detailed medical knowledge. As such, being critical of health claims rarely needs detailed medical knowledge and, as I hope this is something we can all take part in and debate."

The Quackometer has posted a link in its Facebook facility about a new book soon to be available written by **The Quack Doctor**.

The Quack Doctor is also a UK based website authored by Caroline Rance who is not a doctor and offers no cures, but she has accumulated an impressive library of historical cures and medical stories largely from the 18th and 19th centuries. Caroline now has a book entitled *The Quack Doctor* which will be available January 2014. The Quack Doctor website is rich in historical medical lore and may be viewed at: http://thequackdoctor.com/

A Not So Good Quack

Doctor Stephen Barrett, the proprietor of the **Quackwatch** website and arguably the dean of anti-quack investigators, reported in Consumer Health Digest of October 3, 2013: *Kevin Trudeau briefly jailed for contempt*

Infomercial scammer Kevin Trudeau was briefly jailed for failing to pay a court-ordered sanction entered against him more than three years ago. Trudeau claims that he has few assets and cannot pay. However, investigators believe he has hidden assets through an elaborate scheme that involved marrying a young Ukrainian woman and placing her in control of the Global Information Network (GIN), a multimillion -dollar network that supports his elaborate lifestyle.

The FTC's filing said that Trudeau owns or controls five corporations with nearly \$190 million total cash flow since 2007. ABC News has reported that he has been averaging about \$1 million a year in new credit card charges that were paid mainly by the corporations the government says he controls. [Hill J. Kevin Trudeau: Chasing the dream seller, May 20, 2013] Trudeau's attorneys deny this and characterize the payments as business expenses associated with Trudeau's speaking engagements and worldwide travel. They claim the expenses are paid by separate companies that Trudeau neither owns nor controls, in connection with services he provides to them. During a court hearing last week, when an FTC attorney questioned him for more than three hours, Trudeau invoked his Fifth Amendment rights hundreds of times. Trudeau is represented by the Law Offices of Marc J. Lane, which specializes in "asset protection." The FTC has also asked the court to hold the law firm and three of the companies in contempt for failing to produce subpoenaed documents. On September 18th, the judge ordered Trudeau jailed until he "came clean" about his assets, but the next day the judge released him with instructions to continue talking to the receiver.

If you have an interest in the concept of science based medicine and **EBP** the **Quackwatch** website is a splendid source of information. It may be found at:

http://www.quackwatch.org/

You may subscribe to Consumer Health Digest (Free) by sending a blank email message to:

chd-subscribe@lists.quackwatch.org.

Creeping Creationism in Pennsylvania

Glenn Branch, Deputy Director, National Center for Science Education reported in the (Evolution and Climate Education Update: September 27, 2013) an item that should be of special interest to skeptics and critical thinkers:

Barbara Forrest's Warning to Pennsylvania

Writing in the Erie, Pennsylvania, Times-News (September 18, 2013), Barbara Forrest warned Pennsylvanians about the threatened antiscience bill in their state. As NCSE previously reported, in August 2013, Stephen Bloom (R-District 199) was circulating a memo seeking cosponsors for a proposed bill resembling the antiscience bill enacted in Tennessee in 2012.

Reminding her readers about the 2005 trial in Kitzmiller v. Dover, establishing that the teaching of "intelligent design" in the public schools is unconstitutional, Forrest observed that the Discovery Institute's reaction was to announce its "new front in the debate over intelligent design -the need to protect academic freedom."

She continued, "With intelligent design exposed as creationism in court, the Discovery Institute now conceals its true aims behind the sanitized code language of 'academic freedom' legislation, seeking to undermine the teaching of evolution under the guise of 'critical thinking.' But the Discovery Institute's 'new front' is a shopworn creationist tactic."

Forrest argued that Bloom's bill pursues the goal of promoting "intelligent design" creationism: "Pennsylvanians shouldn't be fooled: Bloom is pushing a stealth intelligent design creationism bill, pure and simple, and the Discovery Institute plans to exploit Pennsylvania's legislative process

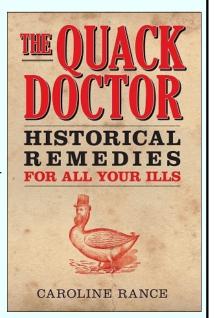
The Quack Doctor: Historical Remedies for all your Ills

by Caroline Rance

Paperback Published: 2013-10-15 ISBN: 9780752487731

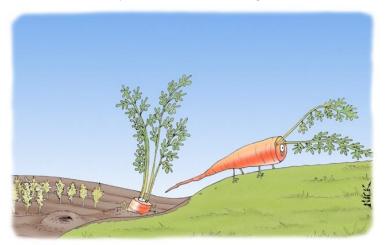
From the harangues of charlatans to the sophisticated advertising of the Victorian era, quackery sports a colourful history. Featuring entertaining advertisements from the nineteenth and early twentieth centuries, this book investigates the inventive ways in which quack remedies were promoted – and suggests that the people who bought them should not be written off as gullible after all. There's the Methodist minister and his museum of intestinal worms, the obesity cure that turned fat into sweat, and the device that brought the fresh air of Italy into British homes. The story of quack advertising is bawdy, gruesome, funny and sometimes moving – and in this book it takes to the stage to promote itself as a fascinating part of the history of medicine.

This book may be purchased at Amazon.com



the same way it exploited Louisiana's and Tennessee's."

So far there is no sign of the bill on the Pennsylvania General Assembly's website, but the legislature is not cur-



The next great step in carrot evolution.

Cartoon by Nick D. Kim, http://www.lab-initio.com Used by permission.

rently in session. The legislature reconvenes on September 23, 2013. Bloom told Fox 43 television (September 4, 2013) that he recruited seven cosponsors for the bill and hoped to add further cosponsors when the legislature reconvenes.

Barbara Forrest is Professor of Philosophy at Southeastern Louisiana University, coauthor (with Paul R. Gross) of Creationism's Trojan Horse: The Wedge of Intelligent Design (revised edition, Oxford University Press 2007), and a member of NCSE's board of directors and a recipient of NCSE's Friend of Darwin award; she testified for the plaintiffs in Kitzmiller v. Dover.

For Forrest's column in the Times-News. visit:

http://www.goerie.com/article/20130918/ OPINION08/309189989/Guest-Voice-of-Barbara-Forrest% 3A-Intelligent-design-sneaks-into-public-schools# For Fox 43 television's story, visit:

http://fox43.com/2013/09/05/academic-freedom-bill-places-science-up-for-debate

Once again it seems that Creationism/Intelligent Design is getting more muscular in Pennsylvania and hopefully rational people will be aware and ready to respond. NCSE has had some other recent coverage of this story which may be found at: http://ncse.com/news/pennsylvania

Pennsylvania entries in that NCSE news archive go back to 2001. There was considerable activity that turned into an avalanche of news reporting surrounding the Dover School Board Trial in 2005. Since that trial there has been little coverage of new probing by Creationists, but since April of 2013 legislation to insert Creationism into school curriculum has resumed. Be aware.

Phactum will be on the lookout for more information on this story but leads, and perhaps essays, would be appreciated from Phactum readers.

In the spirit of fairness we welcome Creationist/ Intelligent Design supporters to contribute lucid letters and articles based on observable evidence to explain their viewpoint.

Meanwhile, at the Academy of Natural Sciences of Philadelphia, a new exhibition called

"Dinosaurs Unearthed"

has opened and will be on display until March 30, 2014. http://www.ansp.org/visit/exhibits/dinosaurs-unearthed/

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A few thoughts about **Gravity** from The Watchtower, the newsletter of Jehovah's Witnesses

on floods: June 16, 1926 - "Flood may have been caused by all of the other planets being on one side of the earth simultaneously. God may have inserted the "youngest" planet Neptune on the other side to act as a gravitational corrective to make sure it cannot happen again."

on falling down elevator shafts: March 24, 1926 - "Negative Gravitation... new discovery ... radiant energy ... radio-activity ... Many have wondered how accidents would be avoided during Christ's kingdom, since we are told that nothing shall then hurt or destroy. Most accidents are due to gravitation and its effects. Falling from airplanes... may be avoided by an individual negative gravity device. Scientists tell us that there is enough atomic energy in a finger-nail to propel a battleship. The people of the future may carry a little of this energy around with them, and if they fall down an elevator shaft they can let themselves down easy. Then they can turn a little more on and go back up."

Meeting Report - September 2013

The AIDS Conspiracy: Science Fights Back a discussion by Nicoli Nattrass

Reported by Dianxing Huang and Khadrah Nabil Khalil

Dianxing Huang and Khadrah Nabil Khalil are Physics students of Dr. David Cattell at Community College of Philadelphia

by Dianxing Huang

Last Saturday, September 21st, I participated in a meeting of Philadelphia Association for Critical Thinking hosted by the Physics Department of Community College of Philadelphia, in which Professor Nicoli Nattrass gave a talk on "AIDS Denialism", the key themes in her new book "The AIDS Conspiracy: Science Fights Back".

