

1. Preliminaries

- 1.1. Some definitions for a common understanding and discourse -
 - 1.1.1. Data are facts and beliefs about the real world. (from annals of computer science)
 - 1.1.2. Information is data formatted to support specific decision making. There can be no information overload, because ‘excess’ information just reverts to data when it no longer supports decisions; but there can be a data overload to the extent that all data relevant to a decision cannot be processed in a timely manner to yield needed and usable information. (from annals computer science)
 - 1.1.3. Knowledge is a collected history of correct decisions (in interpreting and responding to observations) along with their supporting informational bases. Process knowledge can be stored and communicated only in the form of algorithms.
 - 1.1.4. Wisdom is the ability to selectively, reliably, and (perhaps) consistently apply knowledge to problem solving so as to extremize widely acknowledged and highly valued real-world criteria (utilities) and quality of life measures.
- 1.2. Self-consistent systems of logic are numberless. But there are only a few that support prediction of realworld futures. People holding collectivist ideologies subscribe to distinctly different logics than that which here organizes conservetarian thought.
- 1.3. A personal disclosure
 - 1.3.1. I am a naturalized citizen who legally emigrated from a post-WW2 displaced persons camp in Germany. I was born in Estonia and with my family have witnessed at first hand the ravages of two distinct types of collectivist tyranny – national socialism and international socialism (i.e. communism). The touted ‘blessings of collectivism’ to me are part of the experiential road I have traveled, and not a theoretical subject for conjecture.
 - 1.3.2. As is often the case with survivors/escapees from tyranny, naturalized U.S. citizens become super-patriots. I too am so afflicted.
 - 1.3.3. My economic values derive from what is known as the Austrian School. I am an unabashed free market capitalist. For details see Hazlitt’s [‘Economics in One Lesson’](#).
 - 1.3.4. My socio-political make up is shaped by the Founders as seen through the lights of the [Federalist Papers](#) and later well summarized in [‘The Law’](#) by F. Bastiat.
 - 1.3.5. I view and interpret the intricacies of ‘natural things’ around me through the lens shaped by my experience and education in my chosen field of the systems sciences. (See [‘About’](#) for more)
 - 1.3.6. The behavior of humans and society are for me further clarified by Skinnerian behaviorism where not explicitly refuted by cognitive science.
 - 1.3.7. Politically I veer toward the right and find the greatest comfort in what I have come to call consrvetarianism, a form of libertarianism that shuns their orthodox isolationist views. The Republicans, who most often get my vote, are a poor match; the Democrats, who seldom get my vote, are no match at all. My wife Jo Ann and I support CATO, The Heritage Foundation, and US English. We give money to many local charities and 501c3 organizations too long to list here.

- 1.3.8. I am a Christian. My '[open theism](#)' and scientific cosmology must match, and I am constantly looking from my respondents for any errors in my belief system. I grieve for the current state of Christianity and its perception by the secular humanists. As a [Bayesian](#), I take no tenet of my belief system to have probability one or zero.
- 1.3.9. Since (as a Bayesian) I am not perfect, I constantly test my belief system and seek the counsel and critique of people of other persuasions subject to reason. Consequently, many (most?) of my friends, correspondents, and intellectual combatants are people of good will, reason, and intellect who see the world through their own valuable lenses that are different from mine. I am blessed.
- 1.3.10. I see us all of equal worth only in the eyes of God. On earth we are all different along every dimension or attribute that you care to cite. To each other our value varies immensely as witnessed by our walk and not our talk. To deny this reality denies our potential for the future. See also *A Troublesome Inheritance* by Nicholas Wade.
- 1.3.11. I believe that humans are on an epochal threshold called [The Singularity](#). We have arrived at this threshold through varying evolutionary processes (cf again *A Troublesome Inheritance*). To the extent that we recognize that and make appropriate social policy, we will maximize our likelihood of survival and the future potential of Homo Sapiens Sapiens. To the extent that we deny/ignore it, we will suffer.
- 1.3.12. In the last resort, I evaluate all propositions, initiatives, and conundrums with the pragmatic and seminal utility – 'Will this better help us all go to the stars?'
- 1.3.13. All sustainable civilizations in the universe are star-faring. Our species must therefore become star-travelers or give rise to post-Singularity sapient life that will travel to the stars.

