

Back to Real Science! The Incompetence of Twentieth-Century Science Education

by Lyndon H. LaRouche, Jr.

March 28, 2014

[Published in Executive Intelligence Review, Volume 41, Number 17, April 25, 2014. View <u>PDF of original</u> at the LaRouche Library.]

A great, and largely continuing catastrophe for all modern science throughout the world, had begun, in Paris, France, since the opening of the Twentieth Century. It had been launched by a scientifically weak-minded David Hilbert, delivered from the platform of that Year 1900's **International Mathematical Congress**, held in Paris at that time.

The foolish Hilbert had abandoned, and implicitly rejected, all actual physical science. He had done that for the sake of a silly pursuit of a merely mathematics program, without any actual physical science, thus abandoning, and implicitly outlawing all competent progress in physical science. From that time onwards, trans-Atlantic science has been, and that chiefly increasingly so, an often, actually criminal farce, perpetrated against the very name of a polluted, mere caricature of actual science, a fraud conducted in the favor of what was, to repeat, "merely mathematics."

The travesty which had begun with David Hilbert's particular hoax, had launched that year of sheer evils, 1900 A.D. This was, then, soon to be followed by Hilbert's, far more evil successor, indeed, the most evil man of the Twentieth Century (and beyond), Bertrand Russell. Unfortunately, the teaching and practice of the underlying, morally wretched principles of practiced attempts at mere mathematics, have, since, tended to persist, as still presently, as a demanded replacement, in high schools and universities, that for nearly all, but a dwindling handful of true geniuses, which have survived to have been engaged in truly competent modern science, still presently.

What the unfortunate Hilbert had already done to this effect, had, thus, become, soon, a greatly worsened product, then, but even still later, all that at an accelerated rate. This offense against the forward progress of human nature itself, has been worsened, since that

¹ Since the cancellation of President Franklin Roosevelt's Glass-Steagall law.

time, by the added evil of a dominant role of the increasing trend toward incompetence in generally practiced methods of what is often only merely taught as so-called science (increasingly in merely mathematics), up to the present date.

All of this had been done under the presently still continuing decadence of a Bertrand Russell who, even still even deader than dead today, reigns in tradition, despite all else, still among the ranks of the reigning royal degenerates of Great Britain, as being their continuing worship of the virtual Satans of pseudo-science, ever since, all the way to the presently royally imperial day. The product of all this, has been, to the present date, a virtual reincarnation of the "Whore of Babylon," for the practice of science, in every respect, as so to be judged to be so, by her reigning deeds, still today.

Over the course of the period from the early 1960s, up to the present time, the collapse of even a formerly taught commitment to a continuing general improvement in the competence in the application of physical science, had been rudely, even savagely, reversed, that somewhat by such a silly fool as Hilbert, but, then, rabidly, by the outrightly satanic Bertrand Russell, who has soon virtually gobbled-up the appeal of the pathetic fool, Hilbert. Since then, the consequent of "green" incompetence, has become a dogma of folly now often predominant in even our own universities generally, even often as a virtually predominant trend in education and related practices; this has been continued as recently accelerating toward a relative nadir, through to the present date. The practical application of real science approaches zero; economic productivity of trans-Atlantic nations has already long been running in the negative.

That same pollution in scientific opinion has not only remained dominant to the present date, but has been greatly worsened, again, and yet again, in the halls of our Congress, and other influential institutions, despite some important, even precious minorities of exceptions, to the present time.

The Effects on Society

The effects of that same reductionists' counter-revolution against any remaining margin of competence in science, as also in morals and science alike, which had been led, originally, by Hilbert, from Paris, and then, with a literally Satanic forcefulness, by Russell. The result has been a general, long wave of economic decline since the very birth of the Twentieth Century, that done in favor of mere number-systems, *per capita*, to the present date. This had been done, as the sheer evil which the Roman Empire had crafted earlier, but, now chiefly at the behest of the British imperial monarchy which had already led a permanent state of global world-wide wars and related atrocities, since the ouster of he who had been the leading peacekeeper of Europe, Chancellor Bismarck.

The convenient assassination of a great U.S. President, William McKinley, done by a treasonously disposed British imperial asset, the Theodore Roosevelt sodden with the worship of the slave-system's traditions, had set into motion a series of economically declining U.S. Presidencies, which, but for two exceptions, President Taft, and one eliminated by assassination,² until President Franklin D. Roosevelt in 1932–1933. A worse, politically motivated situation for the United States, than ever before, has followed the close of the incumbency of President William Clinton: thus unleashing a plunge into the worst tyrannies of our U.S. Presidency to present date, all of which has been done since President Clinton's retirement, all the way to the present instance of chaotically plunging productivity and standards of living.

History in Motion

While the statement which I have just made, above, is true beyond any actually reasonable considerations, the fact of this matter could not be effectively understood, without first examining the process which has actually caused this presently dismal effect upon the minds of mankind generally, a decadence now still proceeding at an accelerating rate over the successive terms of office of, first, Vice-President Dick Cheney, and, accelerated on the scale of wild-eyed economic and moral degeneracy, greatly worsened since the Presidency of a frankly evil Barack Obama.

In fact, since approximately the beginning of the present year, 2014, the U.S. economy has been plunging into a hopelessly desperate, Wall Street-led general bankruptcy, that under an accelerating financial break-down crisis with the present characteristics of the infamous Weimar breakdown-crisis of post-World War I Germany. To wit: the so-called, present state of Wall Street and London panic conditions, now existing under the present, so-called "bail-in" conditions.³

Now, something much worse has happened recently:

The recent reopening of the sessions of the U.S. Congress have begun with an outburst of what is, effectively, hysterical fits of raw political-economic fear, a condition which has

² Warren G. Harding 1921–1923, died, allegedly of eating oysters while rail-roading across the great western desert.