In general, AIDS denialism is the view held by a loosely connected group of people and organizations who deny that the human immunodeficiency virus (HIV) is the cause of acquired immune deficiency syndrome (AIDS). Throughout her talk, Nattrass revealed a social issue in the science area--the controversy upon the existence and influence of HIV in the context of the conflict between AIDS denialism and science. First, she employed statistics based on past research to identify that South Africans and African Americans were the main body of the group of AIDS denialism. Although she asserted that HIV conspiracy theories were wrong and harmful according the modern scientific evidence, Nattrass also found several historical and societal reasons that had driven the occurrence and was maintaining the existence of AIDS denialism which had seemingly generated a crisis that science cannot be trusted. Finally, she argued that AIDS denialism also gains social traction through organization around four symbolically important roles: hero scientists, sympathetic journalists, cultropreneurs, and living icons.

Again, this is a social problem that came up in the science field. Apparently, there are still people on the earth in modern society who do not belive in science. Sometimes scientists may think those people are stubborn and conservative, but it is true that scientists cannot force AIDS denialist group to believe in what is outside of their ideas, beliefs, and values. In their world, AIDS denialism and HIV conspiracy theories are virtually their "science". Thus, the issue of AIDS denialism came out as a social problem.

In order to solve this social problem, scientists had better make efforts in sociological aspect. AIDS denialists think antiretrovirals are not effective for HIV, but most of them do not really know the reason in depth because of lack of high education. When the previous and peer AIDS denialists say the "fact" compared to the scientists' fact, especially if they have prejudice on science or they do not even know science, they think there is a considerably large possibility that the very "fact" is the truth because it is more acceptable and understandable. For example, they saw people who took antiretrovirals still died and some who did not take them survived. Although scientists have found the mechanism how antiretroviral treatment is effective, still some people cannot understand it and therefore do not trust it. To help them understand it, education should be addressed. Big part of AIDS denialists are low class. If they are provided with good education, they will learn to understand science beyond the scope of HIV conspiracy and have better ability to determine right and wrong, true and false. In this case, the bigger problem that challenges science is not simply HIV conspiracy; instead, it is the accumulated sickness within human society-extreme diversity and inequality.

by Khadrah Nabil Khalil

The AIDs Conspiracy Theory; Science Fights Back

After the increase of HIV infection throughout Africa, conspiracy theories spread throughout the communities because of suspicions of the US government. Surveys were taken in Africa by Professor Nicoli Nattrass and 34-50% of the public said that HIV was a man-made virus. Other responses from public were that the virus was made with the purpose of killing blacks and it was an American made virus. The disease mostly spread because of unsafe sex and injected drugs. People denied the facts of science and only alleged in the conspiracy beliefs that HIV doesn't cause AIDs and that AIDs is does not lead to death. However, Professor Nicoli Nattrass fights back with science against the conspiracy beliefs in her newly released book.

Science provided facts to the public that surely AIDs is caused by HIV as well as proven to be a killing disease. After the

spread of the infection, there were many deaths that were reported to have been HIV positive and they had the disease of AIDs. However, this was not enough evidence for the AIDs rejection among the people. Because of their strong conviction in the conspiracy theories, it was difficult to convince them of using the antiretroviral drugs that were made to help HIV. The reason is solely because the group in denial, who rejected the science of HIV, did not want to accept anything from the people who were making the antiretroviral drugs because they were believed to be part of the "scheme" and "conspiracy theory". Therefore many people were left to be untreated.

Many of the people who were HIV positive were inspired that they could have a normal life-span because of the organizations that motivated them. For example, the four common figures that inspired the people were the hero scientists, the people who offered alternative remedies, the living icons, and the praise-singers. Ironically the living icons claimed to be living healthily for an amount of time, but unfortunately they became sick of AIDs and died. Their deaths now became evidence to go against any of the other living icons, who also claimed they were healthy although HIV positive.

Furthermore, Peter Duesburg used to also be in denial of AIDs caused by HIV and he used to publish articles trying to prove his stance. Soon his articles were debunked by the Scientific Community, and therefore his work on AIDs was then rejected. John Maddox, editor of the Nature, ruled in 1993 that Duesburg no longer had the 'right to reply' because of his unreasonable stance. Mbeki's Presidential Panel was also in denial of AIDs and wanted to give alternatives to the antiretroviral drugs by recommending the treatments of massage therapy, music therapy, yoga, spiritual care, etc.

Finally, although science has proved the conspiracy theories wrong, many people today still live in denial and continue to try to live while being HIV positive and not being treated. Although many urge to convince them otherwise with their thoughts, it hasn't been successful because of the organizations that have been inspiring them that they can live a long healthy life. The facts have been proven and evidence has been shown.

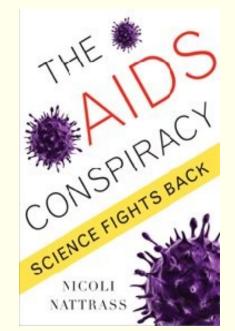
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The AIDS Conspiracy: Science Fights Back by Nicoli Nattrass

March, 2012 Columbia University Press
Paperback 240 pages, ISBN: 978-0-231-14913-6 \$25.00 / £17.50
Cloth, 240 pages ISBN: 978-0-231-14912-9 \$35.00 / £24.00

Since the early days of the AIDS epidemic, many bizarre and dangerous hypotheses have been advanced to explain the origins of the disease. In this compelling book, Nicoli Nattrass explores the social and political factors prolonging the erroneous belief that the American government manufactured the human immunodeficiency virus (HIV) to be used as a biological weapon, as well as the myth's consequences for behavior, especially within African American and black South African communities.

Contemporary AIDS denialism, the belief that HIV is harmless and that antiretroviral drugs are the true cause of AIDS, is a more insidious AIDS conspiracy theory. Advocates of this position make a "conspiratorial move" against HIV science by implying its methods cannot be trusted and that untested, alternative therapies are safer than



antiretrovirals. These claims are genuinely life-threatening, as tragically demonstrated in South Africa when the delay of antiretroviral treatment resulted in nearly 333,000 AIDS deaths and 180,000 HIV infections—a tragedy of stunning proportions.

Nattrass identifies four symbolically powerful figures ensuring the lifespan of AIDS denialism: the hero scientist (dissident scientists who lend credibility to the movement); the cultropreneur (alternative therapists who exploit the conspiratorial move as a marketing mechanism); the living icon (individuals who claim to be living proof of AIDS denialism's legitimacy); and the praise-singer (journalists who broadcast movement messages to the public). Nattrass also describes how pro-science activists have fought back by deploying empirical evidence and political credibility to resist AIDS conspiracy theories, which is part of the crucial project to defend evidence-based medicine.



The North American Gorilla

By Don Nigroni

Mainstream science can supply us with no credible evidence of any wild gorillas in North America, however, unsubstantiated reports of them roaming our land, albeit without any verifiable live or dead specimens, do exist.

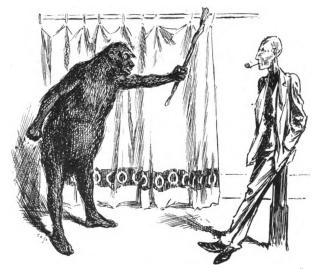
According to Ian Redmond in *The Primate Family Tree* (2011), there are two extant gorilla species, the western gorilla and the eastern gorilla, with four subspecies, the western lowland gorilla and cross river gorilla in western Africa and the eastern lowland gorilla and mountain gorilla in central Africa.

The gorilla was scientifically recognized in 1847 and due to the lectures and exhibitions of stuffed gorillas by African explorer Paul du Chaillu in America and England in the early 1860s something of a gorilla craze swept the nation. The story of du Chaillu and his gorillas was told by Monte Reel in *Between Man and Beast* (2013). But he noted that on Broadway du Chaillu's display of a real stuffed gorilla was unable to compete with P. T. Barnum's WHAT IS IT? exhibition of a man in a fur suit.

By early in the next decade and at least until the end of the century, we have reports of gorillas in the New World. From a June 30, 1871 article in The New York Times we learn that the "wild man of the Cedars" apparently was "twenty years ago a well-known young man, who then lived in Wilson County, Tennessee, left his home and family, and fled into the neighboring forest, and that he has ever since remained entirely solitary there, holding, with slight and involuntary exceptions, no intercourse with his fellow-beings." And when "he was last seen a few weeks ago; that his face is entirely covered with a black beard growing close up to the eyes and flowing down to his middle". The item closed by noting that this story "is given as the true version of the many reports touching a 'wild man of the woods' in that region, that for some years have been in circulation. It is certainly much more plausible than the wild stories about an 'American gorilla,' and other ethnological marvels, that have from time to time ministered to the love of sensation."

An October 26, 1872 advertisement in *The Philadelphia Inquirer* informed readers that the Col. Wood's Museum had on exhibit daily the "South American Gorilla, the Petrified Body and the Invisible Princess". The two illustrations

shown accompanying this article are from *A Gorilla Romance* by W. L. Alden which appeared in an 1893 issue of *The Strand Magazine* and they should give you some indication of the type of creature on display at the Col. Wood's Museum.



"THE CORILLA WAS ALWAYS SAVING AGGRAVATING THINGS TO THE SKELETON."

And the November 6, 1873 edition of the *Galveston News*, Galveston, Texas, reported that one of the "San Diego (California) papers" "has discovered a sea monster which beats the average sea serpent a long way, and the other trots out an improved American Gorilla."