2. Our Place in the Cosmos

2.1. How the World Works

- 2.1.1. Time is a complex relativistic physical construct variously experienced by each class of sentience, and therefore there exist many different time flows in this universe. Time and causality are duals.
- 2.1.2. In a normal space/time continuum mass/energy probably cannot travel faster than light speed; perhaps information can. (cf. Aspect experiment on Bell's theorem.) Worm holes are not normal in such sense.
- 2.1.3. Two-way communication is possible only between sentient critters sharing a common space/time 'bandwidth'. (If a five billion year-old sun is sentient, it may not be able to communicate with a 'three score ten' man or vice versa.)
- 2.1.4. Contrary to the hubristic pronouncements of competing theories in physics, our science knows abysmally little about the cosmos (i.e. existence) ranging from the very small (Planck scales) to the very large (types of multiverses), and much in between.

2.2. Life

- 2.2.1. All Critters are Utilitarian Bayesians - evolution has inexorably made all living creatures such that they use a Bayesian schema, albeit imperfectly, for processing

uncertain data and information in order to maximize the survival probabilities of both the species (as a 'super organism') and its individual members.

- 2.2.2. All populations of sapients (free-willed conscious critters possessing of some wisdom) are unequally distributed along every dimension of their attributes - each member is a unique individual and in the strict sense unequal to one another in any given attribute. It is useful to abstract certain prevalent, commendable, or pejorative aggregate characteristics of a population or sub-class when making and implementing public policy. The purposeful ignoring or ignorance of this condition may be termed 'the tragedy of the tails' (unreasonable fear of rare events).
- 2.2.3. Mathematics supports the unambiguous development, formalization, and communication of the most complex ideas of which our species is capable.
- 2.2.4. We don't yet know what sentience (consciousness) is, much less how to purposefully create it. We do better at detecting and measuring sapience (wisdom).

3. People

3.1. Societies

- 3.1.1. As everything in nature, society is viewed as a collection of interrelated systems. That is, we can only understand the workings of society to the extent that we can abstract a model for it as a particular system depending on the aspect of society we wish to study.
- 3.1.2. Human life - individually or by class - is not of infinite value to anyone. Those who so claim are misguided in their ignorance or, more likely, are scoundrels. Indeed, the value of human life has been and continues to be finite, calculable, variable in time/place, and negotiable as witnessed by history and simple observation.
- 3.1.3. Human (and likely all) life is like an iceberg - a tip of it exists in the four-space we all experience. The more significant and enduring part of it exists in dimensions (i.e. a manifold of the cosmos) of which we know little or nothing. It is in that manifold where the source of sentience and the unity of life manifest their primal reality and continuity.
- 3.1.4. Primitive native populations lived in seeming 'harmony with nature' not through the blessing of any special wisdom, but because through lack of knowledge or poor institutions including constant warfare, their numbers almost never reached sufficient levels to impact their environment. (The numerous Mayans who also trashed their environment are an illustrative exception that proves the point.)
- 3.1.5. All resources, treated as a commons by its consumers, will ultimately be destroyed (per Garrett Hardin's '[Tragedy of the Commons](#)'). A commons is a shared resource for which the current marginal cost of its consumption to individuals is less than the future derived benefit during its viable life. Altruistic individual behavior to prolong the life of a commons is not rewarded; instead it is punished to the extent that the individual's sustenance derives from the commons. This truth manifests itself most forcefully in the 'population equation' that describes the oscillations and extinctions in populations of all creatures, organizations, and markets.
- 3.1.6. All criterion functions (i.e. defined utilitarian quantifications of good and bad) of practical value are inherently subjective. Real world criteria contain multiple,

conflicting attributes which contend with each other in their value, effects, and variability.