³ If the British Empire were to have provoked a general thermonuclear war before the effects of the present "bail-in" gamble were to strike down the present global economic system, the British imperial scheme for global genocide might meet the requirements of the present British Empress's stated strategic, policy intentions. However, if the general thermonuclear warfare were delayed until after the "bail-in" breakdown, the British empire itself would itself be virtually wiped out, first! Hence the panicked present intent for a virtually "World War III," by such as the brutish Queen's own U.S. puppet, President Barack Obama. Hence, Obama's desperate demand for thermonuclear World War III.

driven many members of the U.S. Congress into strategic-economic clinical bursts of moral inanities. Wall Street "money" is, as a matter of course, a principal, inherently poisonous stimulant for this shameful behavior. There is much which must be immediately changed on that account. I present, below, first, a few choice highlights of that case, here, now, that the evil may be diagnosed, and, therefore, remedied. After that, I shall turn, gradually, to the actually scientific meat of the matter.

My following subject here, is, therefore: the principle of what is, and shall be, actually physical science: as it represents the true measure of true human progress.

Prelude: The Human Species

The subject of a competent science, is to be limited, essentially, and ultimately, to the difference which separates the human species, from all other, presently known, living species.

The simplest efficient choice for setting a standard for this feature of the human species' existence, would be the specifically willful expression of increased, physically efficient power, *per capita*, as that is uniquely characteristic of the human species, as through the means of the effects of advancement in, chiefly, practiced chemistry: the power, to increase the power, *per capita*, of the members of the human species, through increasing the effective energy-flux-density supplied to the aid of the human will, as this may be measured per capita: which is a measurable standard for defining the meaning of human progress.⁴

At the same time, we must take into account, the fact, that the human species has experienced a division, chiefly, between two sub-categories: the evil "Zeus-ian," versus the "Promethean." The Zeusian type is the morally degenerate type; the Promethean type is the viable type which expresses the mode of the naturally progressive growth and increased energy-flux density of the human population. For example, the Roman and British empires are prominent among the category of the Zeusian types. The Zeusian mode, e.g., the Roman and British empires, are typical of the intrinsically degenerate varieties of human cultures.

For the purpose of illustrating the significance of that unique quality of the human, specifically *noëtic* will, I shall focus my attention here, provisionally, on some aspects from the earlier history of our human cultures; but, much of that is done here merely to situate the relevant record of human process in the history of modern times: which is to say, since the great ecumenical achievements typified by the effects of the leadership supplied by three

⁴ As measured in terms of increase of relative energy-flux density.

⁵ See the case of Edward Gibbon, re: *The Decline and Fall of The Roman Empire*.

outstanding personalities now identified, together with the more notably relevant followers into recent, modern times of continuing change:

First, to begin that specific account, for the benefit of those who had missed my earlier account, I refresh, once more, my earlier outline of the original general case for a truly modern science launched since the beginning of the Renaissance led by Filippo Brunelleschi, Nicholas of Cusa, and Johannes Kepler:⁶

The Birth of Modern Trans-Atlantic Civilization

In my immediately preceding, most recent reports on the subject of the modern history of physical science's progress,⁷ I had presented, as repeatedly as necessary, a two-phased account of revolutionary improvements in the applied principles of physical science, as follows: (1) The unified common principle of Brunelleschi, Nicholas of Cusa, and Johannes Kepler; and, (2) the role of the successive steps in progress of Nineteenth-Century physical science typified by the revolutionary, successive steps toward a Nineteenth-century, new scientific revolution prepared, most crucially, by Carl Friedrich Gauss and his follower, Bernhard Riemann, the latter since Riemann's own, thoroughly revolutionary, June 10, 1854 habilitation dissertation.⁸

I have already emphasized in an immediately earlier report, that the consequence of those and related stages reflect a precise notion of a progressive development of actually modern physical science, as over the course, in net effect, from the Renaissance typified by the signal achievements of the continuity of (1) Brunelleschi, Cusa, and Kepler, in the actual defining of modern European physical science, which have persisted in their beneficial effects, since then, as I have emphasized on a recent occasion. This has been a continued progress, through

⁶ I refer repeatedly to those cases, unavoidably, throughout this report.

⁷ Lyndon H. LaRouche, Jr., "The Satan Still Operating from Inside Bertrand Russell's Corpse," *EIR*, Vol. 41, No. 13, March 28, 2014.

⁸ Notably: Gauss had been sitting in attendance for his protege's (Riemann's) famous, 1854, habilitation dissertation; however, the originality of what Riemann had achieved on that occasion, did much to illustrate, this time, more fully, the unique measures which had been already taken by Gauss himself. Riemann's own work, on that occasion, and following it to the end of his own life, was, in turn, the foundation for the successive, complementary, and actually definitive, revolutionary achievements made by Max Planck and Albert Einstein. With the Paris atrocity led by David Hilbert in 1900, and the ensuing criminality against science led by Bertrand Russell across most of the span of the Twentieth Century, science has made, despite all else, some notable progress based on the foundations of the Gauss-Riemann and Planck-Einstein trends in Nineteenth Century science; but, the practice of that progress had already been collapsing in rate with, most notably, with the assassination of President John F. Kennedy, and collapsed, in net effect, with the near-impeachment of President William Clinton. The "Green" doctrine, created by the British Empire's influence, has virtually destroyed the remaining elements of viability in the U.S.A. and European economies, in net effect, most emphatically, that immediately on the inauguration of the Presidency of the essentially silly, if also nasty, George W. Bush, Jr.

the subsequent influence of Gauss and Riemann in preparing the ground for the comparably significant achievements of (2) Max Planck and Albert Einstein, and, prospectively, still, V.I. Vernadsky's intention for his excellent, but uncompleted dedication to the future progress of physical science as a whole, presently. As I have noted on earlier occasions, the completed perspective for the future of mankind's development now, depends upon the proximate perfection of the legacy of the great specialist in scoping out the implications of the principle of life, *per se*, that of the same V.I. Vernadsky.