But the most famous case of a North American gorilla is known as the Jacko hoax. Myra Shackley in *Still Living?* Yeti, Sasquatch and the Neanderthal Enigma (1983) included the text of the original British Columbian newspaper article for July 4, 1884 concerning Jacko. This item ran in the Colonist under the heading What is it? A strange creature captured above Yale. A British Columbian Gorilla. The piece wondered "Who can unravel the mystery that now surrounds Jacko?" and asked "Does he belong to a species hitherto unknown in this part of the continent"? Nonetheless, Loren Coleman in Bigfoot! The True Story of Apes in America (2003) wrote that the Mainland Guardian, New West-

minster, British Columbia, days later in a July 9th article stated "that no such animal was caught, and how the *Colonist* was duped in such a manner, and by such a story, is strange." Coleman also noted that the July 11, 1884 issue of the *British Columbian* informed its readers that some 200 people went to see Jacko at the jail but he wasn't there.

As late as February 16, 1898 an article in the *Goshen Daily Democrat*, Goshen, Indiana, noted that the people of Madison County, Indiana, were "greatly worked up" because "a monster gorilla" was "making his home along Fall creek." This item noted that "Children describe the gorilla as a monkey as big as a man and dogs, which have chased it, lose their courage when it turns on them."

Such is my case for the North American gorilla and if still unconvinced then at least we still have Bigfoot!

ΩΩΩ

Don Nigroni received a BS in economics in 1971 from St. Joseph's University and a MA in philosophy from Notre Dame in 1973. He retired in 2007 after working for 32 years as an economist with the US Bureau of Labor Statistics. He now spends much more time hiking, mountain biking, kayaking and bird watching.



Paul du Chaillu (1835 - 1903)

Paul du Chaillu was a French-American explorer born in New Orleans. At age 15 Paul accompanied his father on business trips to Africa where he was educated by missionaries. Paul met and befriended many of the African natives and there he learned the local language and heard tales of strange animals and tribes. When Paul was 20 his father died and Paul declined to operate the family business, opting instead to be an explorer/adventurer.

He was sent in 1856 to 1860 by the **Academy of Natural Sciences at Philadelphia** on an African expedition. He set out to Equatorial Africa and ventured as far as 300 miles inland from the coast being the first white man to have encountered many of the animals and plants of Africa and was the first to observe unknown tribes. Paul hunted extensively having shot and stuffed hundreds of animals, many unknown to scientists. At that time du Chaillu encountered many gorillas and is thought to have been the first white man to see them. He took several dead specimens to the Natural History Museum of London.

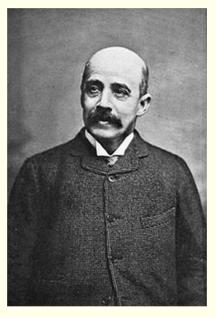
On a subsequent expedition, from 1863 to 1865, Du Chaillu confirmed ancient accounts of a pygmy people inhabiting the African forests.

Du Chaillu was a prolific writer having compiled extensive notes about his expeditions. He wrote his second book in 1865, A Journey to Ashango-land, and further penetration into Equatorial Africa. While in Ashango Land in 1865, he was elected King of the Apingi tribe. He spent five years (1867-1871) writing an exciting series of adventure books for young people based on his travels, complete with carefully crafted illustrations. The first two books, Stories of the Gorilla Country and Wild Life Under the Equator, recount various episodes from his years in Africa, including both of his major expeditions as well as his teenage years. His two subsequent books, Lost in the Jungle and My Apingi Kingdom, give a chronological account of his first expedition, and the fifth book, The Country of the Dwarfs, deals exclusively with his ill-fated second expedition.

On a personal note the editor of this newsletter can attest to the exciting nature of du Chaillu's books for young readers. As a junior high school student I read them all. The described imagery was vivid and compelling.

In 1872 du Chaillu embarked on expeditions to northern Sweden, Norway, and Finland which occupied the next three decades ofd his life. In 1903 du Chaillu died in St. Petersburg, Russia. He is interred at Woodlawn Cemetery in Bronx, New York.

"In such a wild country as Africa one does not go far without adventures. The traveler necessarily sees what is strange and wonderful, for every thing is strange."—Paul du Chaillu, Stories of the Gorilla Country



Book Review

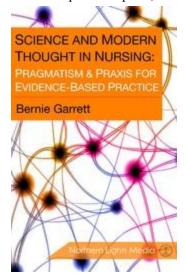
Science and Modern Thought in Nursing: Pragmatism & Praxis for Evidence-Based Practice" (Dr. Bernie Garrett, 2013 – Northern Lights Media)

Reviewed by Peterson Masigan, BSN, RN.

Science and Modern Thought in Nursing explores the current state of Evidence-Based Practice (EBP) as a movement within the nursing profession by looking at science's past and present philosophical evolution. Geared predominately for both nursing students, as well as practicing nurses, the book engages the reader to think about how science and EBP should play a critical role within their practice as nurses. The author takes the reader through a historical survey, introducing historic figures and milestones and their contributions to the scientific movement. Special emphasis on 20th century schools of thought and their proponents are presented, allowing for a robust understanding of the evolution of modern science as we know it today. Important concepts that have shaped scientific inquiry in our present day are explored in detail in subsequent chapters, includ-

ing terms that will be familiar to anyone who has taken a course on research methodologies. Alternative philosophies to empirics-based sciences and their role in EBP are also discussed. Bad science and pseudoscience that exist in our current health care setting is explored, as well as the issues of using intuition for decision-making in health care as opposed to empirics-based science/EBP. Finally, the future of science, EBP, and the nursing profession are discussed, with some helpful tips on how to promote good science within the nursing profession as well as other health disciplines.

The historical survey paints a picture of the philosophical development of science and the EBP movement's eventual uptake within the health disciplines. The tables throughout the book summarize key concepts presented within chapters in a succinct and user-friendly manner. As well, the discussion questions at the end of each chapter serve as a good facilitation tool for educators to stimulate critical discussions for students. I enjoyed the various optical illusion diagrams used in Chapter 8 to illustrate the concepts being discussed – helpful for visual learners like myself. Some passages left me wanting for more information, but the author acknowledges that further discussion of certain concepts is outside the intended scope of the book. However, an extensive reference list is provided at the end of each chapter for



those interested in learning more. Certain chapters of the book (particularly Chapters 3 and 4) have the feel of a philosophy, rather than a nursing text, which could be off-putting to some readers expecting nursing-centered material. There is a flavor of British wit sprinkled throughout the book, which serves to lighten the otherwise dense subject matter covered, and the flow of the book is well organized, making it more approachable as opposed to a typical reference/textbook.

The e-book format will appeal to most students and nurses who prefer using an e-reader, and the price of the book makes it accessible to everyone. Overall, I enjoyed reading this book and feel that it would serve as an excellent primer for upper-level undergraduate nursing students, and as a review reference for graduate students and practicing professionals.

Science and Modern Thought in Nursing is an e-book, available in a variety of formats. It may be obtained for Apple products at the Apple Itunes Store. The Kindle format may be obtained at Amazon.com. This book is distributed in a variety of e-book formats at http://store.kobobooks.com/.



At the Wagner Free Institute of Science

1700 W. Montgomery Ave. Philadelphia, PA 19121 215-763-6529 Tuesday-Friday 9am-4pm http://www.wagnerfreeinstitute.org/

Lectures and other events

Thursday, October 10, 6-8 PM

Philadelphia Lantern Slide Salon

Thursday, October 17, 5:30-7:30 PM

Frogs, Dogs, Birds and Beetle Wings: Whimsical Taxidermy in 19th Century Design

Book release talk and signing with John Whitenight

Saturday, October 19, 12-4 PM

Family Open House - CLAWS: A Spooky Creature Feature Weeknights at the Wagner - Preserving the Final Moment: A

Wednesday, October 30, 6-7:30 PM

Brief History of Embalming in America with Anna Dhody

Friday, November 8, 5:30-8 PM

SAVE THE DATE - A Sip of Science 2013 Benefit Cocktail Party

Thursday, November 21, 6-7:30 PM

Weeknights at the Wagner - Running on Water and Other Secrets of Animal Locomotion with Dr. Tonia Hsieh

Adult Education Course Schedule - Fall 2013 Courses

Natural History from Antiquity to Now, Professor Jane E. Boyd.

7 Wednesdays, September 25 - November 6, 2013, 6:30 - 7:45 PM. Independence Branch of the Free Library, 18 S. 7th Street (between Market and Chestnut). This course will explore the history of natural history in the West, from the philosophers of Ancient Greece to Renaissance explorers to today's specialized scientists.

No preregistration required.

From Death, to Recovery, to Museums: The Curious Lives of Human Remains, Professor Janet Monge.

7 Tuesdays, October 1 - November 12, 2013, 6:30 - 8:00 PM. University of Pennsylvania Museum of Archaeology and Anthropology, 33rd and Spruce Streets. This course will look at changing concepts of death over time and across cultures, and explore ethical questions that have arisen over the use of human remains for scholarship.

No preregistration required.

Birds and Birding, Professor Clifford Hence.

6 Wednesdays, October 2 - November 6, 2013, 6:30 - 7:45 PM. Philadelphia City Institute Branch of the Free Library, 1905 Locust Street. This course will discuss the many unique aspects of birds and their environment. It is designed to provide students with the ability to recognize bird species and identify bird songs and calls.

Wagner Free Institute Adult Education courses are free and open to the public. They are taught at university undergraduate level. There are no prerequisite courses or credentials required to attend, only a mind eager to learn. No preregistration required.

