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**Is the Science of Socionomics Able to Portend a Change in the  
United States' Economic Might?**

by

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## **Abstract**

Is it possible to accurately portend the rise and fall of a country's power? Would having such knowledge, such as the prediction of an imminent change in America's economic base, have a profound effect on the defense industrial base of the United States? This paper will explore the possibility that the cycle of international global power that the United States currently enjoys will reverse course and lead to a decline lasting many decades.

The paper opens with the topic question above and begins with a review of Gilpin's *War and Change in World Politics* and the cycles of change he has gleaned regarding world powers over the course of history.

Gilpin's shortcomings will then be discussed through the eyes of socionomics; the study of how changes in social mood affect markets and trends. The discussion will then entail how socionomics via social mood and Elliott Wave Theory is the next disruptive breakthrough needed to be better able to glean the rise and fall of empires.

Present day issues and considerations regarding current Elliott Wave Theory are discussed. The challenges of future economic decay and likely national challenges are outlined.

Ultimately, the author does believe that Elliott Wave Theory and socionomics has much to offer, and is the next logical link in prognosticating the study of national cycles and change.

### The Question

Is it possible to predict the rise and fall of a country's power? Would having such knowledge, such as an imminent change in America's economic base, have a profound effect on the defense industrial base of the United States? This paper will explore the possibility that the cycle of international global power that the United States currently enjoys will reverse course and lead to a decline lasting many decades.

All countries basically transition through five steps of a life cycle: birth, expansion, maturity, decay and eventually demise. This is a fairly common understanding amongst most individuals who have had the most basic study in history. Societies come and go.

What if it were possible to predict with greater precision the rise and fall of a country's power via its economic might? The cycle of world powers is not a secret to many historians. However, the predictability of anticipating this change has often proved elusive. Gilpin's *War and Change in World Politics* and Kennedy's *The Rise and Fall of the Great Powers* address this cycle of world powers.

### Gilpin

This paper will focus on Robert Gilpin's *War and Change in World Politics*. Gilpin's work offers a process of international political change in the figure below.<sup>1</sup>

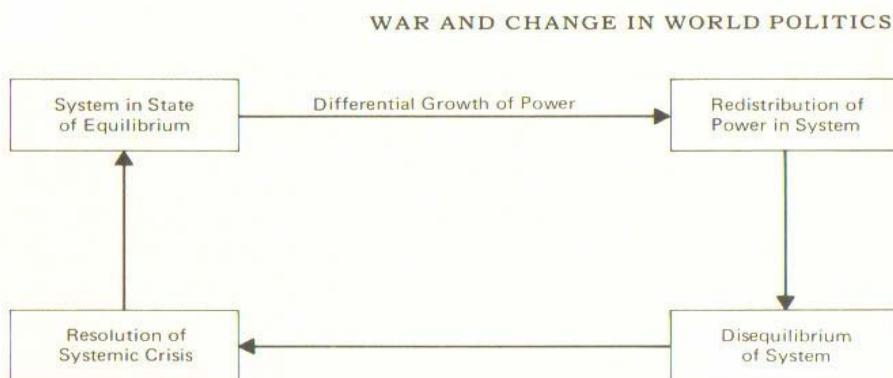


Figure 1. Diagram of international political change.

*War and Change in World Politics*<sup>2</sup> covers a basic framework for understanding international political change:

**The conceptualization on international political change to be presented in this book rests on a set of assumptions regarding the behavior of states:**

- 1. An international system is stable (i.e., in a state of equilibrium) if no state believes it profitable to attempt to change the system.**
- 2. A state will attempt to change the international system if the expected benefits exceed the expected costs (i.e., if there is an expected net gain).**
- 3. A state will seek to change the international system through territory, political, and economic expansion until the marginal costs of further changes are equal to or greater than the marginal benefits.**
- 4. Once an equilibrium between costs and benefits of further change and expansion is reached, the tendency is for the economic costs of maintaining the status quo to rise faster than the economic capacity to support the status quo.**
- 5. If the disequilibrium in the international system is not resolved, then the system will be changed, and a new equilibrium reflecting the redistribution of power will be established.**

Seeing the parallels between Gilpin's work below and where the United States is today will provide a better understanding of his ideas and how they might portend a concomitant change in America's global power.

### Growth and Expansion

“As the power of a state increases, it seeks to extend its territorial control, its political influence, and/or its domination of the international economy.”<sup>2</sup> If this process were linear you would eventually have one state that was master of all. However, this process is not linear. After growth comes maturity and then decline. As a state grows it will encounter more oppositional forces. Eventually, the costs to administer further growth are larger than any net benefit of such expansion. This process begins to limit further expansion.<sup>3</sup>

In the premodern world expansion typically took the form of territorial expansion. In the modern world, however, expansion has typically encompassed economic and political expansion.

One of the reasons for this is that markets are much more efficient than other forms of human organization. It could be summarized in the ubiquitous “invisible hand” of the market place.<sup>4</sup>

### Equilibrium and Decline

Once that state of expansive equilibrium is reached, developments from internal and external sources begin to undermine the state. As a result, the costs of maintaining its current international environment rise faster than the relative benefit it receives from such a position. Disequilibrium will start to prevail once this turning point has occurred.

A society’s expenditures are generally distributed amongst three sources: protection, consumption and productive investment. While a country is expanding it generally has a growing pool of resources to allocate amongst all three categories. However, once equilibrium sets in there is a historical tendency for protection and consumption costs to increase as society ages. This forebodes a decrease in the real amount of resources that are invested in productive investment. Ultimately the efficiency and productivity of the productive investment sector will decline. When this decline starts it becomes more difficult to meet the demands of protection and consumption and this eventually ‘undermines the economic, military and political foundations of a state’s international position.’<sup>5</sup>

One of the internal changes that lead to an economic decline is the tendency for the state’s military costs to rise rapidly. Adam Smith observed that as a society ages its war expenditures rise at an alarming rate. Part of the reason is the diffusion of military technologies from the dominant state to up-and-coming competitors forces the dominant state to develop ever more elaborate, formidable and costly weapon systems. These military consumption items represent a net drain on the national fiscal balance sheet and arrogate funds from private consumption and investment. This often leads to social strife and often turns into a ‘guns or

butter' debate for society. As long as the society continues to grow the three competing resources are likely to be contained. However, if the economic decay spiral starts then social turmoil is not likely to be avoided. A society must then choose between reducing (1) consumption, (2) protection, or (3) investment. Denizens of the United States are not likely to voluntarily reduce consumption items. Reducing protection raises the possibility of threatening competitors. Reducing investment erodes the entire economic base upon which everything is built.<sup>6</sup>

'Perhaps the most significant changes that undermine the power of the dominant state are structural changes in its economy.'<sup>7</sup> There are various underlying causes but every society eventually declines due to an erosion of its economic base. For sure, there have been some societies that have rejuvenated themselves and prolonged their hegemonic power for periods of time (China for many centuries, Great Britain).<sup>8</sup> However, the number of those societies is few, and they all eventually declined from within due to an economic decay.