These foregoing cases are the recurring point of reference to matters of principle, throughout this report as a whole.

The continuing development of that introductory phase of the present series of reports on this matter, as by me, and, I think, a number from among my own collaborators, and by, hopefully, other scientific thinkers, have already known, or might be known to me, otherwise, as well. Once the evil "chains of illusion" were broken, we will have been given cause to be hopeful respecting mankind's prospects for more advanced knowledge of the future: a kind of putting to an end of the matter which might be conjectured as conclusive by such as any nasty little Rumpelstiltskin.⁹

Satan & His Money

Take the case of President Abraham Lincoln's method for his success in defeating the British empire's slave-holding puppet: "greenbacks." Wall Street and kindred forms of money-transactions were (wonderfully) driven bankrupt by President Lincoln's action for a currency based on the banking authority of the U.S. Treasury: that is how the U.S.A. defeated the British Empire's stooges from outside and inside the borders of our republic during the course of the U.S. Civil War.

It was already all there in our original Federal Republic. Original Treasury Secretary Alexander Hamilton had already clarified the principle of our Republic's success. "Simply money," such as Wall Street money generally, has actually no intrinsic value, still (actually) today; Wall Street today is, now, far worse than hopelessly bankrupt. With the arrival of the British-Wall Street situation as of the beginning of this present year, the shift from "bail-out," to "bail-in," there is no intrinsic value, whatsoever, in Wall Street's money; it is

⁹ A children's-story substitute for the too frightening image of a likeness of an actual Satan, or an Adolf Hitler. As for Obama, most citizens already hate him, with good reasons. (Never fear, so far, they will express rage; but, there has been a fear to do anything more useful than that mere posturing.) Simple impeachment is what is actually warranted in this case; but, Wall Street and its butt-kissers, including members of Congress seeking funding for re-election, are still licking the rumps of hoped-for an immanently bankrupt Wall Street's largesse (not only Republicans!).

all, intrinsically, worthless already: *Pfft!* Hence, the urgency of the current international war-drive.

The true wealth of society—almost any society—exists only in the increase of the actually productive powers of labor. Wall Street's claims are essentially worth much-much less than money; it is, chiefly, no more than the ill-gotten gains extorted from the helpless or, worse, the foolish, by an international system of organized crime, such as the present British Empire and its organized-crime chieftain of the moment, the current Brutish Empress, Elizabeth.¹⁰

Wall Street's and London system is, from top, to bottom, remains the true "steal business."

The fraud (the swindle) of U.S.A. and European contemporary financial buggery, reposes, ultimately, in nothing more, or less than the timidity, or sheer ignorance, of the commonly credulous. As productive employment has been taken away from the citizens of the United States, more and more, since Wall Street's implicit rape of the American economic system, and that with a corresponding, political and practical worthlessness among the citizenry.

This has become, currently, a trend which has, increasingly, reduced the older generations of formerly proud producers to holders of a virtual beggar's bowl, a bowl ever more and more empty, especially since the sheer brutality against our citizens by the Cheney and, even more drastically, the Obama administration. Even what might be considered as the powers of the U.S. Congress are drooling, mostly piteously, at the verge of the beggar's bowl of Wall Street tyrannies: a Wall Street, itself, is now seemingly, about to crush virtually out of continued existence by the greatest financial crash in all actually known history to date.¹¹

In any competent conduct of a monetary system, money as such has never had any intrinsic economic value, in effect; value is to be measured in terms of *only* the effective increase, of the physical-productive powers of labor of a society as such: not labor *per se*, but, rather that of the productive powers of labor, as defined in the four crucial, founding principles of the U.S. National Economy defined by Secretary of the Treasury Alexander Hamilton. Any

¹⁰ Nominally, today: the actually current Empress Elizabeth II. (In historical fact), and with respect to peculiarities of temperament, the real, earlier monarch, Elizabeth I, was the actual predecessor (by her own characteristic intentions), as a matter manifestly efficient, physical principle. Shakespeare had effectively understood the relevant practice and its effects, alike.

¹¹ I remind the readers, that if the U.S.A. were to adopt three principal reforms immediately, the beginning of a recovery of the U.S. Economy would begin immediately. These are, in order of appearance of the actions: (1) The immediate restoration of President Franklin Roosevelt's exact Glass-Steagall Law; (2) The mandatory requirement that no bank shall be authorized under law, except through the authority of the U.S. Treasury (exactly as President Abraham Lincoln had done during the Civil War fought against the British Empire); (3) A Federal Credit funded system of public works based on an orientation under high rates of energy-flux density reconstruction and related measures, and science-driver oriented public works and public education and health-care.

contrary opinion, is simply, more or less badly incompetent, merely that of a monetarist expression of public economic masturbation. In brief: both Wall Street and London are, and always had been, essentially, worthless frauds.

Evils of such likenesses, whether relatively less, or worse, are familiar from within the skein of known human history. However, now, the planet is lurking at the edge of the threat of a general thermonuclear war, a war, which were it to occur now, as is presently already threatened: this would mean either the sudden extermination—even (presently) as if in about an hour and half: or, a Zeus-like ancient Rome or contemporary British empire, either of which would possess the sheer evil of such intentions; throughout the planet, of the present human species as such, or an unprecedented holocaust, during which the survivors would have wished that they, had better died, than continued to live. This is the true image of the evil of the Zeus who has been the proper image of a Monster of Sheer Evil, so seemingly distinguished as a relatively greatest force for evil, from among all the greatest known reigns of human life, to the present time.