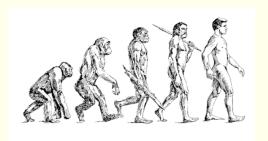
Evolution is one of the two or three

most primally fascinating subjects

(1942 - 2002)

~ Stephen Jay Gould

in all the sciences.



Is Human Evolution **Accelerating?**

by Paul Schlueter III

The December 29, 2012, issue of Science News is not only the year-end review of the 25 biggest science stories of 2012, but it also includes some new information of particular interest to those of us who enjoy Anthropology. Tina Hesman Saey's article, "Human Diversity's Recent Explosion," is especially fascinating. She reports that 81.4% of the genetic variants in European-Americans arose within the last 5,000 years, and that 58.7% of the genetic variants in African-Americans arose during that time frame, as well.

If this new information stands up to review, it constitutes

a very surprising development in genetics. Evolution is thought to operate in one of two fashions: the older view is that it occurs very slowly, in tiny increments, leading to slow and gradual change; the newer view (called "punctuated equilibrium") holds that the genome remains constant for long periods, but then changes dramatically within

relatively short spurts. The new finding reported above seems to support the latter.

A co-author of the main study was Joshua Akey, a geneticist at the University of Washington in Seattle. On November 28, 2013, his team reported in Nature that they had examined more than 15,000 genes in a group of 6,515 people. They found 709,816 variants in Euro-Am subjects, and 643,128 variants in Af-Am subjects. Variants indicate points in the genome where people differ from one another, and it is within reason to expect that Euro-Am and Af-Am subjects would have a similar number of variants overall; these results uphold that expectation. What Hesman Saey does not report (and it may or may not be present within the Nature report) is what percentage of Af-Am variants are also found in the Euro-Am genome. This sensitive subject might have particular importance, due to the fact (however unpleasant) that black slaves were often forced to interbreed with their white owners during some 500 years of America's recent history. Such issues may still be too sensitive for the original study

team to have analyzed.

What is clear, however, is that humanity's recent population explosion (since the approximate time of the pyramidbuilding classical Egyptian culture) has been in part due to our species' much greater reproductive success within formalized civilizations. The two groups studied were geologically handy, but future studies might also analyze the evolutionary rate of populations in India, China, and among Native Americans as well.

It is arguable that the rate of evolutionary change should

be expected to be greatest among groups which tend to travel far and often, and which also tend to form imperialist societies. Such practices would expose more members of the society to "outsiders," and present an unusual rate of intersociety reproduction. Meanwhile, groups which tend to remain within a relatively small geo-

graphical area, socializing primarily among nearby tribal groups, would naturally tend to conserve greater consistency within their regional genome (less variability). European-Americans are descended from people who voluntarily dispersed widely into the Americas, and those same groups previously practiced widespread conquest throughout the world (especially the Old World) for millennia. African-Americans (not considering whatever Euro-Am component their genome contains) would have descended from tribal African societies which largely remained localized, and since being forcibly brought to the Americas, their generally-lower economic status has limited their ability to travel widely or seek societal conquests. This might reasonably explain why they have similar numbers of genetic variants as Euro-Ams, yet have a substantially lower percentage of variants which occurred RECENTLY.

It must be recognized that these quantitative facts do not necessarily have qualitative importance. We are nowhere near the level of genetic understanding needed to begin

guessing whether these hundreds of thousands of variants (in either race) are "better" or "worse" than each other, or than the preceding genomes.

Overall, the species has been so amazingly successful in the last 5K years that we have become the dominant predator of the planet, and even become influential over its ecology and climate. Yet, we also have become the regional success story of the last few hundred years, as we displaced the Native American population and far exceeded their population levels in the North American continent. Worldwide, humanity has struggled with runaway population explosions and economic strife that most Americans cannot even grasp (imagine trying to live on just \$1.00 per day, a standard much of the world is forced to tolerate!) Yes, we have achieved spectacular reproductive success as a species, yet the result of that widespread overpopulation has been the near destruction of much of the natural ecosystem we need to survive the NEXT millennium. Has our success these last 5K years (at least some of which must have been due to genetic advantages within our species) been a boon to the planet, or are we (as many have argued) a blight, driving the world into the next mass extinction phase? Our ability to dominate everything around us appears to have outpaced our ability to discipline our own selves, and in the big picture that has to be considered a failure of evolution; we are the ultimate

"invasive species."

The Science News article included comments from a local geneticist, Sarah Tishkoff at the University of Pennsylvania in Philadelphia. She thinks the U of W study "will give scientists a clearer picture of the stamp the recent population explosion has left on human genes," and it "may help track down variants that affect people's risk of developing common diseases." The latter comment points out one of many ways in which our modern technology and science have taken over much of the role of determining who does (or does not) survive to reproduce, factors which were once primarily determined by the genome directly. Not only did lions, tigers, and bears once help keep our numbers in check, but so did the diseases we are learning to control (and even defeat) with modern medicine. As the science of men overrides the will of the Gods in determining our fate, are we even distorting the very processes of evolution as well?

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Paul Schlueter III is serving Life in Prison in NE Pennsylvania. His supporters have created a website about him. **www.jaylbird.org**

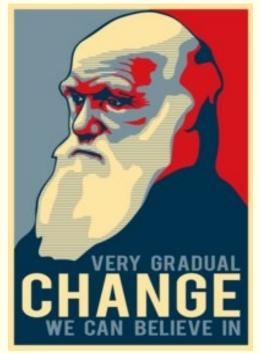
Gradualism and Punctuated Equilibrium

Gradualism and punctuated equilibrium are two ways in which the evolution of a species can occur. A species can evolve by only one of these, or by both. Scientists think that species with a shorter evolu-

tion evolved mostly by punctuated equilibrium, and those with a longer evolution evolved mostly by gradualism.

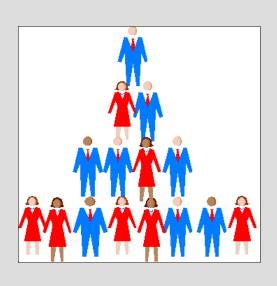
Gradualism is selection and variation that happens more gradually. Over a short period of time it is hard to notice. Small variations that fit an organism slightly better to its environment are selected for: a few more individuals with more of the helpful trait survive, and a few more with less of the helpful trait die. Very gradually, over a long time, the population changes. Change is slow, constant, and consistent.

In punctuated equilibrium, change comes in spurts. There is a period of very little change, and then one or a few huge changes occur, often through mutations in the genes of a few individuals. Mutations are random changes in the DNA that are not inherited from the previous generation, but are passed on to generations that follow. Though mutations are often harmful, the mutations that result in punctuated equilibrium are very helpful to the individuals in their environments. Because these mutations are so different and so helpful to the survival of those that have them, the proportion of individuals in the population who have the mutation/trait and those who don't changes a lot over a very short period of time. The species changes very rapidly over a few generations, then settles down again to a period of little change.



THE MULTILEVEL MARKETING SCHEME

by Paul Schlueter III



In the Jan. 25, 2013, issue of the Week, an excerpt was printed from Businessweek.com, where Karen E. Klein wrote an article about Herbalife and its cadre of salespeople. Klein calls the rank and file of the company its victims; she describes multilevel marketing firms as companies (like Herbalife) who function by getting independent distributors to recruit more salespeople. She has found that 16 million Americans are involved in the broader (\$28.5 Billion per year) industry, and she says that some industry critics claim that as many as 90% of those people either break even or lose money. Because of intensive industry lobbying, she says, the Federal Trade Commission has no regulations governing this industry.

Give or take a finer point of distinction here or there, it's not difficult to recall several other such companies. One which is frequently parodied in film is Mary Kay Cosmetics, the company that rewards its top sellers with a pink Cadillac. Another is Rainbow, a company which was among the first to market a carpet cleaning device operating on vacuum, but which avoided the use of (quickly clogged) paper or cloth filter bags by instead drawing the dirty input air through an enclosed tub of water. I'm sure you could recall one or two more such companies yourself.

The basic business model of such firms is to provide a product with some degree of specialty, "unavailable in stores." Top salespeople are recruited, who are then trained in specific, dogma-like sales spiels. Those people then fan out across the country, each recruiting a small sales team, and then advertising for "workers." Rainbow used to run ads

"Men are so simple and yield so readily to the desires of the moment that he who will trick will always find another who will suffer to be tricked."

Niccolo Machiavelli (1469
 1527), Italian writer and historian)

in the local paper claiming that they were hiring mechanics, janitors, machine operators, drivers, etc. (but notably avoiding the word "salespersons"). Calls would pour in from people struggling to find work, each having marginally-marketable skills. These unemployed (or underemployed) hopefuls would then be called in to a "meeting" where the product was professionally demonstrated by the trained sales team. At some point, carefully avoiding the s-word, the pitch would be made to those in attendance: wouldn't YOU invest your own hard-earned money in such a product? Well, don't you have friends, family, and associates who would ALSO like to purchase our product? YOU could represent us, and

make this product available to your connections, earning a tidy income for yourself in the process!

Well, everything is carefully laid out and arranged. The marvelous product can be had for a mere pittance (perhaps "a dollar a day"), and of course NOT owning such a product is probably hazardous to one's own health and welfare. So, the job-seekers are sorely tempted to purchase themselves a nice demonstrator, which they are then encouraged to go out and show to their connections. They cannot lose, they're assured; even if they don't bring in new "clients," they at least have their own product for their

own personal use.