### Hegemonic War and International Change

Disequilibrium in the international system will create challenges for the dominant states and opportunities for the rising states. At this point the costs of the dominant state are rising while the economic base of its support is quickly decaying. The rising challenger, who is enjoying growth coupled with vastly reduced costs, eyes the dominant state and prepares for a challenge to the international status quo. The perceived benefits to the challenger outweigh the perceived potential costs. At this point the dominant state can (1) choose to increase its resources allocated to maintaining 'its commitments and position in the international environment' or (2) reduce its commitments.<sup>9</sup> Most dominant states will not voluntarily reduce commitments or increase taxation to increase the resources allocated to maintaining current commitments. The usual result is inflationary actions and spending beyond their economic means – which

ultimately hastens the economic decline previously mentioned.<sup>10</sup> Gilpin sums up nicely what a declining society has to look forward to:

A declining society experiences a vicious cycle of decay and immobility, much as a rising society enjoys a virtuous cycle of growth and expansion. On the one hand, decline is accompanied by lack of social cooperation, by emphasis on rights rather than emphasis on duty, and by decreasing productivity. On the other hand, the frustration and pessimism generated by this gloomy atmosphere inhibit renewal and innovation. The failure to innovate accentuates the decline and its psychologically debilitating consequences. Once caught up in this cycle, it is difficult for the society to break out. For this reason, a more rational and more efficient use of existing resources to meet increasing military and productive needs is seldom achieved.”<sup>11</sup>

“Perhaps the greatest danger for every imperial or hegemonic power, as it proved eventually to be for Rome, is overextension of commitments that gradually begin to sap its strength.”<sup>12</sup>

Hegemonic war has been the historical agent of change in world politics and with the rise of a new power the cycle of dominance, maturity, challenges, disequilibrium, decline, struggle and change will repeat again. Great pent up forces are unleashed in war and the prognostication of such outcomes is all but impossible.<sup>13</sup>

### Gilpin and Kennedy on Cycles

Gilpin writes “the importance of hegemonic wars in diverting history into new channels has stimulated numerous scholars to inquire if their occurrences are governed by a historical law and if they display a discernible pattern...., a recurring cycle of war and peace.”<sup>14</sup> “Although Modelski’s idea of cycles of war and peace is intellectually attractive, the difficulties of long-wave theories in politics as in economics is that no mechanism is known to exist that can explain them.... although a hundred-year cycle of war and peace may exist, until the mechanism that ... generates the cycles is defined, the idea must remain speculative, albeit interesting.”<sup>15</sup>

In *The Rise and Fall of the Great Powers* Paul Kennedy discusses the vital importance of economic forces in the cycle of the empire and the dilemma of spending national resources on military versus productive expenditures. Kennedy and Gilpin share the belief that there are certain repeating factors that contribute to the rise and fall of the great powers, but Kennedy, like Gilpin, fails to describe how those cycles operate with any increased precision.<sup>16</sup> Sconomics and Elliott Wave Theory offer much to the debate surrounding the rise and fall of a country's power and whether it is at all possible to define this pattern. A disruptive breakthrough in the field of sconomics exists that is better able to identify this national cycle.

It is true that Gilpin's work is very provocative. However, as a predictive work it fell short in many ways. *War and Change in World Politics* mentions in the epilogue that "the Soviet Union is, of course, the rising challenger, and it appears to be the one power that in the years to come could supplant the American dominance over the international system."<sup>17</sup> And, of course, history told another story. The Soviet empire collapsed in 1990. Gilpin's guesswork turned out to be wrong. Sconomic theory adds to his work and illustrates the nature of his mistake.

At the time *War and Change* was published America was just about to recover from its economic malaise and have another episode of growth and expansion, which dated from 1982 until 2000. Through the eyes of sconomics and Elliott Wave Theory, the 1966-1982 malaise would have been recognized as a correction in the larger trend. Another episode of explosive growth in America's economic might started in 1982. Hard times do not last forever, and indeed they were about to end for America in 1982. However, good times do not last forever either, and sconomic theory would argue that the probability of continued national good times for the United States is quickly receding.

## Socionomic Theory

Socionomics postulates that it is not social events that determine social mood, but a collective social mood that creates important social events. For example, a rising national stock market does not put people in a good mood. It is because people are in a good mood that they purchase stocks; rising optimism leads to a rising willingness to pay increased prices for equities.

Socionomics is based on the natural rhythm in human emotions. While the human emotions of any individual can be difficult to define and measure it is possible to define positive and negative values to collective human emotions (social mood). As a brief sample, a positive social mood would coincide with such feelings as happiness, inclusion, concord, benevolence, and optimism. A negative social mood would correlate with unhappiness, exclusion, discord, malevolence and pessimism.<sup>18</sup> These are the parameters that socionomic theory can help measure, namely, the cycle from one mood extreme to the other. The same socionomic cycle that measures mood changes is also able to measure national cycles of rise and decline.

The national sense of optimism and pessimism waxes and wanes like a pendulum gliding back and forth, but how to measure it? It turns out that American and British financial markets are the best and most comprehensive indicator of American national mood because of their detailed and lengthy historical records and because they respond to national mood changes very quickly. Most equity markets, including those of the United States, rise and fall in a somewhat consistent form that is best described using Elliott Wave Theory. For a much more detailed analysis readers should obtain *Elliott Wave Principle*, which is currently the most authoritative book on this subject matter.<sup>19</sup> Elliott Wave Theory predicated, and provided a foundation for, the field of socionomics. Socionomics is the science of how societies display their esoteric waxing

and waning national moods. We will see how understanding wave theory can help a country understand where it is with regards to the increase or decrease of its hegemonic power.

### Elliott Wave Theory

Societies, equity markets, and even organic life forms run through the five phases mentioned earlier: birth, growth, maturity, decay, and death. Each has a fairly uniform pattern. Elliott Wave Theory offers a cogent platform with which to measure these natural cycles. Elliot Wave Theory shows basic waves of growth (expansion) followed by waves of correction (regression).

Market waves of progress usually take the form of five waves (the primary trend). Market waves of correction (moves against the primary trend), usually take a series of corrective waves that accomplish a partial regression of the prior expansion. These waves are self-repeating fractals, and they self-replicate at ever larger degrees of the same trend. “The primary cause of each type of action is the same: social mood trends”<sup>20</sup> such as optimism or pessimism.

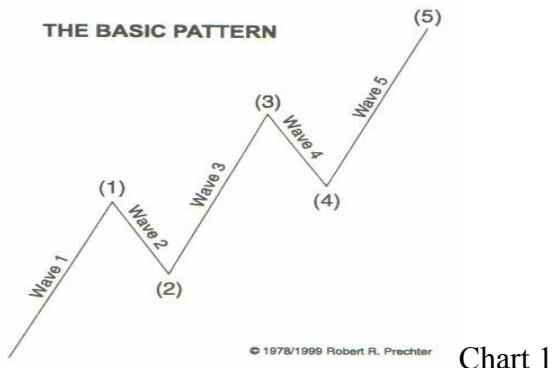


Chart 1

Chart 1. Reprinted from Prechter, *The Wave Principle of Human Social Behavior and the New Science of Socionomics*, 1999: 24.

Chart 1 above shows the basic pattern. Most processes of growth take the form of five waves. Waves 1, 3 and 5 move in the direction of the larger trend. Waves 2 and 4 are corrections, or breathers, in the movement of the larger trend.

Chart 2 below shows what will typically happen after the movement of your first 5 waves shown above. Hence, you have some type of larger correction to retrace a portion of the previous 5-wave movement. This correction is most easily referred to as an A, B, and C wave correction. It is important to realize that trends, or markets, never move in a straight line. There is always give-and-take, or an inhaling-and-exhaling, within the larger trend.

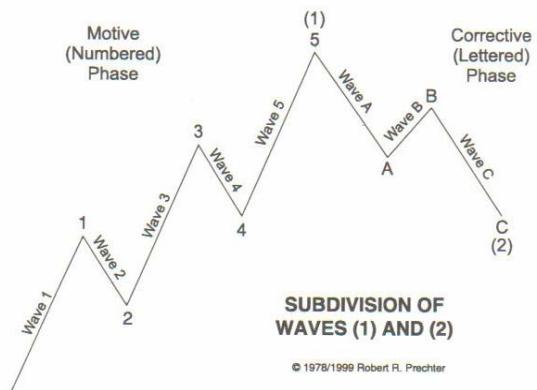


Chart 2

Chart 2. Reprinted from Prechter, *The Wave Principle of Human Social Behavior and the New Science of Socionomics*, 1999: 25.