Such images, such as the legendary Zeus, are the models, such as those of Zeus, the Roman Empire, and the present-day British Empire: they are essentially models for any actual Satan, who might care to make such investments. They have been, and remain, models for the ultimately, more or less, self-extinctions of empires, empires either known, or only as footprints from an obscured past, heretofore. So far, here, I have left much to be explained in the course of the following chapters.

I. Mind Versus Sense-Perception

Let us, now, therefore, return to the earlier subject of science as redefined in exemplary ways by the models of the true greatest geniuses of the Florentine Renaissance, taken in order of appearance: (1) Brunelleschi, (2) Nicholas of Cusa, and the indispensable achievements by their follower, (3) Johannes Kepler. The competence of all modern science depends upon the specifically combined contributions of those three greatest (actually), from among the inaugural intellects of modern European history at that time.

The essential distinction of honest human beings, from beasts and usurers alike, is that the human species' existence had lain in the potential and actual foundations of all great scientific achievements since the "dark ages" this far. The characteristic of a valid human effort, has always been the increase of the energy-flux-density commanded by commitment to accord with the noëtic principles which absolutely distinguishes the characteristics of the human species, from all other presently known creatures. Already, that potential had freed the willing human minds associated with such manifest characteristics, by freeing mankind

from the inherently degrading mental slavery of foolishly blinded faith in the ultimate silliness of what is merely sense-perception.

The Global Prospect

My emphasis, here, on the trans-Atlantic cultures, when it is appropriately referenced, is not exclusive, but merely, necessarily, paradigmatic. For example, if we divide the human population of the planet in a meaningful way, the dominant characteristics of the human populations of our planet had been, since the Great Renaissance: the impact for progress of the colonization of the Americas, particularly in the Northern Hemisphere. It had been the freedom of the early American settlements, which had been the indispensable, great drivers of the consequent progress in Europe, generally, as the great German Chancellor Bismarck had learned that great lesson from close study of the then ongoing leadership of the President Abraham Lincoln administration. 12

However, since the death of the U.S.A.'s President Franklin Roosevelt, there had been a net downward-turning trend, which had been continued as a set of successions of decline, and plunge into a critical phase, in the trans-Atlantic region, since the assassination of the virtual Presidential candidate, Robert Kennedy, the brother of the already assassinated President John F. Kennedy. A similar attempted assassination had been made against President Ronald Reagan, that with clearly identifiable motive for that aborted attempt: we in the United States had thus entered "the Bush League" consequent upon, also, the foul legacy of the influence of the Dulles brothers and their like.

The down-turn in the United States, which has been in net progress downward, since the assassination of John F. Kennedy, has been carried over into the follies induced within western and central Europe. ¹³ There was nothing necessary in this downward trend throughout the trans-Atlantic-Western European sector; it was a downward dictated by the British Empire under the imperial reign of the Empress Elizabeth, a process of imperial tyranny under the British Empire akin to the precedent of 'The Decline and Fall of the Roman Empire," a willfully (actually *Zeusian*) characteristic of all actually imperialist systems known to ancient through modern mankind presently.

¹² It had been the role of Chancellor Bismarck which had blocked the persistent threat of what was to become "World War I." It had been the ouster of Bismarck by the actions of the British monarchy's intervention for the ouster of Bismarck, which had immediately unloosed, with the ensuing assassination of the President of France, the virtually continuous two decades and a half of assorted warfare, orchestrated by imperial London, leading into "The Guns of August." Warfare between World Wars I, II, and now imminently threatened III (global thermonuclear), have been merely transitions in a continuing series of conflicts.

¹³ The decline and ouster of France's President Charles de Gaulle, turned France into a political sewer of British-directed so-called "socialism." from which the entirety of western continental Europe has never actually recovered, to the present date.

The effect of the decline in the trans-Atlantic region, which has been caused, essentially, by the influence of the present British Empire, has left a relative political-economic value of slightly upward development, as in India and China, for example. This digression has brought a current zest, imported from the ever-evil British Empire, for a presently lively prospect, for a global thermonuclear war.

However, the natural tendency in the history of the human species, when not under the thumb of empires in the actually *Zeusian* tradition, is *Promethean*.

That is not merely a political fact, it is a natural fact: the conflict between the tradition of Zeus and that of Prometheus, reflects a conflict between the *Zeusian* (inherently degenerate) and *Promethean* (creative) modes of organized human populations.

Thus, a Promethean tendency within Russia, India, and China (for example), is now the issue which prompts the British-Empire-dominated, still implicitly Zeusian sector of the planet, in opposition to that Promethean tendency shown significantly in the progressively upward direction of the core elements of the Promethean leaning in the Asian sector. This, however, has been continually challenged from within the Eurasian strategic sector, since the two Chechen wars against Russia whose ravages include, consequently, the British-led use of Saudi terrorist forces in such cases as the so-called British-Saudi-backed "9-11" terror attack on the United States, a mass-murder of U.S. Citizens and others, which was covered over, largely, through the implicitly treasonous actions of U.S. Vice-President Dick Cheney, and as continued by President Barack Obama, both on behalf of the British empire of Queen Elizabeth, as such.

II. Since the Renaissance

The language-cultures of those great, still surviving cultures of that region, can be traced to a convergence of insight among the relatively most successful language-cultures, there, as in the world more broadly. The medium's differences, are often in essential respects of usages; but the progress of physical science, in the highest meaning of that term, is, or, should be, convergent among them, and, hopefully, successfully, as in the best nations of Eurasia, from the western borders of Russia and its immediate associates, today, to the Pacific coasts of Asia today.