Oh... and a nice contract, all official and everything, saying that they only owe some 30% to 80% more than a roughly equivalent product is worth, if you bother to carefully seek out such alternatives. What nobody really points out is, there are hundreds, perhaps thousands of other hopeful "representatives" out there, going to all their friends and ac-

quaintances with their own demonstrators, trying to sell one or two to help offset the cost they've just invested in their new sales job. Because the recruitment ads specifically leave out "salespeople," those with actual sales experience and/or talent aren't among the new group recruited; instead, these hapless rookie "representatives" are stuck trying to emulate the slick and practiced sales pitch they themselves received. Small surprise, when they fail miserably.

If a person who answers such an ad is lucky, they've got just enough will power to avoid the initial temptation to sign right up and purchase their own demonstrator at the "meeting." Perhaps they sneak aside to call a friend for advise, and the friend quickly talks them out of the scheme that they've seen others fall easy prey to, previously. The ones who get away without new debt and a dubious product to try to sell might actually be in the majority, but all the regional sales cadre really needed was to sell a few demo models, and they've met their quota for the period. "Victims" who later realize the nature and depth of the mistake they've made are generally too embarrassed to report their mistake to friends and family, so the pool of remaining, unsuspecting potential ad-responders remains mostly untainted.

Of course, the "victim" remains un- or underemployed, and NOW they have additional debt that they really couldn't afford, a product that they probably didn't really need, and their personal self-esteem has just taken a powerful hit.

A few people, after getting suckered into such a scheme, may turn out to discover in themselves a previously-unrecognized talent for sales. If they record good sales numbers, they'll surely be snapped up by the regional sales team and put to work recruiting new rubes; remember, the goal is

to sell the bottom-tier salespeople THEIR personal demo unit and/or initial stock, not to exhaust the local area of potential customers. The sales-rubes themselves will pester and annoy their neighbors and friends more than enough, and before long nobody will open their door to someone marketing the product. See, mass marketing such products successfully requires offering them for just a bit more than they're worth; the scheme behind the multilevel marketing firm is to WAY overcharge for a product, so that multiple levels of regional sales supervisors can all make a living on the desperate hopes of all their new recruits. A straight customer seeks the best bargain he can get, while an unsophisticated sales-rube is too busy imagining the piles of profit he's going to make later on! Any con man can tell you, his best advantage is his mark's own greed.

Klein, more generously than I do, says that such companies prosper because what they're really selling is hope, and that's a product their sales-rubes are willing to pay for. And, as she points out, nothing about such schemes is illegal.

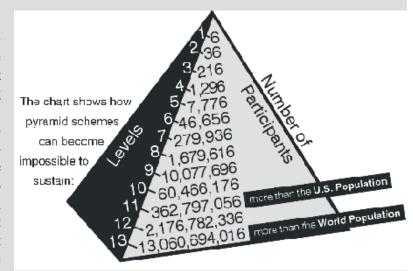
Still, as critical thinkers, isn't it our responsibility to spread the word about such schemes (c'mon, let's call them what they are: scams), so that OUR friends and family, OUR personal connections, aren't swept up in the next big campaign to push some slick product on desperate people trying to make ends meet? We should discuss such things widely and routinely, so that the next rube has a chance of recognizing the multilevel marketing pitch when he hears one, and can duck out before signing on the dotted line.

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Pyramid Schemes

In the classic "pyramid" scheme, participants attempt to make money solely by recruiting new participants into the program. The hallmark of these schemes is the promise of sky-high returns in a short period of time for doing nothing other than handing over your money and getting others to do the same.

The fraudsters behind a pyramid scheme may go to great lengths to make the program look like a legitimate multi-level marketing program. But despite their claims to have legitimate products or services to sell, these fraudsters simply use money coming in from new recruits to pay off early stage investors. But eventually the pyramid will collapse. At some point the schemes get too big, the promoter cannot raise enough money from new investors to pay earlier in-



vestors, and many people lose their money. The chart to the right shows how pyramid schemes can become impossible to sustain.

PHACT CALENDAR

PhACT Events

Dr. David Cattell, Chairman of the Physics Department of Community College of Philadelphia hosts meetings of PhACT - at 2:00 PM on the third Saturday of most months at Community College of Philadelphia..., Parking is easily available and costs \$4.00 for all day. Enter the college parking lot on 17th Street which is one way south bound. This meeting site is handicap accessible. PhACT Meetings are Free and open to the public unless otherwise noted.

Saturday, October 19, 2013 at 2:00 PM - Dr. Paul Offit. Chief of the Division of Infectious Diseases and the Director of the Vaccine Education Center at the Children's Hospital of Philadelphia, will discuss his new book,: "Do You Believe in Magic?: The Sense and Nonsense of Alternative Medicine". Book signing will follow. See page 7 for more details.

Saturday, November 16, 2013 at 2:00 PM - Professor Dave Goldberg of Drexel University will discuss "Why Symmetry Matters" a description of the beautiful simplicity of the universe.

Saturday, January 18, 2014 at 2:00 PM - T.B.A.

The **PhACT Calendar** is open to members and non-members who wish to announce meetings and events of other groups of which they are interested or affiliated. These events should be of some general interest to the Skeptical or Scientific community and should be within a reasonable radius of Philadelphia. Send submissions to the editor at *phactpublic-ity@aol.com*. Keep the announcements brief. Space is limited and insertions will be made on a first come-first served basis after the needs of PhACT are accomplished. Phactum does not accept paid advertising.



The Philadelphia Area Center for the History of Science (PACHS) maintains an extensive calendar of events about the history of science, technology and medicine that may contain some interesting events not listed in the Phactum Calendar. Check out their website at:

http://www.pachs.net/events

Monday, October 14, 2013 at 6:00 p.m at National Mechanics, 22 S. Third Street, Philadelphia, PA 19106

Science on Tap

A monthly gathering that features a brief, informal presentation by a scientist or other expert followed by lively conversation. Good food and beer.

This month's Science of Tap is brought to you by the Mutter Museum at the College of Physicians of Philadelphia.

Must be 21 or accompanied by parent. Free and open to the Public. http://scienceontapphilly.com/

Tuesday, October 15, 2013 at 12:00 to 1:00 p.m. at the Chemical Heritage Foundation, 315 Chestnut Street, Philadelphia, PA 19106 Tel: 215-925-2222 • http://www.chemheritage.org

Brown Bag Lecture: Whither the History, Whither the Future of Chemical Information?

A talk by Leah McEwen

Open to the Public. Free. No Registration Required

Tuesday, October 15, 2013 at 7:30PM at 7:30PM at the Free Library of Philadelphia, 1901 Vine Street, 19103

http://libwww.freelibrary.org/authorevents/

Ben Urwand | The Collaboration: Hollywood's Pact with Hitler

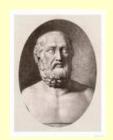
In The Collaboration: Hollywood's Pact with Hitler, Ben Urwand, a Junior Fellow of the Society of Fellows at Harvard University, draws upon a raft of secret documents uncovered at archives in Berlin and Washington, D.C., to reveal how Hollywood studios actively cooperated with the Third Reich's global propaganda effort. In order to assure a stronghold in the profitable German film market, scripts were abandoned or severely cut to suit Nazi officials. The creative partnership between the Nazis and Hollywood only deepened throughout the 1930s: Paramount and 20th Century Fox produced newsreels in Germany depicting major Nazi events, and MGM invested in the production of German armaments immediately before World War II.

FREE. No tickets required. For Info: 215-567-4341

Wednesday, October 16, 2013 at 12 noon-1pm at College of Physicians of Philadelphia, 19 South Twenty-Second Street, Philadelphia, PA 19103

http://www.collphyphil.org/prog calendar.htm

SOCRATES CAFE is moderated by: Lewis Mifsud, Ph.D., P.E., a member of PhACT and of The American Academy of Forensic Sciences. At 7:00 PM every Monday evening except holidays (on Tuesdays after a Monday holiday) at the Springfield Township Public Library (215-836-5300) at 1600 Papermill Mill Road, Wyndmoor, PA. 19038. This philosophical discussions group is free and open to the public. Join us



and share your critical thinking, questions and opinions.

Food & Thought: "What's (Not) New in Antibiotics and Why."

Public health authorities have been warning about increased antibiotic resistance as a potentially explosive medical problem in the near future. The elements that contribute to this risk -- heroic treatments that suppress natural immunity, increased longevity and natural selection of bacteria to survive under adverse conditions -- are all in place. But one of the biggest concerns is the dramatic slowdown in the development of new therapeutic products to treat resistant bacterial infections. This presentation outlines the magnitude of the problem and provides clear, if not comforting, explanations for this situation.

Speaker: Thomas Fekete, MD, Professor and Vice-Chair of Medicine and Chief, Section of Infectious Diseases, Temple University School of Medicine.

Pre-registration for all programs and events is strongly urged. For further information regarding events and registration, please e-mail **info@collegeofphysicians.org** or call 215-399-2341.

Wednesday, October 16, 2013 at 5:00 - 6:30 pm at University of Pennsylvania Museum, 3260 South Street, Philadelphia, PA 19104

http://www.penn.museum/events-calendar

Penn Humanities Forum event Indian Untouchability

Untouchability has been called India's hidden apartheid. A political scientist and specialist in conflict resolution and social movements, Christian Davenport discusses a remarkable recent collaboration that involved a children's book, a board game, and an art exhibition, and that aimed to shed light on Indian untouchability.