Chart 3 below takes the waves of Chart 2 above and further subdivides them into smaller waves of self-replicating fractals. Waves can encompass very small time units or many decades.

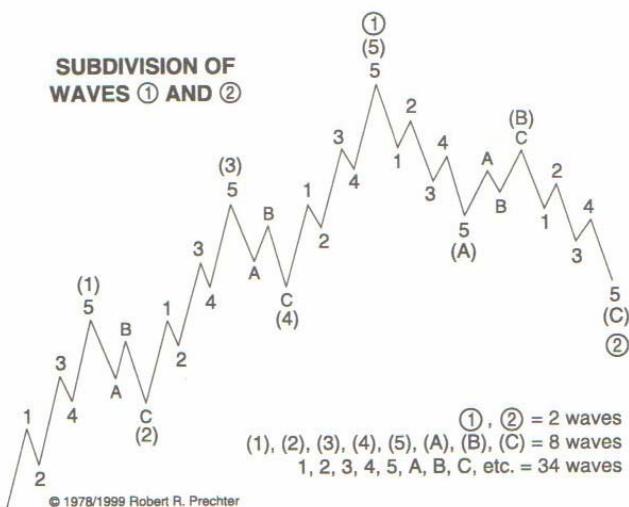


Chart 3

Chart 3. Reprinted from Prechter, *The Wave Principle of Human Social Behavior and the New Science of Socionomics*, 1999: 26.

To put it another way, you can see something similar to Chart 3 occur on a daily basis or a multi-decade basis.

Chart 5 below is a “grand supercycle wave” – it covers hundreds of years. The nomenclature is not important, but what is, is that Elliott Wave Theory allows a more precise way to analyze the ideas presented by Gilpin. Elliott Wave Theory as espoused in Prechter’s *The Wave Principle of Human Social Behavior and the New Science of Socionomics* shows an intriguing wave graph that displays the progress and regression of humanity stemming back to the Dark Ages through the Crusades, Renaissance, American/French Revolutions and the following strides in the individual, industrial and technological revolutions.<sup>21</sup>

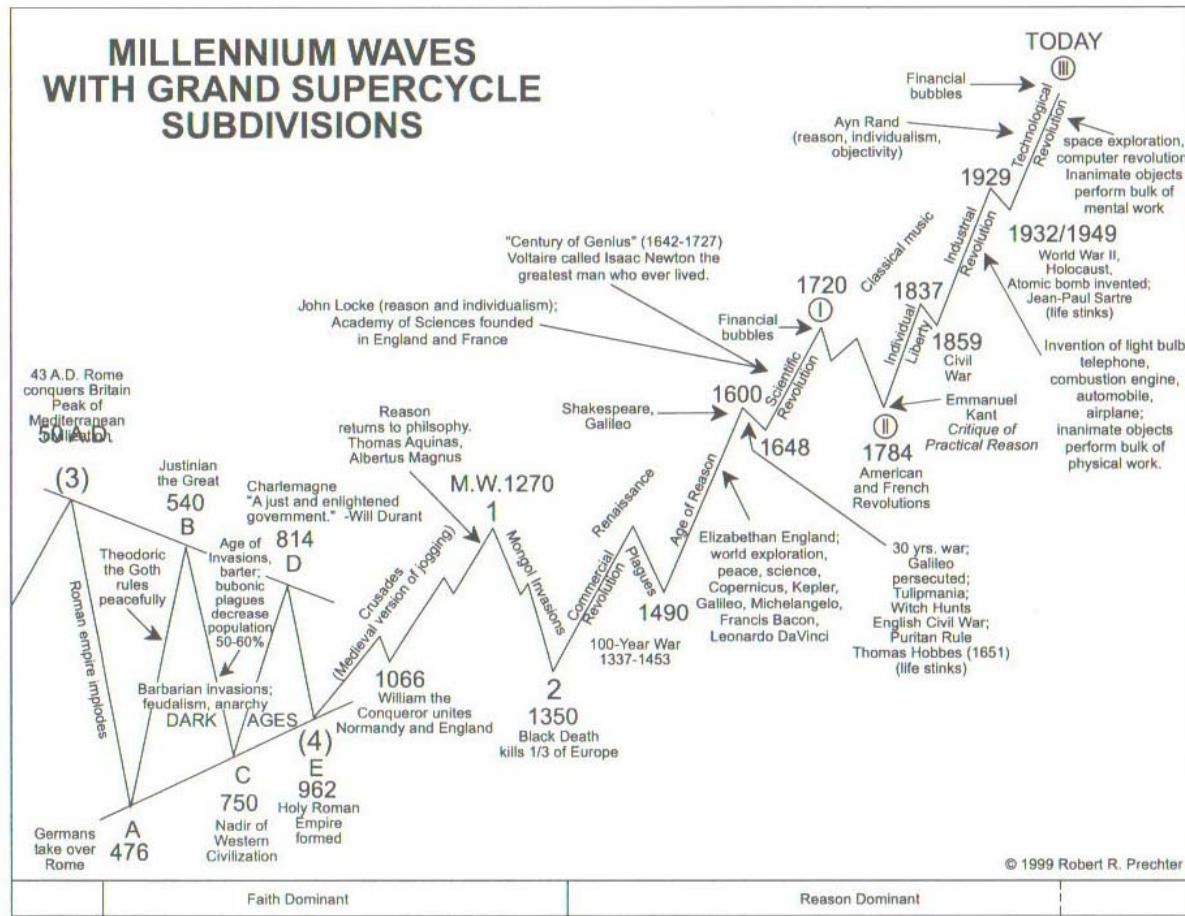


Chart 5

Chart 5. Reprinted from Prechter, *The Wave Principle of Human Social Behavior and the New Science of Socionomics*, 1999: 345.

All life forms have a life cycle. A tree (or an animal, human, or society) will grow until it has matured and then it will stop growing – expansion is done – and decay is now the primary trend. No tree you see will grow to the sky. Since humans dictate a market's ups and downs it follows that markets will grow to their point of maturity and then enter a declining phase.

### Elliott Wave Theory, Socionomics and War

A disruptive breakthrough is possible with the understanding that stock market movements have strong associations with the bellicose behavior of the American polity. As mentioned before this is because the stock market is the most precise and sensitive measure of the national mood, and we now know this field of study is called socionomics. Chart 7 below is

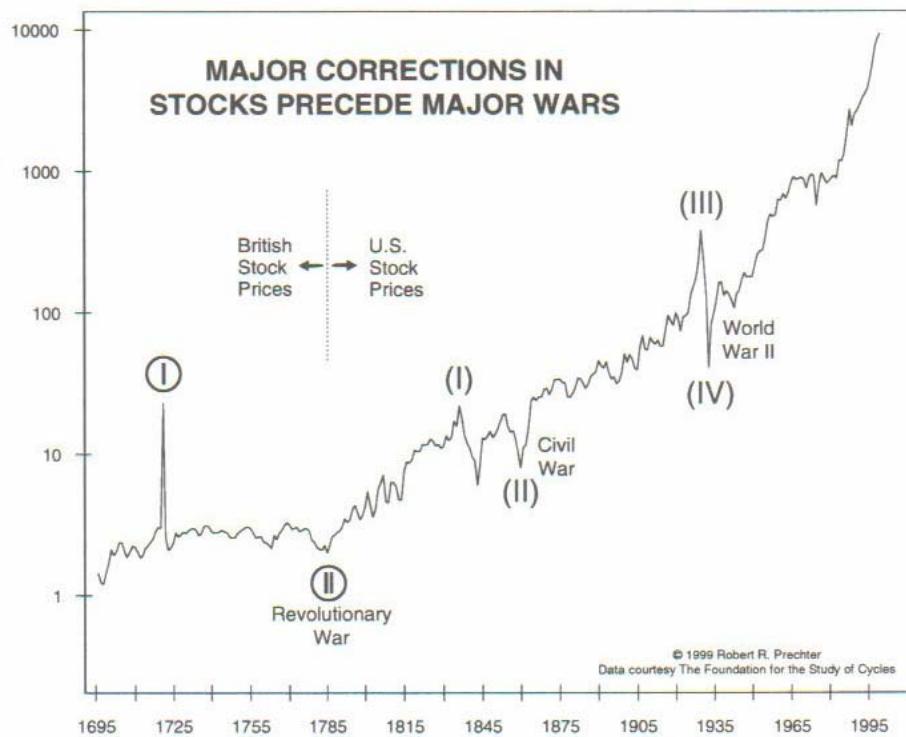


Chart 7

Chart 7. Reprinted from Prechter, *The Wave Principle of Human Social Behavior and the New Science of Socionomics*, 1999: 267.