Yet, it must be acknowledged, that there are relatively good and bad cultures among the totality of the assortments, the worst of which have been expressions of what have been, inherently, murderously inclined, religious fanaticisms, such as those cases fostered since the religious warfare in Europe, and beyond, since the crushing of what is namable as that

"Golden Renaissance" expressed by such as Brunelleschi, Nicholas of Cusa, and Johannes Kepler: those three geniuses must be considered as crucially seminal intellectual forces in action since the birth of the great European Renaissance coming out of preceding, mass-murderous, European "Dark Age."

Zeus Against the Renaissance

Mass murder in the name of religion, when taken in the alleged pursuit of religious fanaticism, such as the fascism, murderous religious fanaticism, or similar brutishness, has sometimes dominated modern European cultures, and others. These are typical of the evils which a true scientific practice must extinguish for the sake of humanity itself. Those murderous fanatics of terrorism, whether inside regions of Europe, or elsewhere, must be subjected to the governing reigns of truly human law, as I shall deal with that subject-matter in the due course of this presently continuing report.

Inspiration, such as religious inspiration, without the same truly human, scientific reason expressed by the original Christian martyrs and their like, is an expression of the essentially evil spirit of the fanaticism of a Zeusian-like Satan himself, and the British imperial monarchy of today, too, as it should be recognized, exactly so, among all the truly civilized nations generally. It is proof of the goodness of the cultures of mankind which is required, when intended for the commonly future benefit of all nations, which is the only proper universal principle of government.

The only civilized differences among the worthy nations of this planet, pertain to the essential role of what can be fairly, by definition, as language-cultures. The means, not the conventional meanings of mere words as such; those words, as such, are merely the footprints left behind by the passage of time. Truly Classical artistic composition, including science and great classical language-cultures, should never be degraded to the form of mere meanings of individual words and sentences; language-culture must apprehend that which is about to become discovered as known from both the future of the speaker, and, also, his comparable forerunners before him.

My stated view, at this immediate juncture here, needs to become understood very carefully, even among the presently unwitting, as something far beyond the mere parochialisms of sense-perception as such. We must inspire the cultures of the nations with the access to the comprehension of the true meanings lodged within our Solar system (for example), meanings which are not the captive prisoners of mere sense-perceptual processes and their prejudices, but reference meanings which belong to the Solar system (as a system, independently of sense-perception *per se*).

It is precisely on this immediately fore-stated, specific account, that the otherwise seemingly lost more ancient wisdom, was often regained through the particular quality of true genius exemplified in the great fundamental scientific discoveries of the three figures from the Golden Renaissance, persons aroused by the awakening dawn of an actually modern civilization, that of the Golden Renaissance of, most emphatically, in the order (once more) of: (1) Filippo Brunelleschi, the liberator of science from mere mathematics; (2) Nicholas of Cusa, the discover of the "All;" and the discoverer of the most essential foundation of all competent physical science: (3) Johannes Kepler's, personally unique, discovery of the actuality of the Solar system.

This discovery by Kepler, which is admittedly implicit in some degrees of foresight, from the true discovery of Earth, by Eratosthenes, has been both the foundation of all essentials of known physical science today since the Renaissance. Through the means of that achievement, by Kepler himself, mankind discovered the keys to understand not only the, otherwise, previously unknowable, practical existence of the Solar system, but, by those same means, the immediate basis in foundations for mankind's escape from the virtual captivity of elementary sense-perceptual presumptions as such. 14

The sane and the insane must not be regarded as enjoying a common standard of opinion or related, common, behavior. I shall continue to emphasize that, henceforth, here, with increasing emphasis. It is man's increased power to defend the existence of the progressive development of the human species itself,¹⁵ which is the only tolerable standard for truthfulness in any region of this planet—and, in effect, even within regions of the Solar system beyond, as I shall emphasize that specific point in due course, within the later parts of this present report.

The commonplace predicament which causes uncertainty in popular opinion on this account, is to be recognized as the potentially fatal error of reliance on the mistakenly presumed authority of mere sense-perception itself, as such. This subject, the separation of mind, from the mere shadows of experience which we regard as sense-perception, is an indispensable separation which, in and of itself, provides the most essential precondition for a human sanity-in-fact.

So, what I have already, repeatedly identified as the triad of truly scientific genius represented by the converging elements of Brunelleschi, Cusa, and Kepler, or the later,

¹⁴ Numerous otherwise credible modern physical scientists, including all those who remain ignorant of the essential principles of the set of discoverers, Brunelleschi, Cusa, and Kepler, remain imprisoned in encumbering incompetencies respecting the foundations of a presently efficient physical science reaching beyond the limits of the inherent ignorance of mere sense-certainties.

¹⁵ As implicitly measurable in terms of increased energy-flux density in human practice.

Planck-Einstein-Vernadsky alternative, exemplify the present foundations of all competent scientific method available to our contemporaries presently: as I had done in opposition to reliance on mere sense-perception as such. Kepler's solution, as I had summarized that warning in the case in *Chapter II: The Ontology of Economy*, from my description of "The Satan Still Operating from Inside Bertrand Russell's Corpse." ¹⁶

Bestiality Among Humans Now

Foremost, however, we must free our opinions from the farce which is, implicitly, any notion of the human mind as being based primarily in what is merely sense-perception. Sane, adult human beings, unless, perhaps, they are habituated drug-addicts to marijuana or other weeds of their likeness, or clinically insane otherwise, in particular, do not base their beliefs on mere sense-perceptions. Indeed, as a matter of public safety in society, the relative claims to sanity of such folk must be discounted accordingly.

Take, for example, the clinical case of recently reported suicides among secondary students in New York City schools. Include the case of the student who commits suicide under social pressures of failing grades, when the failure had been actually that of the educational system referenced, or under the burdens of the cultural conditions of the society of relevance. Who has failed, in the typical such cases?