- 3.1.7. All policies claiming the ‘greatest good for the greatest number’ per se are suspect, and most likely are advanced by the ignorant or scoundrels to promote their own narrow interests. (cf. [Arrow’s theorem](#))
- 3.1.8. The advanced segments of a population should support the trailing segments only to the extent that such support will ultimately promote further advancement of these leading segments. In short, in the aggregate it behooves the strong/wise to leave the weak/stupid behind. Corollary - there is no benefit to a species from any policies of outcome egalitarianism or ‘equal advancement’ save a temporary and/or local societal stability that, if continued and/or expanded, leads to ultimate disaster. (Another aspect of the ‘tragedy of the tails’.)
- 3.1.9. Social life (i.e. life to the admitted benefit of multiple critters) is only possible to the extent that the participating individuals can mutually predict each other’s behavior, and that such behaviors are perceived beneficial by and for the predicting individuals.
- 3.1.10. Due to §3.1.9 we have social contracts embedded as institutions which constrain individual behaviors to predictable and acceptable bounds (such contracts make attainable the formal ‘system identification problem’ between all subscribing individuals of social group).
- 3.1.11. To exist, a nation-state requires of its citizens sufficient trust in their fellows, beyond family and kin, so that specialization of labor can take place to provide the benefits of a successful economy practiced in an environment of security and respect for each other’s non-economic (e.g. spiritual) values.
 - 3.1.11.1. Nation-states do best when made up of the fewest number of cohesive liberal cultures. Cultures and genetics of a people respond to evolutionary pressures and determine which institutions societies will embrace to their benefit. Corollary – not all cultures and people of specifically evolved genotypes are able to embrace and successfully implement all types of institutions. This impacts how well institutions may be transplanted from culture to culture. [See *A Troublesome Inheritance* (2014), Nicholas Wade]
- 3.1.12. Social stability requires equal opportunity for its members, the implementation of which does not guarantee nor will ever result in equal (in a demographic sense) achievement or outcome. In short, opportunity egalitarianism works in opposition to outcome equity which leads to failure and instability. Corollary - equality and liberty are antithetical; policies increasing one necessarily decrease the other.
- 3.1.13. No decision should or can be delayed until “all the information is in”. Experience and heuristics always make up the shortfall when a further delay begins to diminish the decision’s utility. Corollary - all real world decisions are made in the context of imperfect and incomplete information (hence the beneficence of the Reverend Bayes’ probabilistics).
- 3.1.14. All people demand to be an acknowledged part of and relevant to their current environment. An individual is ‘empowered’ to the extent that he can either hope to achieve relevancy, or can modify (e.g. simplify through destruction) his environment so that relevancy may then be achieved within his more limited abilities. Almost all people will act so as to maximize their individual sense of

relevancy. Corollary - A primary aim of a free society should be to differentially (stereotypically) promote through its institutions the relevancy of all of its members above some widely accepted minimum threshold.

3.1.15. Social structures such as institutes, corporations, government units, as they grow, first become inefficient and then, through faulty organic feedback mechanisms, transform into a predatory cancer on the citizens of any state in which they are allowed to exercise power and expand without bound. Therefore governments should be kept as small as possible to organize and serve their jurisdictions, but no smaller.

3.1.16. Free Market Capitalism – Society's price communicated commercial activities provide the most bounty and the highest aggregate quality of life when prudently and minimally regulated, and private sector capitalism is allowed to flourish in equally tended free markets.

3.2. The Individual

3.2.1. Altruism is sufficiently rare in humans so that no reasonable public policy should be made in hopes of its expected expression. However, public policy should allow altruism to flourish where it can – i.e. avoid 'no good deed shall go unpunished'.

3.2.2. Limits of Trust - Almost all critters trust another being/thing/process only to the extent that his/its behavior can be reliably predicted. Corollary - you deform, destroy, or distance yourself from things or critters whose behavior you cannot effectively predict, and therefore trust. This serves as an operational definition of trust.

3.2.3. Judicious discriminatory behavior is the hidden and necessary facilitator of survival, progress, and life itself for all critters great and small.

3.2.4. Prejudice (pre-stored decision algorithm) is the efficient and utilitarian encoding (usually in the Bayesian sense) of knowledge derived from experience, hearsay, and tradition. It is mostly, but not always, accurate and therefore useful.

3.2.5. Prejudice makes possible the practical daily round for all critters of limited observational, processing, and knowledge storing capacities - i.e. for all of us.