Free and open to the public. Pre-registration required.

Thursday, October 17, 2013 at 5:30 PM at the Wagner Free Institute of Science, 1700 West Montgomery Avenue, , Philadelphia, PA 19121 ph 215-763-6529 www.wagnerfreeinstitute.org

Frogs, Dogs, Birds and Beetle Wings:

Whimsical Taxidermy in 19th Century Design

An illustrated presentation and book release

by author John Whitenight

5:30 - 6:30 PM presentation

6:30 - 7:30 PM book signing

Victorian design is often characterized as prim and straight-laced but this period also produced objects of great imagination and whimsy--a kitten's wedding, frogs playing pool, stuffed pets and ball gowns adorned with beetle wings.

Please join us for a special evening with author, artist and connoisseur

A New Reading Circle: The Institute for Religion and Science.

Our Reading Circle is meeting from 6:30 pm – 8:00 pm beginning in November on the second Monday of the month in the William Walker Room of the Logue Library to discuss **Ilia Delio's** *The Emergent Christ*. If you are interested in joining us, please contact us at **Institute4RS@chc.edu**

See website: www.irands.org

of all things Victorian, John Whitenight, who will explore a lighter side of Victorian taxidermy. Whether it was the anthropomorphic creatures of Hermann Plocquet and Walter Potter or jewelry crafted from hummingbirds, no other era has embraced the natural world in such a creative manner.

John's talk will include rarely seen images from his extensive research on Victorian decorative arts, many featured in his new book Under Glass, A Victorian Obsession. This presentation, a part of Design Philadelphia, will take place in Wagner's preserved 19th century lecture hall and show a rare side of Victorian taxidermy--one you don't often find in a natural history museum. This event is Free and open to the Public.

Please register at: http://whimsicaltaxidermy.eventbrite.com/

Thursday October 17, 2013; Friday October 18; and Saturday October 19 at Laurel Hill Cemetery, 3822 Ridge Avenue, Philadelphia, PA19132. 215-228-8200

http://www.thelaurelhillcemetery.org

Spirits on the Stage: Our Residents Speak

Whether a lover of theater or a lover of history, Laurel Hill Cemetery has something for you this Halloween season!

The "Not Ready for Afterlife Players" have portrayed Laurel Hill's most restless spirits in the cemetery's annual Halloween tours for the past twelve years. In



2013, however, the Players will move to center stage for separate theatrical performances. From a founder of the cemetery whose reputation was stained by scandal; to a murderer and his victim buried just yards apart; to a general who deserted his country for love, Spirits on the Stage will feature nearly a dozen of the cemetery's most provocative and memorable permanent residents, as they return from the dead to tell their stories. The evening performances will be staged deep amid the storied stones and haunting histories of Laurel Hill Cemetery's grounds, and will be punctuated by poignant period music. Please bring your own blankets, beach chairs, snacks, and/or beverages.

Three performances of Spirits on the Stage: Our Residents Speak are scheduled at Laurel Hill Cemetery: Thursday October 17; Friday October 18; and Saturday October 19. All performances begin at 7:00pm.

The cost is \$20/person general admission. Reservations are requested by phone (215) 228-8200 or email info@thelaurelhillcemetery.org. Tickets can be purchased at the door, or online.

Upon arrival, register at Laurel Hill Cemetery's Gatehouse entrance, 3822 Ridge Avenue, Philadelphia, PA 19132. Free parking is located in the lot directly across the street from the Gatehouse.

Director: Larry Arrigale

Saturday, October 19, 2013 at 10:00 AM to 4:00 PM at The 1696 Thomas Massey House, Lawrence Road at Springhouse Road, Broomall, PA 19008 610-353-3644

Harvest Fair. 18th Century Historian **Clarissa Dillon, Ph.D**. will be on hand a guide/botanist in the 18th century garden, encouraging visitors to weed and harvest.

http://www.thomasmasseyhouse.org/aboutus.html

Saturday, October 19, 2013 at 10am-5pm at College of Physicians of Philadelphia, 19 South Twenty-Second Street, Philadelphia, PA 19103 http://www.collphyphil.org/prog_calendar.htm Civil War Hospital Day

During the Civil War (1861-1865), Philadelphia became the second largest hospital city (after Washington, DC) in the North. Ambulances and carts transferred wounded soldiers from arriving trains and ships to hospitals in and around the city. Blue uniforms were seen on every street: many military encampments surrounded Philadelphia. Troops paraded through streets on their way to war.

The College of Physicians of Philadelphia will evoke the atmosphere of medical wartime Philadelphia during the war years on Hospital Day. At

the College, museum visitors will find a garrison of soldiers from the 3rd Regiment, United States Colored Troops. The presence of these soldiers highlights their history and connection to Camp William Penn, the first and largest training center for United States Colored Troops during the war, located just north of Philadelphia. Hospital Day will highlight the extraordinary contribution and experience of black soldiers during the war by focusing on their health and mortality. Several medical re-enactors, both men and women, will present displays about the wounds and diseases afflicting all soldiers, and their treatment. The Medicinal Plant Garden at the College will be set up as a temporary hospital.

Visit with the soldiers and the nurses and physicians who looked after them. Learn about the medicines used and techniques of surgery for battle wounds from re-enactors and the College's Karabots Junior Fellows. Discover what hospitals were like. Support the troops! Find out if you have what it takes to be a Civil War soldier—or a doctor!

This educational event will serve as an addition to the new Mütter Museum exhibit about the medical dimension of the Civil War, Broken Bodies Suffering Spirits: Injury, Death, and Healing in Civil War Philadelphia.

Event free with Museum admission.

Sponsored by the Mütter Museum of The College of Physicians of Philadelphia.

PhACT Event

Saturday, October 19, 2013 at 2:00 PM

Dr. Paul Offit will discuss his new book,: "Do You Believe in Magic?: The Sense and Nonsense of Alternative Medicine".

See page 1 for more details.

Saturday, October 19, 2013 at 3:30 pm at University of Pennsylvania Museum, 3260 South Street, Philadelphia, PA 19104 http://www.penn.museum/events-calendar

Afternoon Lecture

The Millionaire and the Mummies: Theodore Davis's Gilded Age in the Valley of the Kings

In this lecture, John M. Adams, American Research Center in Egypt, speaks about Theodore Davis, one of the most famous names in archaeology at the start of the 20th century. Davis was a poor country preacher's son who won great wealth in Gilded Age New York through corruption and fraud, only to atone for his ruthless career by inventing new standards for systematic excavation, and by discovering a record 18 tombs in Egypt's Valley of the Kings. Sponsored by the American Research Center in Egypt - Pennsylvania Chapter. Admission: \$8, general public; \$5, Penn Museum members and PennCard holders; free for ARCE-PA members.

Sunday, October 20, 2013 at 2:00 pm at University of Pennsylvania Museum, 3260 South Street, Philadelphia, PA 19104

http://www.penn.museum/events-calendar

Pompeii Lecture Series

Mount Vesuvius in Human History

The Pompeii Lecture Series, presented in conjunction with the Franklin Institute's new "A Day in Pompeii" exhibition, kicks off with this talk by Dr. Robert Giegengack, Department of Earth and Environmental Sciences. Mount Vesuvius is the most active volcano in Europe and the Mediterranean; its explosive eruption in 79 CE produced a cloud of heated dust and gases that killed about 16,000 people in Pompeii, Herculaneum,



Lithograph of Pompeii and Vesuvius (public domain image).

and the adjacent countryside. In this lecture, Dr. Giegengack discusses the history and science surrounding the eruptions of Vesuvius and other volcanoes in the Calabrian Arc. Admission: \$10, general public; \$5, Penn Museum members and Franklin Institute members.

Sunday, October 20, beginning promptly at 1:00pm at Laurel Hill Cemetery, 3822 Ridge Avenue, Philadelphia, PA19132. 215-228-8200 http://www.thelaurelhillcemetery.org

Singing in the Cemetery:

Kids' Concert and Family Fun

Stay tuned! Details coming soon.

The program will take place on Sunday, October 20, beginning promptly at 1:00pm and concluding at 3:00pm. Visitors may enter via Laurel Hill Cemetery's Gatehouse entrance at 3822 Ridge Avenue, Philadelphia, PA 19132. Free parking is located in the lot across the street from the Gatehouse.

The cost is \$5/person general admission. Tickets can be purchased at the door, or in advance by phone (215) 228-8200 or online.

Sunday, October 20, 2013 at 2:00 pm at St. Paul's Episcopal Church, 22 E. Chestnut Hill Avenue, Philadelphia, PA 19118

The Institute for Religion and Science: http://www.irands.org

Proof of Heaven: A Neurosurgeon's Journey into the Afterlife

Eben Alexander, MD

Harvard Medical School

A donation of \$10 is suggested. For more information, contact The Very Reverend E. Clifford Cutler 215-242-2055 cculter@stpaulschestnuthill.org

Tuesday, October 22, 2013 at 12:00 to 1:00 p.m. at the Chemical Heritage Foundation, 315 Chestnut Street, Philadelphia, PA 19106

Tel: 215-925-2222 • http://www.chemheritage.org

Brown Bag Lecture: Chemical Freshness, Chemical Fetish: On Toxicity and the "New Car Smell"

A talk by Nick Shapiro

Open to the Public. Free. No Registration Required

Tuesday, October 22, 2013 at 7:30PM at the Free Library of Philadelphia, 1901 Vine Street, 19103

http://libwww.freelibrary.org/authorevents/

Simon Winchester | The Men Who United the States: America's Explorers, Inventors, Eccentrics and Mavericks, and the Creation of One Nation,

Acclaimed author Simon Winchester follows in the footsteps of the explorers, thinkers, and innovators who helped forge and unify the citizens and geography of the United States in his new book The Men Who United the States. Made an officer of the Order of the British Empire by the Queen in 2006, Winchester explores topics from the urbane to the catastrophic in his New York Times bestselling nonfiction books, which include The Professor and the Madman, Krakatoa, and The Man Who Loved China. His writing also appears in National Geographic and Smithsonian magazine.