It is the society which has failed, in most among these cases, or, more narrowly, the onset of the clinical absurdity of the secondary class imposed upon the students under the impact of the currently degenerating trends in public education (such as instruction in Euclidean geometry) during the course of the recent decades, especially since 2000 (e.g., the Bush-Cheney and Obama tenures, this far). The student has lost an earlier grip on a sense of a meaningful future life: a failing often combining brutal conditions within the society and an often more profound sense of hopeless existential defeat. Usually, the educational program itself, has homicidal effects: the sense of a meaninglessness of a life as if lived merely unto itself.

There is nothing intrinsically specific to the case of affected adolescents, or even younger children. It is present U.S. society which is the criminal in our case (in particular), especially since the close of President Bill Clinton's terms. Life under Cheney and Obama reeks of the potential for mass homicide, as in terms of deteriorating conditions of life, in terms of a deeply sensed, society-induced existential "sense of personal defeat," as also expressed in a sense of a meaninglessness of human life under such conditions, *per se.* Life, for those victims of our present society, has no longer a credible existential meaning.

¹⁶ See footnote 7.

This is no mere sociological phenomenon; it is the characteristic of the fanatic who sheds life readily because the continuation of human life itself has no credible meaning for him, or her: exactly what has been done to the typical American adolescent (among others) presently, and that increasingly so. The mere sight of the face of a Dick Cheney or a Barack Obama, is a drug-like effect sufficient to promote suicidal impulses of one guise, or another.

Thus, the Saudi mass-killer deployed into "9-11," and our West Coast drug addict, are victims of the same, culturally induced homicidal pathology.¹⁷

III. The Study of the Human Mind

The issue to be considered, here, is not that of life *per se*, but of human life.¹⁸ The distinction of man from beast, can not be reduced to a matter of merely relative gradations. Every human life is to be considered, in practice, as implicitly precious to all mankind, and also as essential to the continuation of progress of life on Earth in general. The ban on death-sentences can not be compromised, nor can torture of human beings be tolerated, that for the very reason of the essentially required, ontological distinction of man from beast. While we can, through animal husbandry, and, more so, through cultivation of pets, bring forth an echo-like manifestation of likeness to human behavior in pets, no animal species can ever achieve the specific quality of the viable human mind.¹⁹

¹⁷ Since the two Chechen wars launched against Russia's Vladimir Putin, by the British Empire and its Saudi-centered connections in Africa and Asia, have been a major element in the bestiality against the United States (i.e., "9-11" under Vice-President Dick Cheney's arrangements). Veteran Nazi killers operating as a designated government in Ukraine, are a related sort of Nazi-like, or related modes of terrorist modes of epidemic bestiality polluting all continents of this planet.

¹⁸ Decent human beings are not cruel to animals, lest they, themselves, lose a grip on a sense of humanity. Let an animal to be slaughtered, not experience the terminating action. We do not wish to eat our pets, or, at the least, not to be reminded of that action. Consider the relationship to "combat fatigue" under stressed-out circumstances. But: man is not, properly, an animal. Those persons who failed to grasp the distinction, are probably not far removed from mere beasts, if at all, on that account: the horrid perversions expressed by President Barack Obama and his purely homicidal kill-ratios, for example.

¹⁹ As a matter of principle, there is no presently competent form of generally accepted notion of the human mind as such. Specifically, the actually noëtic powers of the human mind have no exact correspondence with that of other forms of life. Man is the only species which commands access to an efficient mode of actually scientific foreknowledge of a willfully determined future. While the human brain has correspondence with the function of the human mind, the products of the discovery of truly human knowledge of universal principles generated by the human mind, are implicitly and efficiently immortal: the crucial difference of the human species, from the beasts. Unfortunately, most persons, still today, have no functional awareness of this access to this crucially distinct, superior function of the actual human mind. The cases of the discoveries by Filippo Brunelleschi, Nicholas of Cusa, Johannes Kepler, C.F. Gauss, Bernhard Riemann, Max Planck, Albert Einstein, and V.I. Vernadsky, are cases which I have emphasized in my recent series of reports. The same principle is found in Classical artistic composition, as in poetry, drama, and music, but not the common trash which passes for "popular." The accounting for this principle, is located outside the domain of merely ordinary

The distinction lies within the specific domain of the human mind. It is not the body otherwise, which is sacred in the case of the human individual; it is the *noëtic* principle specific to the human mind: *the power of foreknowledge of a revolutionary change in the future of mankind*. Any adult (for example) human personality who does not know a relatively efficient prescience of the actual future of history in some significant degree, is intellectually the case of a damaged mind of that human personality. This is the essentially the factor in inducing human individuals into the habits of relatively human expressions of bestiality among so-called "lower classes." Ironically, it is Wall Street's rich who tend to typify the actually most inhumanly bestial, who must not, therefore, be coddled too much, but correctly recognized as more in the category of "performing animals," than of actually human intellectual qualities of morality.

In fact, that virtually relative dehumanization of large portions of the human population, has been, typically, a legacy of the legendary, evil Zeus, and of the system of government, over those kept in slavery (especially over successive generations) generally, and of the effects of herding imposed upon those treated as inferior classes. The systematically, steep accelerating rates of downgrading of the educational systems imposed upon the majority of the United States student population generally, especially, increasingly, since the close of the 1960s, provides us a generalized measure of the moral imbecility which has taken over the trans-Atlantic cultures, most notably our own, in particular, since the closing years of the 1960s.

A Case in Point

The dependency on human sense-perception can be efficiently overcome, only through systemic insight into the relations between sense-perceptual experience and relations which reach into space (for example). Notable pre-modern discoveries in physical science, such as the measurement of the Earth, from observations of the motion of the Sun, by Eratosthenes, must be regarded as a refined case, beyond the dimensions of the known conceptions of the famous Archimedes.