3.2.6. Experience is encoded and stored as sets of discriminatory prejudices. Although always necessary, such encodings are not uniformly reliable.

3.2.7. Literacy lets us describe/record the affairs of living, and to communicate (or at least label for later retrieval) certain complex ideas.

3.2.8. Numeracy permits creation of and thinking about complex ideas, and is the necessary mindful basis for any systematic cognition and 'systems thinking' about the world as opposed to mindless application of learned and/or inherited rules of thumb (e.g. calcified tradition and destructive prejudices).

3.2.9. Most knowledge about nature and the affairs of man is inaccessible to innumerates, which today, unfortunately, includes almost all of the people now alive.

3.3. Motivations & Reward – charity begins at home. People are motivated first by the promise of a better life for themselves and theirs. To the extent that those needs are sufficiently assured, goodwill, cooperation, charity, and selflessness will spread in ever widening circles. Corollary – government should do all to allow people to first succeed by and for themselves, and then voluntarily contribute to the success of others.

4. America, a Nation

- 4.1. America is an historically exceptional sovereign nation-state whose governance is based on its Constitution as amended. Absent that basis, America per se will no longer exist.
- 4.2. Constitutionality – Interpretation of the US Constitution according to the intent of the Founders as explicated in their writings. Recognizing also that the Constitution is a living document and contains explicit directions on how it may be modified to best serve future generations. Modifying it by other non-constitutional means – e.g. from the judiciary bench – undermines the Constitution and our national weal.
- 4.3. The United States was constituted as a democratic republic comprised of the several states retaining the preponderance of rights to manage their own affairs as competing laboratories of liberal governance in a national federation of citizens free to move and trade throughout the country. All efforts to remove republican functions and progress toward a pure democracy are inherently detrimental to our national survival. All forms of collectivism, especially collectivism founded on a direct democracy, are inherently unstable and rapidly pass through autocracy to tyranny.
- 4.4. America, as an historically exceptional nation-state, has been critical to the beneficial development of Mankind during its short existence.
- 4.5. Liberty and Opportunity – Government should always seek to provide and ensure the maximum of individual liberties to its citizens. As policy, it should err on the side of more rather than less liberty. The opportunities provided in our land have always been best when measured at the starting line of the competing participants, and not at the finish line. Gratuitous enforcement of equalities should be minimized with the realization that state-enforced equity is always bought and paid for by the surrender of liberty – they are at opposite ends of the social see-saw.
- 4.6. Limited and Fiscally Prudent Government – Federal government should only perform the functions delineated in the Constitution, and do so in a minimalist manner. Government is always a necessary encroacher on our individual liberties, and the bigger the government, the fewer the freedoms retained by those governed. In no case should government become the competitor of private enterprise in the goods and services better supplied by private enterprise. Government should manage its fiscal affairs as any other prudent and prospering enterprise, wherein it spends no more than it collects in revenues, and does not become a corrupt pawn of its creditors to the detriment of its future generations.
- 4.7. ‘A nation ignorant and free, that never was and never shall be.’ (Thomas Jefferson paraphrased.)
 - 4.7.1. A nation is the joining of a people on a defined landmass such that the people, at any given time, retain control of or are controlled by one government.
 - 4.7.2. At any one time a nation can have any one type of a number of governments. Corollary - it is possible to love a nation and not its government, as it is possible to love a form of government and not a particular nation so governed.
 - 4.7.3. Nature neither recognizes nor implements the notion of ‘rights’ to any individual or group. Rights are widely-held, arbitrary notions of benefices, protections, permissions, and latitudes for individual behaviors in a society which are useful for making and implementing public policy and communicating its underlying social contract. Rights (and obligations) are at times ascribed to a ‘higher source’ when their socially utilitarian foundation is either too complex for the populace to