Pine Tree Foundation Endowed Lecture Cost: \$15 General Admission, \$7 Students

http://libwww.freelibrary.org/authorevents/tickets.cfm

Thursday October 24, 2013 at 6:30 PM-10:00 PM at The Academy of Natural Sciences, 1900 Benjamin Franklin Parkway, Philadelphia, PA 19103 www.ansp.org 215-299-1108

Mega-Bad Movie Night: Them

Join us at the Academy after hours to watch some "awesomely awful" movies. The Academy's own experts will be onstage to comment on the

many scientific absurdities—think Mystery Science Theater 3000!

In this edition of Mega-Bad Movie Night, we will be showing Them, the 1954 cult classic about giant man-eating ants.

In addition to the movie, Mega-Bad Movie Nights include cash bar and snacks, a sampling of the Academy's specimens, live animals, and the opportunity to wander among the exhibits including Butterflies!

You must be 18+ years of age to attend these events (and 21+ to drink).

To buy tickets: http://mbmnthem.eventbrite.com/



http://www.thelaurelhillcemetery.org MONTHLY FOURTH FRIDAY TOUR SERIES:

HOT SPOTS and STORIED PLOTS

Join Laurel Hill Cemetery for this informative overview of Laurel Hill's long and colorful history, which will include many of the marble masterpieces, stunning views and legendary stories that afford the cemetery its WOW factor. This is the perfect tour for first-time visitors to



Laurel Hill, and anyone else who enjoys beautiful art, scenic nature and fascinating history. BRAND NEW "Hot Spots and Storied Plots" will be presented monthly as part of Laurel Hill Cemetery's Fourth Friday tour series, which take place on the fourth Friday of every month at 10:00am.

October's walking tour will take place on Friday,October 25 at 10:00am, departing from Laurel Hill Cemetery's Gatehouse entrance at

3822 Ridge Avenue, Philadelphia, PA 19132. Free parking is located in the lot across the street from the Gatehouse.

The cost is \$8/person general admission; \$5/members. Tickets can be purchased at the door, or in advance by phone (215) 228-8200 or online. Guide: Russ Dodge

Friday October 25, 2013 at 7pm; and Wednesday October 30 at 6:00pm at Laurel Hill Cemetery, 3822 Ridge Avenue, Philadelphia, PA19132. 215-228-8200

http://www.thelaurelhillcemetery.org

Soul Crawl: Haunted History Halloween Tours

The weekend following the theatrical performances, Laurel Hill will resurrect its annual Halloween flashlight tours of yore. No longer featuring the actors, the program will return to its roots as extended nighttime walking tours of the cemetery, focusing on its rich history, and covering its enchanting art and landscape. Tours will last approximately two hours, and will be followed by complimentary cookies and cider aside blazing fire

Three evenings of the Soul Crawl: Haunted History Halloween Tours are scheduled at Laurel Hill: Friday October 25 at 7pm; and Wednesday October 30 at 6:00pm.

The cost is \$20/person general admission. Reservations are requested by phone (215) 228-8200 or email info@thelaurelhillcemetery.org. Tickets can be purchased at the door, or online.

Upon arrival, register at Laurel Hill Cemetery's Gatehouse entrance, 3822 Ridge Avenue, Philadelphia, PA 19132. Free parking is located in the lot directly across the street from the Gatehouse.

Saturday, October 26, 2013 at 9:30 AM to 2:30 PM at The 1696 Thomas Massey House, Lawrence Road at Springhouse Road, Broomall, PA 19008 610-353-3644

18th Century Historian Clarissa Dillon, Ph.D. will present a Hands-on Cooking Workshop: Preparing an Autumn Meal in the 18th Century colonial style. Reservations are required. Cost is \$35.00. Call Clarissa at 610-642-4269 for reservations and more information. http://www.thomasmasseyhouse.org/aboutus.html

Saturday, October 26, 2013 at 2:00 pm at University of Pennsylvania Museum, 3260 South Street, Philadelphia, PA 19104

http://www.penn.museum/events-calendar

Panel Discussion— Women in the Civil War

The American Civil War reached beyond the battlefields to affect the life of every American citizen. In this panel discussion, three scholars discuss the effects of the war on American women in both the North and South—touching on the lives of free black women in the Union, alienated white women in the Confederacy, and women laborers who fought for a fair wage. With the men away, women were forced to enter civil society—to do the farming, the accounting, work in industry, and fend for themselves, including rioting and raiding government warehouses to feed their starving children. The Women's Movement had begun within the Anti-Slavery Societies, but the Civil War set in motion a movement that could not be stopped. Free admission

Sunday, October 27, 2013 at 11:30 AM to 4:00 PM at The 1696 Thomas Massey House, Lawrence Road at Springhouse Road, Broomall, PA 19008 610-353-3644

Closing Day for the season. 18th Century Historian Clarissa Dillon, Ph.D. will be cooking on the 18th century hearth. Venison is on the menu. http://www.thomasmasseyhouse.org/aboutus.html

Sunday, October 27, 2013, 9:15 am – 10:20 am at St. Paul's Episcopal Church, 22 E. Chestnut Hill Avenue,

Philadelphia, PA 19118

The Institute for Religion and Science - http://www.irands.org

Teilhard's Mysticism: Seeing the Inner Face of Evolution

Kathleen Duffy, SSJ, PhD

Professor of Physics, Chestnut Hill College

This event is open to the public.

Tuesday, October 29, 2013 at 12:00 to 1:00 p.m. at the Chemical Heritage Foundation, 315 Chestnut Street, Philadelphia, PA 19106

Tel: 215-925-2222 • http://www.chemheritage.org

Brown Bag Lecture: Rationalizing Drug Discovery? The Early History of Antimetabolites (1940–1960)

A talk by Thibaut Serviant-Fine

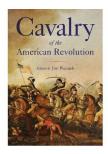
Open to the Public. Free. No Registration Required

Wednesday October 30, 2013, at 7:00 PM. at Saint Peter's Lutheran Church, 3025 Church Road, Lafayette Hill, Pennsylvania, 19444. American Revolution Round Table of Philadelphia. Location to be determined. Check website.

Jim Piecuch will be discussing his book, Cavalry of the American Revolution.

ARRTOP events are Free and Open to the Public.

http://arrtop.com



Wednesday, October 30, 2013 - 5:30pm to 7:30pm at the American Philosophical Society, Benjamin Franklin Hall, 427 Chestnut Street, Philadelphia http://www.amphilsoc.org/

On Paper: The Everything of Its Two-Thousand-Year History by Nicholas Basbanes

Lecture, Reception, and Book Signing

Nicholas Andrew Basbanes has written a thoroughgoing chronicle about the stuff books are traditionally made of: paper. He starts with its invention in China 1800 years ago, considers its use for everything from currency to the blueprints that facilitated the Industrial Revolution, and records a visit to the National Security Agency, where 100 million secret documents have been pulped and recycled as pizza boxes.

Free. To register: http://www.amphilsoc.org/node/1841

Wednesday, October 30, 2013 at 6-7:30 PM at the Wagner Free Institute of Science, 1700 West Montgomery Avenue, Philadelphia, PA 19121

ph 215-763-6529 www.wagnerfreeinstitute.org

Weeknights at the Wagner

Preserving the Final Moment: A Brief History of Embalming in America with Anna Dhody

Wednesday, October 30, at 6:30 pm at College of Physicians of Philadelphia, 19 South Twenty-Second Street, Philadelphia, PA 19103 http://www.collphyphil.org/prog_calendar.htm

Grover Silcox's "Edgar Allan Poe and the Flip Side of Comedy"

It's hilarious, tragic, wild, and right at home at The College of Physicians of Philadelphia and the Mütter Museum. Local comic legend Grover Silcox returns for a mischief night of bawdy, Victorian laughs in his oneman show of the poetry, drama and irony of Edgar Allen Poe.

Free to Members; Non-Members \$10

Pre-registration for all programs and events is strongly urged. For further information regarding events and registration, please e-mail **info@collegeofphysicians.org** or call 215-399-2341.

Saturday, November 2, 2013 | All Day at College of Physicians of Philadelphia, 19 South Twenty-Second Street, Philadelphia, PA 19103 http://www.collphyphil.org/prog_calendar.htm

The Mütter Museum's Annual Day of the Dead Festival

Come celebrate this traditional Mexican holiday with an all-day event at the Mütter Museum! Decorate sugar skulls, enjoy traditional food and drink, visit the Museum, and come to a presentation by speaker Linda J. Lee entitled "Raising the Dead in Fairy Tales."