The more crucial case, beyond the ancients (insofar as we presently know specifically comparable cases of measurements), had been the triadic achievement of Brunelleschi and Cusa, in the still unique achievement of Johannes Kepler in defining the Solar system *ontologically*, as only relatively rare contemporary scientists have actually understood the achievement of Kepler, still presently.

sense-perception-as-such (e.g., crude "sense-certainty" as such).

The concluding sentence of Bernhard Riemann's habilitation dissertation, is a similarly unique modern principle of physics still today. The character of those instants of science-discoveries of principle does not exist in the generality of physical-science subject-matters presently: a travesty largely due to the bastardly pseudo-science of such number-mumblers as David Hilbert and the dupes of Bertrand Russell. The correct method for such cases is, still, the method used by Kepler for defining the Solar system, as such.

When relevant matters are carefully considered, it should not be difficult to locate the distinction of Kepler's original, actually fundamental discovery of Solar principle, from the required point of view located specifically within the presumed ontological framework common to Planck and Einstein. The definition of object has undergone a pressing requirement for a change in ontological axioms.

However, even that implication is not so simple as something which simply trying could accomplish. But, then, a greater challenge is presented, as the principle of life, particularly human life: which is quite plainly the bottom-line of the human knowledgeable experience: hence, the crucial significance of the work of V.I. Vernadsky bearing on the actual functions of the human mind.

With that, the definition of ontology itself undergoes a qualitatively higher order of ontological implications, from the object of attributed existence, to the deeper-underlying, universal principle of, immediately life, then, into the ontologically still higher human life, and, thence, the still higher notion of creativity *per se*: the water which flows, but through no same river, ever again. It is not a matter of the substance, but of the process represented.

At that stage, something conclusive has been reached here, at least: a principle, not a mere thing. Habit defies acceptance of such elemental notions. The allegedly "smallest" disappears, and the *noësis* takes control. All now has the name of creativity *per se*. The answers remain enigmas, but they are no longer, merely fantasies: push them, and see how they react, or do not react. The result? We define it as a discovered principle.

IV. The Future in the Human Mind

Heretofore, my report here, has remained, not only up to this point, but beyond, within the ordering of a conventional ticking of a clock deemed the future progress of history. In fact, the adoption, otherwise, of a more conventional view of the matter, runs directly against the most essential evidence respecting the powers, or lack of powers of the human mind. The specific distinction of the human mind, lies in the most essential fact of all true science, that all evolutionary progress of the human species is based on an achieved foreknowledge of the

future. That principled fact is the most crucial, and, also, the most essential element, of the naturally predefined, elementary systemic evidence of the difference of man from beast.

It is, otherwise, unfortunately, the aspect of society in which the essentially practical matters of human progress have been, usually, neglected in an actually vicious extreme.

If you do not know the future in some significant degree, you are also, already ignorant of the meaning of the present time.

The simplest contemporary distinction to me made on that account, is appropriately illustrated by the prevalence of the outright fraud of the teaching of Euclidean geometry in schools. That has been actually a crime against humanity, not merely in part, but generally. It had been already known as a practiced crime in the text of the *Bible's Genesis* 1, already since then.

The evidence to be drawn so, is elementary: no animal species can willingly discover a demonstration of the characteristic distinction of members of the human species. This fact has been well known since such cases as the systemic species-like difference in cultures separating that of Zeus (e.g., "the Greenies") and the Prometheans. Indeed, the practice of Euclidean geometry was a neo-Zeusian return to backwardness, one which had persisted in much of even modern European civilization after the achievements of Filippo Brunelleschi, Nicholas of Cusa, and Johannes Kepler, even, often, Kepler's uniquely original discovery of the principled characteristic of the Solar system, even among practicing scientists, as specifically known to me, as late as during the generation of the 1940s–1970s: that because they had been subjected to regurgitations of the archaic follies in teaching practices administered to baccalaureate scientific miseducation common in leading universities of the United States during the 1940s–1950s intervals of their baccalaureate candidacies, and beyond.²⁰

For example: it is commonplace to hear, that among presumably literate graduates of secondary and higher education, that is it not possible to have foreknowledge of the future. Yet, all qualitative leaps in scientific progress, such as those of moderns such as Brunelleschi, Cusa, Kepler, Leibniz, Gauss, Riemann, Max Planck, Albert Einstein, and V.I. Vernadsky,²¹ are associated with physically-principled, rather than merely pro-deductive discoveries of

²⁰ Their follies had been leftovers from an undergraduate miseducation which had taught them to ridicule the discoveries of Brunelleschi, Cusa, and Kepler's unique principle. As I had experienced this, prolifically, in both my own secondary and undergraduate university education. For example, my knowledge of the incompetence of Euclidean geometry was fully, and correctly firmly and finally, successfully established by me at the age of 14.

²¹ To name only the most distinguished of the absolutely most distinguished.

gains in scientific matters of universal physical (and closely related, true universal) principles, or such as Eratosthenes²² before them.

This distinction of the human species, is shown most directly by mankind's distinguishing characteristic, the use of "fire" in all the connotations of that notion. Any adult professional who fails to recognize the essential nature of foreknowledge of the future, must be considered incompetent in the sense of being scientifically defective in relevant matters of policy-making of practice. This is commonly confessed (if only implicitly) by the person who professes himself, or herself, to be merely "practical," rather than scientifically qualified; to place the relevant emphasis, they are scientifically disqualified in rendering their choice of judgments, and, are, therefore, necessarily, suspect of being virtually Zeusians, rather than the scientifically competent Prometheans.