- understand, or may inadvertently reveal the illegitimate intentions of the law giver/enforcer (e.g. the state).
- 4.7.4. Rights derive only from the explicitly stated part of a social contract. Enumerated rights benefit a society in inverse proportion to their number. Rights are government specific and exist only to the extent that they are guaranteed by the state. (Also see ‘What is a RIGHT?’, gjr 14nov98) Corollary – the current large-scale understanding of rights and the expanded mindless use of the term in the United States is dysfunctional in the societal sense.
- 4.7.5. The ‘inalienability’ of any right holds to the extent that its source social contract promotes stability and individual well-being as such right is exercised by any member or subgroup of such right-professing society. The minimal co-dependent set of rights for a salutary and stable society comprise the so-called Bastiat Triangle consisting of the rights to security of one’s person, liberty of actions, ownership of property. (See also US Constitution, 5th Amendment)
- 4.8. Gun Rights & Second Amendment – the keeping and bearing of arms is in the Constitution only for insuring the ability of the people to overthrow their government when it becomes tyrannical. The concept of par force (q.v.) should define the types of arms that law abiding civilians may possess and maintain at the ready.
- 4.9. Labor Unions
- 4.9.1. Public Service Unions – to the extent that government provides a service not possible from the private sector, then those serving employees, as instruments of government power, may not belong to a union. And to the extent that government provides a service that is better provided by the private sector, then government should no longer provide that service.
- 4.9.2. Private Sector Unions – Having a job is not a right. The worker works at the pleasure of the employer who contracts work at the pleasure of the worker under the terms of a mutually agreed contract effected before work starts. Either party in the exercise of their liberties does have the right to not enter into any contract against his will. Labor is free to organize in such an environment. A private enterprise is free to reject hiring workers so organized.
- 4.10. Citizenship and Voting – Citizenship, uncategorical, equal, and without rank, is the highest station the country can give to those who live within its borders. A citizen is always first in line to receive the benefits of his government, and the consideration of his fellow citizens. The national policy should be such as to minimize the number of illegal aliens living in our midst through provision of secure borders, enforcement of alien laws, and propitious immigration laws that serve the national interest. No alien has a right to become a US citizen save through the pleasure and benevolence of the US federal government.
- 4.11. The right to vote in elections is granted only to franchised citizens, their franchise specifics being determined by the federal, state, and local governments as appropriate. Specifics of the voting franchise -
- 4.11.1. Only citizens may vote.
- 4.11.2. The vote shall not be denied any citizen on the basis of race, gender, sexual orientation, educational background, ownership of property, status of wealth/indebtedness, or condition of un/employment.

- 4.11.3. No one institutionalized for mental or criminal reasons (including being on parole) shall be granted suffrage. However, once being released as recovered and/or remediated, full voting privileges should be restored upon passing the applicable literacy/numeracy test described below.
- 4.11.4. Voters shall pass a basic literacy test (similar to drivers' license tests) before granted suffrage, and periodically (say every ten years) thereafter. Voters must demonstrate 'functional literacy' as defined by the Dept of Education (see [NAAL](#), the longitudinal survey of adult literacy conducted by the National Center for Educational Statistics). The test shall also include and/or be given within the context of the informational requirements demanded of naturalized citizens as determined by the federal government.
- 4.11.5. Voters shall demonstrate minimal numeracy ('numerical literacy') skills in basic arithmetic (add, subtract, multiply, divide) including understanding the size of numbers and what is a percentage. Again see the NCES longitudinal survey.
- 4.11.6. There should be no limit to the number of times such test may be taken.
- 4.11.7. The voter eligibility status should be reflected on a person's driver's license, state issued ID, or other such commonly carried form of identification that can be presented to poll or voter registration workers (or its PIN entered for online voting or by snail mail).

5. US Foreign Policy

- 5.1. America as a world hegemon. The United States should be militarily able to defend itself against any aggressor on Earth. National security is Job One of the federal government. The US should join with other nations only to the extent necessary to promote its openly announced national interests; such unions should be minimized as appropriate. Foreign aid should be provided visibly, and only to recipients in a manner that serves our national interests. Foreign trade should be maximized to the extent that it does not conflict with our national interests.
- 5.2. In international affairs US should adopt a version of Principled Negotiation, as developed in the Harvard Negotiation Project (q.v.), and also promote its use by our foreign counterparts. The application and use of openly accessed fair division algorithms (q.v.) should be maximized.