a depiction of the U.S. and English stock market for the last 300 years. As is evident, the three biggest wars (Revolutionary, Civil and WWII) involving North America occurred after the three largest stock market declines.<sup>22</sup> The reason this is so is because national mood oscillated from one of peace to one of war. This oscillation from peace to war was forecasted ahead of time by the declining stock markets. And as we now know, when markets are trending up we tend to observe more positive and peaceful emotions, and when they are trending down, we tend to observe more negative and bellicose emotions.

Chart 8 below is the same chart above but adjusted for the Producer Price Index. The waves are also labeled with more detail. It is interesting to note that the mood crashes of 1720-1722, 1835-1842, and 1929-1932 did not produce wars. It was the C waves that followed them

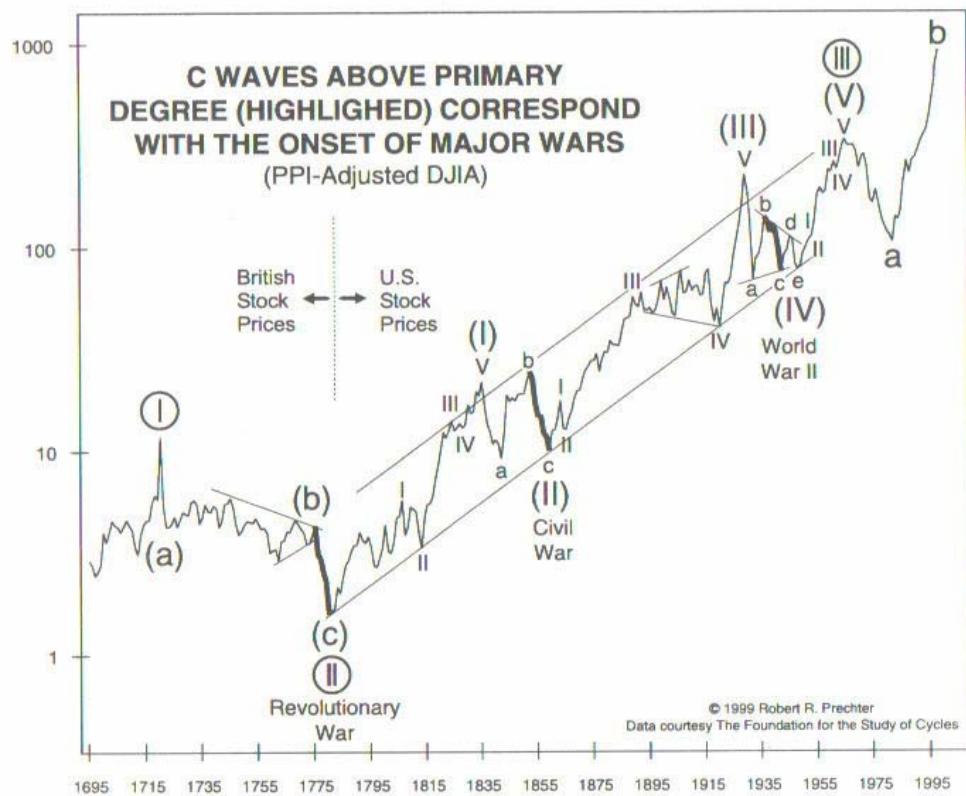


Chart 8

Chart 8. Reprinted from Prechter, *The Wave Principle of Human Social Behavior and the New Science of Socionomics*, 1999: 268.

that did. The conjecture behind this occurrence is the belief that society handles the first decline in social mood relatively well – it just catches society off guard. However, the second drop makes those in society who are already stressed from the first drop more likely to act in a belligerent way – the second drop is the ‘last straw.’<sup>23</sup>

### Other Interesting Charts

Socionomics and Elliott Wave Theory are not only perceivable through, or concerned with, the movement of equity markets. As noted above, there are many forms of nature affected by wave theory and there are also many manifestations that display themselves in society. Figures illustrating this point are available on everything from hemlines, to trends in movies, and popular music.<sup>24</sup> There are also certain measurements that lend themselves to more interest for the Department of Defense (DoD) and the United States Air Force (USAF). The Elliott Wave representation as displayed in graphs 9 and 10 in the appendix show interesting trends in the annual United States aircraft accidents rates and the number of annual nuclear weapons tests worldwide.<sup>25</sup> These two charts have direct relevance to the USAF – especially since it appears that both trends are ripe for a course reversal in the near future.

### So Where Are We Now?

Ultimately, that is for the leadership of this country to decide, but the reality of the current clues provides a nettlesome answer of a more challenging future. Let us review what we believe we know thus far. (1) We know that the stock market is the most sensitive way to measure social mood. (2) We know that after a 5-wave movement to expect a change of course to the opposite direction. (3) We know that 5 waves have expressed themselves in the up direction from the 1982 time period, the larger 1932 time period, and even the late 1700s.

Take a look at chart 12. That is where the United States is today with social mood as displayed by the stock market. The United States sits right at that little ‘b’ with the probabilities favoring some type of decline to where that little ‘c’ sits. There is no way of knowing for sure how long the decline will take, but the probabilities favor some type of multi-year to multi-decade decline. That is what socionomics and Elliott Wave Theory tell us ahead of time is likely.

### The Track Record of Socionomics

Chart 11 below is from *The Wave Principle of Human Social Behavior* and illustrates the Dow Jones Industrial Average (DJIA) beginning at the Great Depression in 1932. The wave pattern below the model in chart 11 is the actual performance of the DJIA from that time.<sup>26</sup> Based on this chart published in 1999 (before the stock market top of 2000) it was possible to predict a reversal from the stock market rise from the 1982 time frame. Although it proved difficult to pinpoint the exact year, month or day, the field of socionomics provided cogent clues of a reversal. We all know it as the great bear market of 2000-2002. Chart 12 is updated through 2007 and shows the decline from the 2000 high as ‘a’.

The rebound since then is open to debate. It seems very unlikely, however, that the rise since the lows of 2002 is the beginning of a new major bull market. One reason is an important discrepancy in the major averages. In a bull market the rising tide tends to lift all the averages, therefore, most markets trend together. Since the 2002 lows, the DJIA has not been joined by new highs in the SP500 or NASDAQ averages. This lack of harmony is a sign of market weakness and is further evidence that the DJIA recent high is part of a major topping process. The strong likelihood is that the rise in social mood from the 2002 lows has been the final subdivision(s) in the topping process of long term bull markets that started in 1982, 1932, and the late 1700s. None of this bodes well for the economic base of the United States that must choose

between defense, consumption and investment expenditures. As you will see, we are clearly starting to see some of those strains assert themselves now.