This disgusting lack of scientific qualification, is to be regarded as seriously in error, in light of the fact that it is the related, essential inability to distinguish man from mere beast, which is at issue practically, for society generally, on precisely this account. If you are not qualified in such knowledge, you are not qualified to define the choices for policies of practices of entire societies, but are disabled from making judgments on matters of policies respecting such more sophisticated considerations. It is not the knowledge itself, but, rather, the implications for taking such considerations into account, which defines the necessities of the principles of practice for societies: if the issue lands on your plate, you are obliged, professionally, to make yourself competent in approaching relevant solutions within the domain of that field of inquiry.²³ Indeed, the most essential distinction of the human individual, is, that, on this account, which essentially distinguishes the heathy state of mind of man, from both the beasts and the beastly.

To clarify the issues so represented, consider the significance of our present knowledge of space, from knowledge attributed to Earthly sense-perception as such. Post the relevant argument, here, as follows.

Man & His Self-Perception

It may appear, but only mistakenly, in most approaches to the experience of sense-perception heretofore, that all of mankind's knowledge from experience, were dependent upon sense-perception. There are certain systemic features of sense-perception which are, in fact, exceptions to such a proposition; but, insofar as people depend upon sense-perception as

²² The discovery of the measure of the Earth, by Eratosthenes, gave us the earliest case of a sure-footed insight into the Solar system beyond Earth as independent of mere human sense-perception as such.

²³ There are no perfectly educated people in a competently organized society, but only those who recognize that they are still being self-educated, or otherwise in respect to ever-present, matters of fresh challenges.

their presumed only source of knowledge from experience, they have tended, predominantly, to overlook the systemic differences between mere sense-perception and the actually experienced, qualitative higher, cognitive functions of the human mind. Our confrontation with space, as illustrated very well by Kepler, had provided us with very strong sources of insight into the efficient experience of the higher principles lying beyond mere sense-perception as such.

Each among those considerations, when well combined, as that trio had done, in effect, provided the modern human mind with the undeniable existence of agencies superior to those of mere sense-perception. These agencies had not been unknown among what might be described as the best thinkers; but, popular features of social commerce among the masses of the population, had strongly resisted them under the influence of what might be fairly indicted as "popular common sense," and that, repeatedly, and, also often violently in social effect.²⁴

In brief: mankind should be fairly considered as no less than an inhabitant of the Solar system (and beyond) in terms of our species' mental life and related relations. On this account, astronomy must be considered, henceforth, as the dominant feature in defining of the means and goals of human progress. This is, especially, as the power of mankind, as a species, has now grown beyond other thermonuclear-fusion standards, into the present pre-occupation with the added practical potential represented by the Solar deposits of Helium-3 accumulations available to Earth from, its Moon, as to be gathered by us as to be taken from the Moon.

²⁴ The cultural conflict between Christianity and the Roman Empire (and, also, the British Empire) typifies exemplary cases of respectively systemic contrasts. For example: some branches of nominal Christianity, had adopted a Zeusian (e.g., pro-feudalist) social doctrine, rather than that of such testamental authorities as the notable disciples Peter, Paul, and John. The contrary, errant interpretations, were, most commonly, adaptations to such pro-Zeusian dogmas as those of the Roman and British empires. Notable Jewish contemporaries of the early Christian authorities, such as Philo, also shared kindred social-theological outlooks for practice. The sometimes rejections of this quality of Philo's outlook among some Christians, had been, in part, a product of feudal societies' adaptations to a Zeusian legacy based in either feudalism, or the more primitive modalities. Jeanne d'Arc and the leaders of the Christian "Golden Renaissance" of such as Nicholas of Cusa, are, thus, typical of a rejection of the Zeusian moral-cultural degeneracy, and the latter degeneracy's contemporary, modern relics. Christianity, particularly in its merely nominal relics (such as the Dutch and British imperialisms launched during the 17th and 18th centuries, has been among the most grievous offenders on this account, and, thus, the typical source of the worst neo-Zeusian cult-formations. Generally, throughout contemporary society, it is the pro-Zeusian religions and their cultures, which have exerted the most depraved influence on contemporary world society generally, and the greatest degree of social-cultural backwardness, or even outright depravities. Generally, throughout contemporary society, it is relics of pro-Zeusian social-cultural backwardness still imposed upon some parts of present cultures which must be approached with science-driven progress in culture and technologies which will serve as the chief sources for remedies required.

Such a Helium-3 enhancement of Earth-based sources of empowerment, brings us into the prospect for such means as treatments of nearby-passing asteroids and, possibly, comets, too. These considerations foresee mankind, while otherwise still confined, essentially, to Earth for purposes of residence, has, nonetheless, the early prospect of manned (directly, or indirectly) deployment for man-directed interventions into regions into which man could not visit efficiently without extraordinary means beyond the general limits of our species' present capabilities.

Our resources, must, on first account, signify our relative freedom from narrowly-defined, Earth-bound means to be brought into the use of mankind living on Earth. Yet, insofar as we are more or less immediately within reach of nearby-space operations, the psychological distance from strict "Earth-boundness" changes the outlook of mankind-still-on-Earth, toward a Solar-based outlook, and beyond, such as the tracking of the pathway of the Solar system with respect to its passage within the Galaxy. This means a shift, emphatically in physical-scientific outlooks, to a view of life on Earth, as being one dependent on the increasing ration of a non-sense-perception view of mankind's practice within the Solar system, and beyond.

This view is implicit in the achievements, this far, of the accomplishments still under way under the auspices of the missions of Max Planck, Albert Einstein, and the unique implications of the genius shown by V.I. Vernadsky.

This, the weight of consideration of merely sense-perception, must be transformed into an accelerated rate of change in mankind's outlook on the Earth-bound aspects of mere sense-perception as such. We must greet such changes, and, that, with corresponding desire for a more intimate relationship to the work of the Creator of it all.