6. US Domestic Policy

- 6.1. States Rights and federalism – federalism should be re-established and the states should again become the several laboratories of democratic governance to generate and demonstrate their 'best practices' to all states.
- 6.2. Redistribution of wealth in pre-Singularity years – due to growing systemic unemployment, America's generated wealth must be redistributed. The best methods of redistribution will involve setting up synthetic labor markets that can deliver social good through employment of uneducable and/or poorly educated workers. Alternative forms of a guaranteed national income should also be considered as systemic unemployment worsens.
- 6.3. Parenting and Children
 - 6.3.1. Parents (except if imbecile or insane) should be the final arbiters of their children's lives, and the family relationship should be the most sacrosanct of human

relationships in which the members are responsible only to each other and their god. Government has no business inserting itself into this relationship.

- 6.3.2. Abortion – as a corollary to 6.3.1, a single mother or the parents have the right to dispose of their children as they wish (also biblical dictum). While this supports a woman’s right to choose abortion, I do not support the parental sacrifice of children born or unborn unless it becomes a dire tradeoff between saving the more valuable life/lives as opposed to those less valuable.
- 6.3.3. Education – the federal government should have no role in education and training US residents save what is required for developing and maintaining skills unique to national security (e.g. military). Government involvement in education should always be implemented at the lowest possible levels, and never higher than that of the several states. Private educational institutions and (especially online) ventures should not be impeded in competing with government schools.
- 6.3.4. It is most beneficial to children that they should be born into and/or raised in a home made by a loving heterosexual couple.
- 6.4. Public service unions – all unions for public service employees should be prohibited as being demonstrably inimical to public welfare (see also §4.9).

7. Economics & Finance

- 7.1. An economy is a system in the same sense that a society is. The so-called Austrian school of economics most accurately prescribes the socially beneficent operation of economies.
- 7.2. Money – money is a commodity that is a convenient medium of exchange, unit of account, and a store of value. Its manufacture, storage, and management should be handled by the private sector (banks, mints, ...) with minimal government involvement focused mainly on certifying the inventories of stored money and their issued depository certificates. The government can also oversee the online publishing of the current money supply. Under no circumstances should fiat (‘faith based’) money substitutes be allowed under the laws of the land.
- 7.3. Subsidies – subsidies and other types of transfer payments should be minimized under the general rubric of ‘starving the beast’ of government. Corruption is minimized and governance is enhanced when politically and bureaucratically directed government money flows are minimized.
 - 7.3.1. Corporate and Agriculture – directed subsidies to corporations and agriculture should be eliminated, and carefully reinstated only if needed during national emergencies.
 - 7.3.2. Research – federal government should only fund research necessary for clearly stated national security objectives. Such research should be performed primarily in the national laboratories. Corporations and private foundations should support other research within their own and partnering academic institutions.
 - 7.3.3. Non-profits – government funding of non-profit organizations should be minimized and/or eliminated. Governments should encourage private sector support of non-profit organizations.