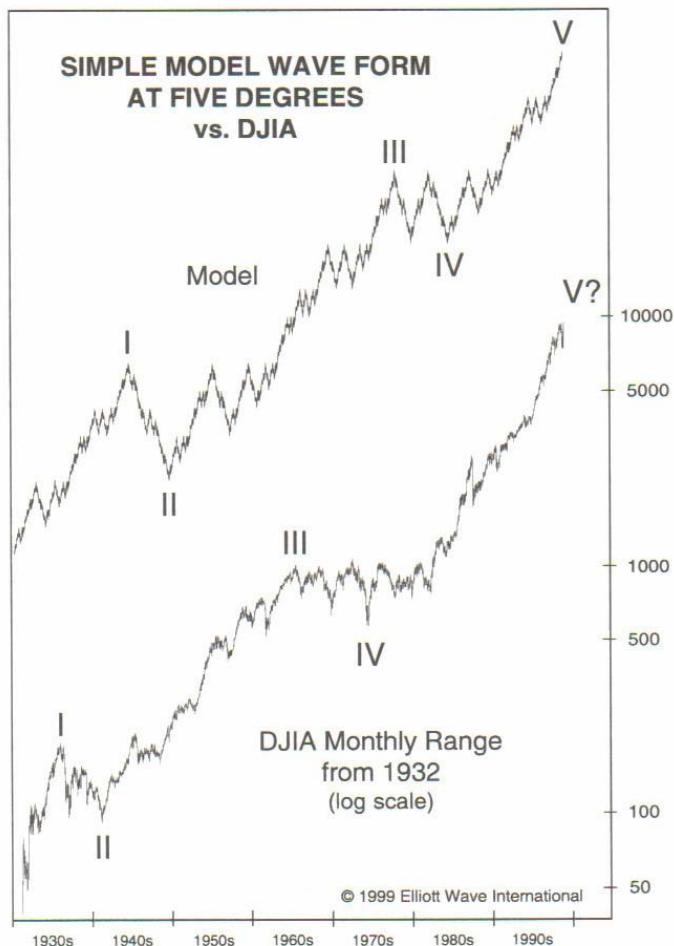


Figure 4-2

Chart 11

Chart 11. Reprinted from Prechter, *The Wave Principle of Human Social Behavior and the New Science of Socionomics*, 1999: 91.

### What Does This Possibly Portend For the Future?

A country's economic might gives it the ability to build a large military and engage in expensive global military operations. The current evidence in Charts 11 and 12 suggests that America is likely to have some very hard economic times ahead of it. It was at the top of the generational wave, the year 2000, that we should have been worrying about the problems we are starting to

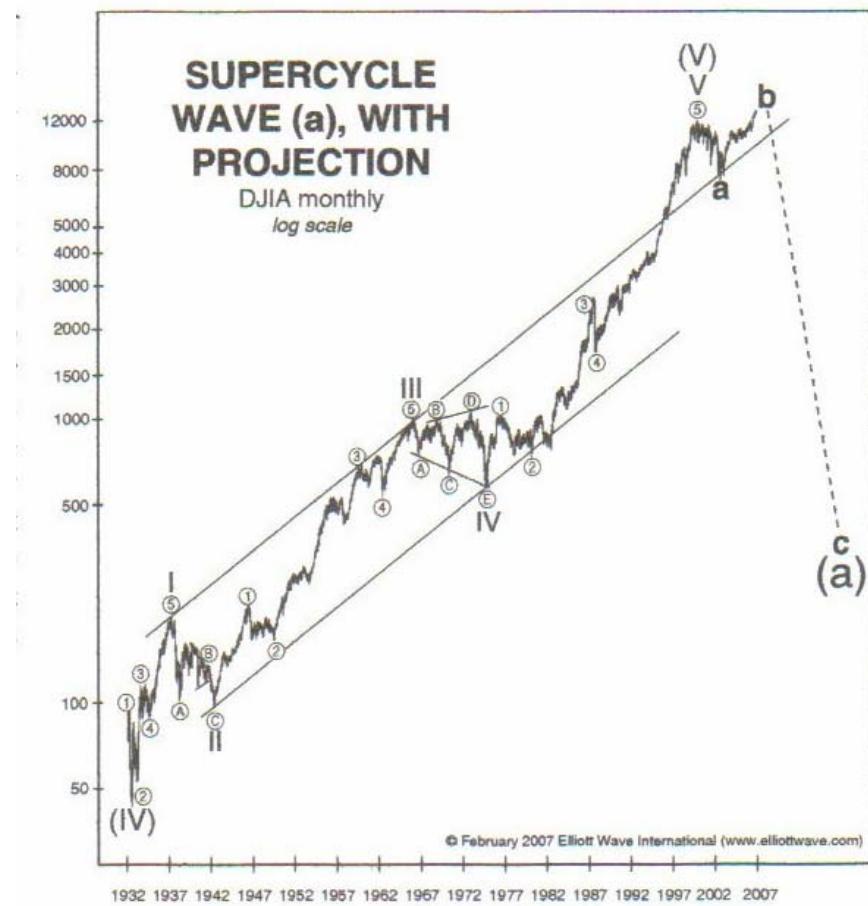


Figure 5

Chart 12

Chart 12. Reprinted from Prechter, *The Elliott Wave Theorist* February 21, 2007: 4.

see today. Robert Prechter was one of the few ringing the alarm bell – but who would have believed him during the extreme ebullience of the great and roaring 1990s? “Extreme opinions, shared widely, constitute the single most reliable indicator of an impending change of direction for a market. If virtually everyone is thinking one way, they have already acted, so the market has extremely limited potential to continue on its old path and huge potential to go the other way.”<sup>27</sup>

The present moment [2007] is quite similar to that of 2000. In fact, all the economies of the world are chugging along in much the same way the U.S. was in the spring of that year. From

a socioeconomic point of view it is time to be concerned about a change of trend. To recapitulate - America's trend has been up most recently since 1982, since 1932 from a longer perspective, and since the late 1700's from the ultimate perspective. But the momentum has been decreasing for years and the process of trend reversal is occurring right now. Although it might likely take a decade or so before the turn happens completely it is important to understand that wave 5 at multiple degrees of trend is ending right now. Expect a major trend reversal in the fortune of the United States in the years ahead.

Gilpin's mistake in prognosticating the relative decline of America and rise of the Soviet Union in the early 1980s was that he did not have an understanding of socionomics or Elliott Wave Theory to help him understand that the correction of 1966 – 1982 was basically a sideways bear market (see chart 12). There was no real decline relative to the rise from 1932 that was indicative of anything other than a breather in the rise. Indeed those were tough times, but they were not terminal for the larger pattern. America had a strong rise from the early 1980s until the market top of 2000. Wave theory anticipated this optimism and concomitant market rise while most others, including Gilpin, were very pessimistic. “In 1982, the *Elliott Wave Theorist* anticipated the Cycle wave V bull market, and the positive social mood that would attend it, thus boldly predicting ‘no international war for at least ten years.’”<sup>28</sup> This is invaluable – it is one of the few tools we have to anticipate when change will indeed occur. Most humans will extrapolate present performance for future performance, not able to ‘see around the corner.’ Socionomics allows you to see around that corner and provides a greater probability of anticipating upcoming changes. The author believes that socionomics and Elliott Wave Theory are very much a large part of the mechanism that answers Gilpin’s objection that “until the mechanism that generates ...the cycles is defined, the idea must remain speculative, albeit interesting.”<sup>29</sup>

We will most likely see a relative decline in American might as compared to potential future adversaries. The other rising powers such as China or India might own the future, but that is just a guess. To truly descry who the next world powers are likely to be just focus on their economic base, and relative performance of such, to include their equity markets. As of right now, the entire globe is set for some time of major setback since most world stock markets rise and fall in sync with the U. S. stock market, although their applicable wave patterns might be different.<sup>30</sup> That decline will affect some worse than others. Out of the ashes of this cycle low new competitors will rise faster on a relative scale. This is how the power shift is likely to proceed; loss of power on a relative basis, slowly over time. In terms of the competitor(s) who are likely to do well the best guess as of right now is China, but their equities market wave pattern is hard to read because it is limited to just two decades. Future performance will provide the clues as to whether progress or regression lies in the future.