Speaker: Linda J. Lee, co-curator of the Grimms' Anatomy exhibit at the Mütter Museum and professor of humanities, folklore, literature, and writing at area universities, including Penn, Temple, Philadelphia University, and University of the Arts.

Sponsored by the Mütter Museum of The College of Physicians of Philadelphia.

Included with regular museum admission.

Sunday, November 3, 2013 at 1:00pm at Laurel Hill Cemetery, 3822 Ridge Avenue, Philadelphia, PA19132. 215-228-8200

http://www.thelaurelhillcemetery.org

Crooked Cronies:

Philadelphia's Profiteering Politicians of the Past

Lincoln Steffens notoriously described 19th century Philadelphia as "corrupt and contented." Yes, the city has its rogues and rascals, but it also had reformers. We will visit the grave of the Philadelphia patrician who realized that only a political boss could hold the unruly city together and then set out to become that boss. We will stand at the burial place of the Congressman who would have had one the largest monuments in Laurel Hill Cemetery if the treasurer of his memorial committee hadn't run off with the funds. And, we will remember the scholarly historian who organized the predecessor to our modern-day Committee of Seventy.

Don't despair. If party politics was basically a fight between boys' clubs, Philadelphia women were active on a broad social front. We won't forget the ladies who opposed segregation on street cars, established model tenements, and fought for a safer food supply.

The cost is \$12/person; or \$10/students and seniors. Reservations are suggested. Tickets can be purchased at the door, or in advance by phone (215) 228-8200 or online.

Guide: Michael Brooks, Ph.D.

Tuesday, November 5, 2013 at 12:00 to 1:00 p.m. at the Chemical Heritage Foundation, 315 Chestnut Street, Philadelphia, PA 19106

Tel: 215-925-2222 • http://www.chemheritage.org

Brown Bag Lecture: "Thomas Wijck's Painted Alchemists at the Intersection of Art, Science, and Practice"

A talk by Elisabeth Berry-Drago

Open to the Public. Free. No Registration Required



Calling All Astronomers! Rittenhouse Astronomical Society

Monthly Meetings! Bring all of your out-of this-world questions! Join The Rittenhouse

Astronomical Society the second Wednesday of each month at 7:30 p.m. in the Fels Planetarium at the Franklin Institute. The society offers all persons an opportunity to participate in the activities of an astronomical group at the laymen's level. They aim to spread knowledge, awareness and enjoyment of astronomy and astronomical issues. It is a popular science club that keeps its members up-to-date on the latest developments. No experience is necessary to attend the FREE meetings. Come with your astronomy questions!

www.rittenhouseastronomicalsociety.org/

Tuesday, November 5, 2013 at 7:00 PM at Washington Memorial Chapel, on Route 23 in Valley Forge.

Friends of Valley Forge Park

The Forging of American Independence, 1774-1776

Historian and author Richard R. Beeman retells the remarkable story of how a divided Continental Congress united for freedom.

A reception will follow.

http://www.friendsofvalleyforge.org/speaker-series.shtml

Free and Open to the Public.

Wednesday, November 6, 2013 at 7:00 PM at Frankford Hall on Frankford Avenue just north of Girard Avenue.

Philadelphia Nerd Nite ... be there and be square, yo.

Science discussions, good food, good company, and plenty of beer!

For more information see the website at

http://philadelphia.nerdnite.com/updates/

The next Nerd Nite is Wednesday, December 4, 2013.

Open to the Public. Admission \$5.00 Email us at: nerdnitephilly@gmail.com

Wednesday, November 6, 2013 at 2:00 pm at University of Pennsylvania Museum, 3260 South Street, Philadelphia, PA 19104

http://www.penn.museum/events-calendar

"Great Voyages" Lecture

Ignacio Gallup-Diaz, Associate Professor, History, Bryn Mawr College Ferdinand Magellan, 'Our One True Guide': The First Circumnavigation of the Globe, 1519—1522

Magellan's circumnavigation was a complex event—a feat of navigation and exploration that also saw hardship, shipwreck, and mutiny visited upon the expedition's crew. In a process that would become paradigmatic, Europeans found themselves enmeshed in regional and local politics—a causative element in Magellan's death. Dr. Gallup-Diaz examines the varied and interconnected maritime, cultural, and political factors that came together during Magellan's circumnavigation. Sign up for a series subscription and save: \$40, general public; \$15, Penn Museum members. Individual lecture with advance registration: \$5, general public; \$2, Penn Museum members; \$10 at the door based on availability. Free for students with college ID.

Register: https://446.blackbaudhosting.com/446/

Friday, November 8, 2013 at 5:30-8 PM at the Wagner Free Institute of Science, 1700 West Montgomery Avenue, Philadelphia, PA 19121

ph 215-763-6529 www.wagnerfreeinstitute.org

SAVE THE DATE - A Sip of Science 2013 Benefit Cocktail Party

Saturday, November 9, 2013 at 1:00pm at Laurel Hill Cemetery, 3822 Ridge Avenue, Philadelphia, PA19132. 215-228-8200

http://www.thelaurelhillcemetery.org

From Sails to Steel:

Shipbuilders of Philadelphia

Philadelphia was a vital center of American shipbuilding in the 19th century and produced a broad variety of vessel types, from passenger liners to battleships. Every aspect of shipbuilding is represented by one or more of the souls at rest in Laurel Hill Cemetery, from engines to ropes, from wharfs to hulls, and from wood to steel. You're invited to learn the mythic stories of Philadelphia's martime history in this autumn afternoon walking tour.

The cost is \$12/person; or \$10/students and seniors. Reservations are suggested. Tickets can be purchased at the door, or in advance by phone (215) 228-8200 or online.

Guides: Daniel M. Dailey and Ken Milano

Sunday, November 10, 2013 at 11:00 am at Laurel Hill Cemetery, 3822 Ridge Avenue, Philadelphia, PA19132. 215-228-8200

http://www.thelaurelhillcemetery.org

Marine Corps Anniversary Service and KIA Veterans' Day Tour

Join active and retired members of the United States Marine Corps at Laurel Hill Cemetery as they commemorate the 238th anniversary of the founding of the Marine Corps in Philadelphia on November 10, 1775. A service will take place at the gravesite of Brigadier General Jacob A. Zeilin, the first United States Marine non-brevet general, who served as the seventh Commandant of the Corps from 1864 to 1876. After the service, the Cemetery will mark Veterans' Day with a tour of the final resting places of the heroes who made the ultimate sacrifice for our country. Learn about the people who died in battle in the Revolutionary War, the Indian Wars, the War of 1812, the Mexican War, the Civil War, the Spanish American War, World War I, World War II, in Korea, and in Vietnam. Their heroic exploits will be relived and honored.

The service and tour will take place on Sunday, November 10 at 11:00pm, departing from Laurel Hill Cemetery's Gatehouse entrance at 3822 Ridge Avenue, Philadelphia, PA 19132. Free parking is located in the lot across the street from the Gatehouse.

Free and open to the public.

Guide: Anthony Waskie, Ph.D.

Monday, November 11, 2013 at 6:00 p.m at National Mechanics, 22 S. Third Street, Philadelphia, PA 19106 Science on Tap

A monthly gathering that features a brief, informal presentation by a scientist or other expert followed by lively conversation. Good food and beer

This month's Science of Tap is brought to you by the Chemical Heritage Foundation.

Must be 21 or accompanied by parent. Free and open to the Public. http://scienceontapphilly.com/

PhACT Event

Saturday, November 16, 2013 - at 2:00 PM

Professor Dave Goldberg of Drexel University will discuss

"Why Symmetry Matters"
a description of the beautiful simplicity
of the universe

See page 1 for more details.

* *	Γ and would like to join/rejoin for the next year. The ides e-mail delivery of Phactum.	annual membership is \$15 and
If you wish US Mail deliver	ry annual membership is \$25. Checks should be pa	yable to PhACT .
membership.	enclosed to pay for years of	Mail checks to: PhACT
Donation of \$	enclosed for additional support	653 Garden Road
Donation of \$	dedicated for High School Science Fair prizes	Glenside, PA 19038
Name:		
Address:		
Phone:	E_mail	

The Philadelphia Association for Critical Thinking is grateful for the hospitality extended by Community College of Philadelphia and especially Dr. David Cattell, Chair of the Physics Department, for hosting PhACT and giving us access to such excellent facilities. Part of CCP's mission is to serve Philadelphia as a premiere learning institution and PhACT is pleased to support this goal by having talks on wide ranging, engaging, and educational topics. Students and faculty are invited to be active participants in our activities.

The PhACT Council 2012/13

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The PhACT website is: www.phact.org

Phactum is, in theory, distributed 6 times a year and is the main propaganda organ for the Philadelphia Association for Critical Thinking.

If you are not a supporting member/subscriber we invite you to become one. \$15 for a one year membership to PhACT with email Phactum subscription. \$25 for US Mail subscription. Donations are welcome.

Send letters of rebuttal, ideas, short essays, poetry, opinion pieces, complaints, and lavish praise to Ray Haupt, Phactum editor, at phactpublicity@aol.com.

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Phactum Editor, Ray Haupt phactpublicity@aol.com

"Nothing more strikingly betrays the credulity of mankind than medicine. Quackery is a thing universal, and universally successful. In this case it becomes literally true that no imposition is too great for the credulity of men."

~ Henry David Thoreau (1817 - 1862)