8. Science/Technology

- 8.1. Mathematics is humanity's highest intellectual achievement, and as a language it supports modes of thought not available to those who do not speak it. (Sapir-Whorf)
- 8.2. Nature abhors large, centrally controlled systems. Instead it creates its gloriously manifold variety and achieves stability (to the extent it is stable) through many independent yet interrelated systems based on widely distributed control schemes working primarily on local knowledge. Corollary - the desire to build and operate large, centrally controlled systems is intrinsically unnatural, inimical to human welfare, and the product of ignorant and/or desperate minds seeking to impose small-scale simplicity onto complex large-scale problems. Human history is largely the story of the failures of such collectivist enterprises.
- 8.3. The successful management of any system (e.g. national economy, church organization, school district, computer network, business, airplane, ...) depends on knowledge of and agreement about several independent factors, the failure of any of which can (and usually does) make the system unmanageable. Here the important factors are:
 - 8.3.1. System definition – a commonly agreed collection of attributes and 'working parts' the grouping of which serves communication, analysis of function, and prediction of behavior to achieve useful ends. This specifically includes common definitions of system state, observation, control, and environmental (uncontrollable exogenous) variables. In general, defined systems are abstracts of nature used by intelligent beings to structure and inform their cognitive environment.
 - 8.3.2. The state of a system is that minimum set of defining variables, the present knowledge of which, allows the separation of the system's past history and predicted future.
 - 8.3.3. System Identification prescribes the time dependent relationship of system state, control, and environmental variables. This is embodied in the so-called 'system transfer function' (i.e. describes how system state transfers from one set of values to another in response to inputs and the passage of time).
 - 8.3.4. Performance Criterion Function - a subjective but quantifiable measure, dependent on system state variables and control effort, which defines 'good' and 'bad' system performance as accepted by the participants in the enterprise of designing and/or operating a system.
 - 8.3.5. System Observability requires that enough of a system's state may be observable (measurable) by the controller (e.g. manager, bureaucrat, ...) so that any control policy (or law) intended to extremize (maximize or minimize) the performance criterion can be implemented.
 - 8.3.6. Computability of the transfer function so that useful predictions of future states or understanding of past behaviors can be obtained from supplying 'what if' control and environmental inputs. (Unfortunately, complexity and chaotic behavior issues mitigate against accurate computability and therefore the reliable prediction of most realworld systems. See estimation theory.)
 - 8.3.7. Timeliness so that all of the above factors can be implemented before the system state migrates excessively, thereby dating (i.e. making useless or obsolete) the most recent observables and/or contemplated control policy.
 - 8.3.8. System Optimization (in terms of transfer function and/or control law) – the ability to extremize the mutually adopted criterion from a time/space (i.e. practical)

point of view. And, if not able to extremize, then at least to find a ‘satisficing solution’ – a useful result from an implementable control policy.

- 8.4. Any system - economic, political, mechanical, ... - may be managed (i.e. controlled in the attempt to extremize a performance criterion) only to the extent that the manager can comprehend, observe, and control the system. Corollary - control without comprehension and/or observation leads to breakdown (e.g. revolution from within or destruction from without for social systems; more simply, consider the chimpanzee at the controls of a 747 at 30,000 ft.).
- 8.5. Most identified or identifiable large scale systems cannot be centrally managed by one finite sapient controller - perhaps only a very few systems can. Corollary - attempt to control only smaller scale and observable systems that you can understand.
- 8.6. All ‘systems’ – natural, living, and assembled – achieve their highest levels of performance (achievement) at the edge of their ‘stability envelope’ where the risk of going unstable (e.g. self-destructing or failing) is highest. Therefore, to extend the envelope of ANY system requires the undertaking of risk without which no purposeful advancement in any endeavor is possible.

9. The Visible Future

- 9.1. Most of nature is unobservable and chaotic in the formal sense, thereby limiting accurate and timely (i.e. useful) predictions, and making all but the near future inaccessible to us.
- 9.2. Accelerating technology and the Singularity – technology (e.g. AI, robotics, quantum computing, fusion, genomics) will continue accelerating so that it is likely that machines will achieve peer or sufficiently peer intelligence (sapience) with humans before 2050. This will launch a socially disruptive epoch never before seen in the annals of human history. In these pre-Singularity years systemic unemployment and its correlative effect on wealth distribution will become the greatest challenge to social order and its governance.

10. Links (transfer to Wordpress)

- 10.1. http://rebaneruminations.typepad.com/rebanes_ruminations/2011/11/the-views-of-a-rightwing-extremist-indictment-without-evidence.html
- 10.2. http://rebaneruminations.typepad.com/rebanes_ruminations/2013/11/pay-attention-to-the-politics-its-only-your-job.html
- 10.3. http://rebaneruminations.typepad.com/rebanes_ruminations/2013/08/approaches-to-effective-education.html#more
- 10.4. http://rebaneruminations.typepad.com/rebanes_ruminations/2013/03/come-let-us-reason-together-.html
- 10.5. http://rebaneruminations.typepad.com/rebanes_ruminations/2007/12/i-am-not-a-jour.html
- 10.6. http://www.pon.harvard.edu/category/research_projects/harvard-negotiation-project/
- 10.7. http://rebaneruminations.typepad.com/rebanes_ruminations/2008/04/par-force-an-un.html