Since this is likely to be a major apex of American global power it might be beneficial to see if there are potential signs on the immediate horizon. Below we have the fiscal year 2007 budget roll out slides as presented to the Air Command and Staff College in late calendar year 2006. It is quite apparent that the concerns Prechter and Gilpin mentioned are manifesting themselves in today's Air Force. It seems that the costs for the United States Air Force are rising at an ever faster rate while the economic infrastructure to support these expenditures is becoming ever more strained.

Chart 13 shows that personnel costs have risen 51% over the last 10 years but that the number of personnel has remained relatively constant. Chart 14 shows that although aircraft readiness rates have remained relatively steady the costs to operate and maintain the fleet over the last decade are up 87%. And chart 15 shows that the average age of our aircraft fleet is

continuously rising and now stands at 23.5 years. These are all things forewarned in Gilpin's work and socioeconomic theory.

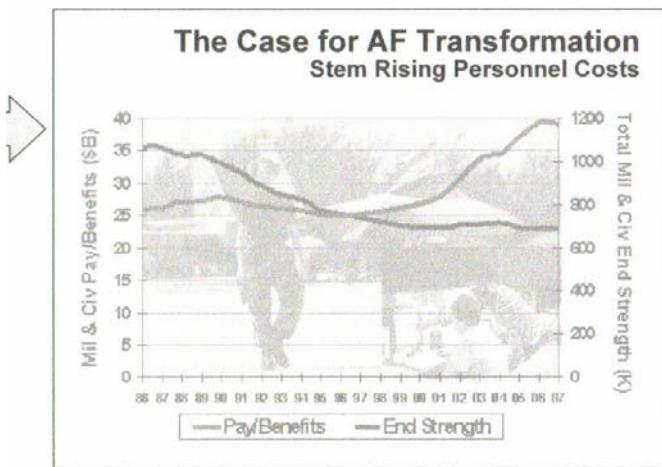


Chart 13

Chart 13. Adapted from Major General Faykes Briefing to ACSC Student Body, *FY07 Air Force Budget*, 5 Feb 07, Slide 11.

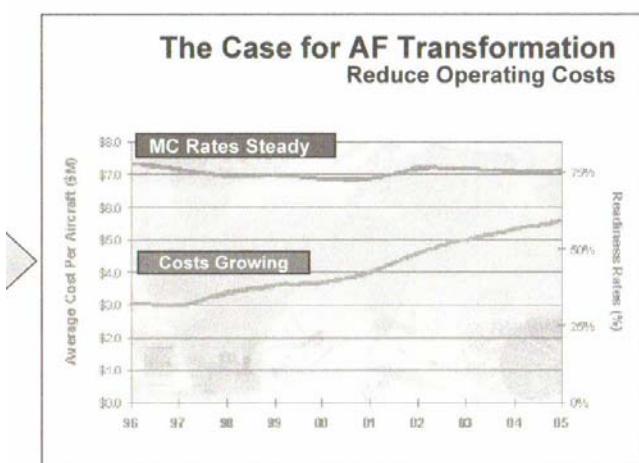


Chart 14

Chart 14. Adapted from Major General Faykes Briefing to ACSC Student Body, *FY07 Air Force Budget*, 5 Feb 07, Slide 12.

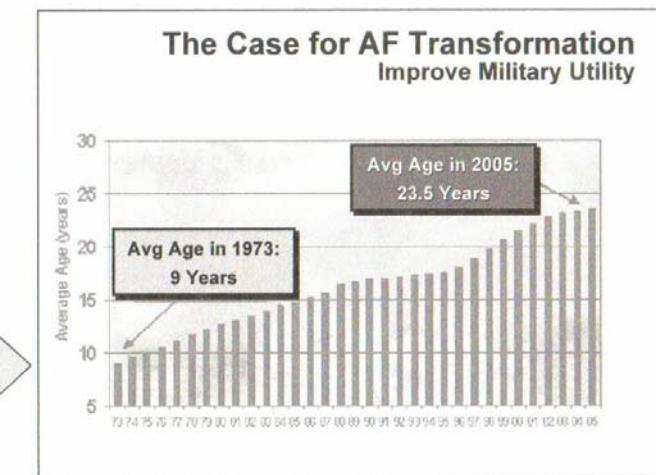


Chart 15

Chart 15. Adapted from Major General Faykes Briefing to ACSC Student Body, *FY07 Air Force Budget*, 5 Feb 07, Slide 13.

America faces some hard choices. The national debt right now is quickly approaching \$9 trillion. In unfunded future obligations, as Kotlikoff and Burns write in the *The Coming Generational Storm* in 2004, a fiscal gap of \$51 trillion now exists. Medicare is roughly \$44 trillion of that. Social Security makes up another \$7 trillion. In 2004 terms that represents \$159,000 for every American man, woman and child. It is a sum we can pay off today or pay off in the future with interest.<sup>31</sup> Amazingly, most people still don't comprehend the significance of this retiring baby boomer generation and still believe some government cure will come to the rescue. If you can't understand the amount of resources that are being discussed then try this: "If you went around the United States and got each and every citizen to contribute everything they now own – their houses, cars, bank accounts, life insurance cash values, stocks, bonds, and mutual funds, less their mortgages and consumer debt you have about \$40 trillion of the problem covered."<sup>32</sup> And this was before the continued and staggering costs of the war in Iraq.

When the collective realization occurs that this bill must be paid there will likely be a subsequent decay in social mood that will be reflected in our equity markets. The mood has not

changed yet, but all the signs say that it is in the process of shifting. You will know for sure that the social mood has indeed changed when the markets head down in an audacious manner. Near the end of this decline the nation will likely face its toughest hour. Prechter said it best:

“The coming trend of negative social psychology will be characterized primarily by polarization between and among various perceived groups, whether political, ideological, religious, geographical, racial or economic. The result will be a net trend toward anger, fear, intolerance, disagreement and exclusion, as opposed to the bull market years, whose net trend has been toward benevolence, confidence, tolerance, agreement and inclusion. Such a sentiment change typically brings conflict in many forms, and evidence of it will be visible in all types of social organizations. Political manifestations will include protectionism in trade matters, a polarized and vocal electorate, separatist movements, xenophobia, citizen-government clashes, the dissolution of old alliances and parties, and the emergence of radical new ones. Tariffs will become popular, regardless of the fact that virtually everyone knows they are dangerous and wrong, because they are a consequence of an increasingly negative psychology involving fear, envy and a misguided attempt at self-defense.”<sup>33</sup>

It is important to remember that “the most destructive initiating actions usually take place during the bear market, typically near its lows” and that “violence is the dominant trend in the ‘C’ wave of a major decline in social mood.”<sup>34</sup> Review chart 12 again. If this study in Elliott Wave Theory and socionomics proves correct then that upcoming ‘c’ wave decline shown on the chart will be unprecedented. Couple that knowledge with what chart 8 and 7 have shown us to be historically accurate, and the possibilities of the conflict stemming from that ‘c’ wave may prove to be something that is difficult to imagine right now.

### Recommendations and Conclusions

Wouldn’t it have been nice if something had forewarned us about Charts 13, 14, and 15 before it got this bad today? That forewarning was there: just look at chart 11 which was published in 1999 by Prechter before the great turn of 2000. Unfortunately, there is no panacea

that will stop this likely decline in the economic might of the U.S., but we can prepare to minimize the damage. Whether we choose to make the tough choices is another question.

The tough choices are becoming readily apparent to USAF leadership right now, just look at the graphs above. There are no voodoo economics or solutions that will make this problem go away besides a lowering of our standard of living or a lowering of our consumption. The United States will have to choose between protection, consumption or investment – and those expenditures will have to decrease on a real basis in the future.

The toughest choice, and most politically unacceptable, would be to start reigning in military spending and social programs (Medicare, Social Security) and focus on national investment and productivity. It is likely that the political environment and military leadership will not be proactive in this evolving financial crisis. Current USAF leadership has the desire to be proactive, but is likely to protect USAF systems in competition with other sister DoD systems. Then there is the upcoming competition with national private consumption (Medicare, Social Security) and investment in America. Ultimately, USAF leadership will likely just have to react to the fiscal situation by being forced to reduce expenditures.

If we could have a dream list of immediate action it would include such things as (1) reducing expenditures by simply reigning in global footprints and cutting budgets; (2) Bringing a quick end to the war in Iraq; (3) Being able to retire air frames without rankling by Congress; and (4) Start preparing some of our brighter minds to develop realistic ‘ops plans’ that allow us to deal with an impending large reduction in real funds.

Items one through three are not very likely to happen any time in the near future. Item four is something that current leadership can decide if they believe such a decision merits action. Unfortunately, few commanders will willingly reduce footprint size, expenditures or number of

personnel under their authority. We don't reward coming in 'below budget' in the USAF. On the contrary, we reward full expenditure of your allocated budget so that you are able to get the same amount next fiscal year. The war in Iraq is another matter altogether, but for now there are no signs of it abating, and that decision is ultimately outside the authority of the USAF.

Congress is not likely to reduce expenditures on Medicaid or Social Security, as these items are considered a 'holy grail' of sorts. To even initiate discussion of inevitable cutbacks in entitlement programs brings a huge flood of acrimonious feedback from one of America's largest lobbies, the American Association of Retired Persons (AARP). Unfortunately, there is no way America can pay the bill for the \$50 trillion in entitlements that has been promised to this baby boomer generation. Final result: the nation will likely deal with this upcoming economic decline reactively instead of proactively. These conflicts will only get worse as our economic base accelerates its deterioration.

In the end there is no way of knowing with certainty how it will all turn out for the United States. All one is able to do is study, prognosticate, and present the conclusions for others to ponder. Note that the ending date for the American Empire is still unknown. Then look at the evidence and come to your own conclusions. It is not a stretch to see that the United States likely has some very tough years ahead of it. A grounded knowledge of socionomics is a disruptive breakthrough that will help us better navigate the journey.

*"You cheer my heart, who build as if Rome would be eternal" – Augustus Caesar*

## Endnotes

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- <sup>1</sup> Robert Gilpin, *War and Change in World Politics / Robert Gilpin* (Cambridge ; New York: Cambridge University Press, 1981), 12.
- <sup>2</sup> Ibid., 106.
- <sup>3</sup> Ibid., 106-7.
- <sup>4</sup> Ibid., 138.
- <sup>5</sup> Ibid., 158-9.
- <sup>6</sup> Ibid., 162-67.
- <sup>7</sup> Ibid., 159.
- <sup>8</sup> Ibid., 162.
- <sup>9</sup> Ibid., 187.
- <sup>10</sup> Ibid., 188.
- <sup>11</sup> Ibid., 189-90.
- <sup>12</sup> Ibid., 192.
- <sup>13</sup> Ibid., 202/09.
- <sup>14</sup> Ibid., 204.
- <sup>15</sup> Ibid., 205.
- <sup>16</sup> Paul M. Kennedy, *The Rise and Fall of the Great Powers : Economic Change and Military Conflict from 1500 to 2000 / by Paul Kennedy* (New York, NY: Random House, 1987), 536-40.
- <sup>17</sup> Gilpin, *War and Change in World Politics / Robert Gilpin*, 241.
- <sup>18</sup> Robert Prechter Jr., *The Wave Principle of Human Social Behavior and the New Science of Socionomics* (New Classics Library, PO Box 1618, Gainesville, GA 30503, 1999), 227-28.
- Special thanks to Peter Kendall, Robert Prechter Jr., and Dr. Wayne Parker of Elliott Wave International who so graciously reviewed this paper, provided assistance, and were supportive of the use of many of the charts.
- <sup>19</sup> Alfred Frost and Robert Prechter Jr., *Elliott Wave Principle*, 20th Anniversary Edition: May 1998 ed. (New Classics Library, PO Box 1618, Gainesville, GA 30503 1978).
- <sup>20</sup> Prechter Jr., *The Wave Principle of Human Social Behavior and the New Science of Socionomics* 259.
- <sup>21</sup> Ibid., 345.
- <sup>22</sup> Prechter Jr., *The Wave Principle of Human Social Behavior and the New Science of Socionomics* 266.
- <sup>23</sup> Ibid., 268-9.
- <sup>24</sup> Ibid., 240-48.
- <sup>25</sup> Robert Prechter, "The Elliott Wave Theorist," (January 17, 2007).
- <sup>26</sup> Prechter Jr., *The Wave Principle of Human Social Behavior and the New Science of Socionomics* 91.
- <sup>27</sup> Robert Prechter, "The Elliott Wave Theorist July 25, 2006," (July 25, 2006): 7.
- <sup>28</sup> Ibid.: 18.
- <sup>29</sup> Gilpin, *War and Change in World Politics / Robert Gilpin*, 205.
- <sup>30</sup> Prechter, "The Elliott Wave Theorist July 25, 2006," 17.
- <sup>31</sup> Laurence J. Kotlikoff and Scott Burns, *The Coming Generational Storm : What You Need to Know About America's Economic Future / Laurence J. Kotlikoff and Scott Burns* (Cambridge, Massachusetts: MIT Press, 2004), 244.
- <sup>32</sup> Ibid., 233-4.
- <sup>33</sup> Robert Prechter, "Prechter's Market Perspective," *Bear Markets, Social Conflict, and War* (July 28, 2006).
- <sup>34</sup> Prechter, "The Elliott Wave Theorist July 25, 2006," 19.

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### **Bibliography**

- Bonner, William, and Addison Wiggin. *Empire of Debt: The Rise and Fall of an Epic Financial Crisis / William Bonner and Addison Wiggin*. Hoboken, N.J.: Wiley, 2006.
- Frost, Alfred , and Robert Prechter Jr. *Elliott Wave Principle*. 20th Anniversary Edition: May 1998 ed: New Classics Library, PO Box 1618, Gainesville, GA 30503, 1978.
- Gilpin, Robert. *War and Change in World Politics / Robert Gilpin*. Cambridge ; New York: Cambridge University Press, 1981.
- Kennedy, Paul M. *The Rise and Fall of the Great Powers : Economic Change and Military Conflict from 1500 to 2000 / by Paul Kennedy*. New York, NY: Random House, 1987.
- Kotlikoff, Laurence J., and Scott Burns. *The Coming Generational Storm : What You Need to Know About America's Economic Future / Laurence J. Kotlikoff and Scott Burns*. Cambridge, Massachusetts: MIT Press, 2004.
- Prechter Jr., Robert. *The Wave Principle of Human Social Behavior and the New Science of Socionomics*, New Classics Library, PO Box 1618, Gainesville, GA 30503, 1999.
- Prechter, Robert. "The Elliott Wave Theorist." (January 17, 2007).
- \_\_\_\_\_. "The Elliott Wave Theorist July 25, 2006." (July 25, 2006).
- \_\_\_\_\_. "Prechter's Market Perspective." *Bear Markets, Social Conflict, and War* (July 28, 2006).

## Appendix

### Aircraft Accidents

The investor Carl Icahn once said, "The fastest way to become a millionaire is to invest in the airline industry as a billionaire." Henry Hardevelt, an analyst at Forrester Research, added, "The U.S. airline industry makes NHL hockey matches look like fifth-grade recess. It's brutal and bloody. The sad truth is an investor could get a better return starting a Subway sandwich shop than an airline." And they were just talking about the financial side of the business. We're going to look at the physical side.

The social and economic contractions that take place during bear markets are particularly hard on the people who fly, maintain, and guide airplanes. They are forced to accomplish more with less time and resources in an already highly competitive industry. We postulated that a negative social mood—held by passengers, crew, maintenance workers and pilots alike—would tend to increase the chances for aircraft accidents and that a positive social mood would decrease them. Indeed that is the case. Figure 3 shows an inverted graph of the annual number of U.S. general aviation accidents per 100,000 flight hours along with the Dow Jones Industrial Average for the past 30 years. It shows that as the Dow has risen, aircraft safety has generally increased, while setbacks have occurred late in periods of declining social mood. The correlation ( $R$ ) of the accident data to the log of annual closes

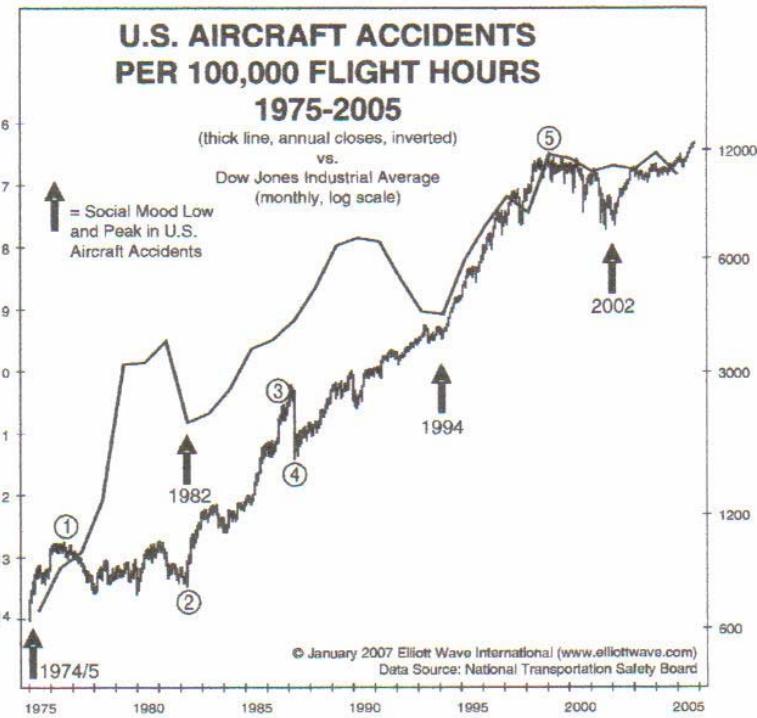


Figure 3

in the DJIA is  $-91\%$ , with a  $p$ -value of  $10^{-12}$ , which means that the probability of obtaining such a high correlation is extremely small, making this result highly statistically significant. When using detrended data, we observe no correlation ( $R = 0.47\%$ ,  $p = 0.98$ ).

There are no comprehensive data available prior to 1975, so this series may be too short to allow us to draw a conclusion just yet. But the surges in the number of accidents leading up to 1982 and 1994 are conspicuous, since they confirm the extremes registered by stock market sentiment indicators in those years. If the negative social mood at those times is responsible for those "air pockets," then future bear markets should produce similar spikes in the number of aircraft accidents. We will return to this study at a future date.

Chart 9

Chart 9. Reprinted from Prechter, *The Elliott Wave Theorist January 17, 2007*: 4.

**"Boom" Times**

On October 9, 2006 the North Korean government tested a nuclear bomb and in the process became the first country to do so in 8 years. Politicians and the media immediately claimed that the event had "destabilized the region" and represented a "threat to international security." With all due respect for the gravity of the situation, we'd like to point out the backward causality in those statements. For years we have maintained that the detonation of nuclear bombs, while it may stir transient emotions, has no effect on the social mood; rather, social mood determines the penchant for exploding nuclear devices. Destabilization and threats preceded the test, setting the conditions that led to it.

Figure 4 is an update of a chart that *The Elliott Wave Theorist* first published in 1995. The thin line is the inflation-adjusted Dow Jones Industrial Average. The heavy line is an inverted graph of the annual number of nuclear weapons tests worldwide. The correlation ( $R$ ) of the raw nuclear test data shown in the chart to the log of annual closes in the DJIA is  $-90\%$ , with a  $p$ -value of  $10^{-12}$ . When using detrended data, we obtain  $R = -59\%$  and  $p = 10^{-4}$ . These results are highly statistically significant.

Consider this strong correlation while reading our explanation in this excerpt from EWT's 1999 essay, "Socionomics In a Nutshell":

The reason is this: As social mood becomes more positive, people become more confident, trusting and content. They feel little need to prepare a defensive or offensive force. As social mood becomes more negative, people become more fearful, distrusting and angry. They are impelled to prepare to defend themselves or attack an enemy. As in politics and economics, if you would like a view to the future in this area, just watch our most responsive and precise reflector of social mood, the stock market. Its trends will tell you when to expect more or fewer nuclear explosions, and whether they are more likely to be deployed defensively or offensively. The blackest moods of this century occurred in 1932 and 1942, the latter time providing the social impetus to develop the nuclear bomb in the first place.

Notice that for the last eight years the testing line held flat at the zero level. Once you understand the real cause of

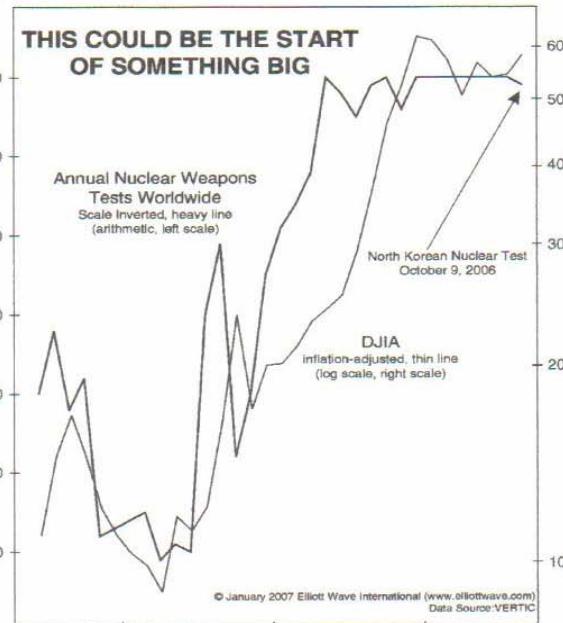


Figure 4

international aggression, it comes as no surprise that such a long period of nuclear peace coincided with a global financial mania, as evidenced at least in part by the 8 years of net advisor bullishness recorded by Investors Intelligence (see Fig. 1). Although the Dow Jones Industrial Average hit a new all-time high last year, on an inflation-adjusted basis it is still below its year 2000 high. The other major indexes, the S&P 500 and the Nasdaq, are down in real and nominal terms. When you consider our view that the orthodox top of the bull market occurred in 2000 and a stealth bear market has been in force since, the blast from the "hermit kingdom" last year falls in line with our wave interpretation. The bear market of the past seven years has much further to go. If our stock market outlook is correct, the North Korean test last year is analogous to China's test of a hydrogen bomb in 1967 during the bear market rally that followed the initial decline in 1966. The current bear market rally is at least one degree larger than that. As EWT added in 1999, "In the past two decades, there has been no Elliott wave correction large enough to induce anything beyond nuclear weapons testing. The next 'C' wave of larger than Cycle degree will undoubtedly impel the use of nuclear weapons for offensive purposes." So North Korea's October nuclear test indeed may, as Japanese Prime Minister Shinzo Abe predicted, "mark the beginning of a new, dangerous nuclear age."

Chart 10

Chart 10. Reprinted from Prechter, *The Elliott Wave Theorist* January 17, 2007: 5.