



## The Borg: A Financial Allegory

Posted by [Gail the Actuary](#) on October 6, 2008 - 10:38am

Topic: [Economics/Finance](#)

Tags: [bank](#), [banks](#), [collapse](#), [credit](#), [debt](#), [federal reserve](#), [fiat money](#), [finance](#), [financial system](#), [insolvency](#), [jason bradford](#), [monetary system](#), [money](#), [original](#) [[list all tags](#)]

*This is an allegory explaining some of the monetary issues associated with the current financial crisis. It was written by [Jason Bradford](#). Jason was an academic biologist who "retired" at a young age to become a community organizer and learn how to farm with peak oil in mind. He also hosts a biweekly radio show on public radio called [The Reality Report](#).*

I have never been a huge follower of Star Trek, but when thinking about the financial beast thrashing about the Borg comes to mind.



*"I am Locutus of Borg. Resistance is futile. Your life as it has been is over. From this time forward, you will service us." - Locutus of Borg.*

"Strength is irrelevant. Resistance is futile...Your culture will adapt to service ours." -- The Borg.

The Borg is a hive-like hybrid swarm of humanoid species, turned partially robotic. They are distinctly goal oriented towards "assimilation" of all other humanoids and press themselves relentlessly with the creepy mantra "Resistance is futile."

The money system is eerily Borg-like. Because it structurally requires growth, it works relentlessly to assimilate all forms of capital. The natural consequence is that everything must be for sale. Values of freedom, independence, self-reliance, and even conservation are subservient to the goal of growth—which is really just growth of the financial Borg, not human welfare or the security of a habitable planet.

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## How the Money System Depends on Growth

Modern money is not based on any physical assets or intrinsic value. Instead it is called a “fiat currency,” which in Latin means, “let it be done.” The government, or law, decrees that the face value of money is what it is. Money is created through forms of credit and debt, i.e., when banks make loans and debtors accept them, the money instantly exists. Only a fiat system can allow this form of money creation.

Money is used as a claim on real things, like labor and material goods. The money system is supposed to be regulated, usually via central bank interest rate policies, to make sure that what money can purchase, or what value it holds, doesn’t change too rapidly. When money changes in value quickly it is difficult to plan, and a panic may even occur that could collapse the system.

A collapse can happen, for example, when too many people try to collect their bank deposits at once. Banks don’t keep all the money given to them by depositors, only some portion of it. This is called “fractional reserve banking.” Banks have to constantly manage their reserves, which means juggling how much money they lend out, how much is coming in from new deposits, and how many of their loans are being repaid. If a bank is having trouble with cash flow and can’t keep up its reserves internally, it can borrow money from other banks that have more than they need at the moment. If too many banks are having trouble, the Federal Reserve (in the U.S.) can step in and lend.

The money system needs to grow because money is lent into existence with interest. All borrowers need to come up with principal plus interest. The interest portion of the money supply needs to be created in the future or too many borrowers will default. How is more money created in the future? Through more debt!

Debt and money supply will necessarily rise exponentially until they collapse. And collapse is inevitable because money is still a claim on real, tangible things, like labor and resources, which in the real world are finite.<sup>1</sup>

## Real World Growth Can’t Keep Up with Money

A human being eats and grows, and produces wastes in the process. The energy and mineral resources of an animal are called food. If someone doesn’t get enough food and they are a child, they fail to grow. As an adult they may lose weight or starve. It is also important that a person doesn’t grow too fast, and at some point stops altogether or health will decline—possibly leading to death.



Fig. 2. In the real world, getting too big has consequences and can lead to loss of performance and breakdown.

The economy does something similar by consuming resources and causing pollution. The energy inputs of our economy are called gasoline, natural gas, hydroelectricity, etc. Other resources our economy claims include mineral ores, forests, and, as I explain further below...people! And just as a human should stop growth due to physical constraints, an economy can become too large relative to the support structure of the ecosystems around it. Many old civilizations ended up in the archeological trash heap because they over taxed agricultural soils and deforested too extensively.

What is happening in the financial world is that the claims the money system is making on debt holders are greater than their ability to pay. Most of the blame right now is being placed on a bubble in lending to purchase homes. But is the sub prime mortgage fiasco the only explanation for money troubles?

I don't think so. What we are seeing reflects a general insolvency of the global financial system. Part of the problem is that investors, business people and governments didn't foresee that crude oil production would flatten in 2005 and prices would go from \$10 per barrel in 1998 to \$100 per barrel in 2008. Or that China and India would consume so much so fast that nearly all forms of commodities would rise in parallel with oil prices.

When credit is extended over a long time horizon, as in a home mortgage, the underlying assumption is that the future will be akin to the past. Inflation will be relatively modest and incomes will keep up so that a steady flow of cash can go back to banks and keep up their reserve balances. Obviously this hasn't occurred: prices rose faster than incomes and the ability to repay debts faltered.

As an example, I learned at the 2008 ASPO-USA conference that the airline industry was given

credit to buy planes and enlarge airports with the expectation that crude oil wouldn't be higher than \$30 per barrel. When banks see that many of the loans they previously extended can't be repaid in full, they become less able to loan out more funds in order to preserve cash reserves. Bankers are currently asking the governments (in the U.S. and elsewhere) to remove many of the bad loans from their books so they can become less stingy extending credit. In the short term this could help banks and borrowers create more money. But this move would do nothing to change the underlying dynamics of the situation, only move the debt plus interest obligations elsewhere, such as to taxpayers.

## What Changes Hath the Borg Wrought?

The financial Borg isn't as creepy looking as in Star Trek, and that's why we have trouble seeing it. Instead, money works through slow, steady pressure that manifests itself in Borg-like assimilation over time.

Think of America circa 1950, where mom stayed home and cooked and cleaned and everyone watched each other's kids. Now we have fast food and cleaning services and professional child care and all adults join the labor pool to pay money for what they once did themselves. Mom and Dad are now Borgs.

Imagine small, mostly self-sufficient farmers. They live on inherited land and have little need to buy anything, including food. Now put in place trade policies and land reforms that lead to consolidated land holdings and encourage migration to cities where factories reside. These once largely self-sufficient people now need to rent their shelter and buy their food. The world's poor workers are now Borgs.<sup>2</sup>

The financial Borg does two things to grow. It promotes increasing consumption by those it has already assimilated, which results in further ecological debt, and it assimilates those on the margin and gives them prosthetic appendages to yield ever more of the species *Homo colossus* W. Catton.<sup>3</sup>



Fig. 3. Guns and iPods on the margins of the Borg's territory.<sup>4</sup>

## What Next?

The United States (and likely other nations with negative trade balances and large foreign held debts) is in a Catch 22 situation. Flows of credit are so crucial for the daily functioning of our economy that it looks as though these will be preserved at all cost. Practically, this means Federal Reserve regulated interest rates will be kept low in the short term to encourage banks to make loans. It also looks as though "a higher power" is going to try to lift the bad loans off some bank

balance sheets. This may lower bank-to-bank lending rates which are currently very high. The medium term risk (within a year) of low interest rates is a rapid collapse of the value of the dollar.

Remember that when something is in greater supply, its value declines. Because low interest rates and huge government bailout schemes place more dollars into circulation, the owners of dollars could panic over concerns about the value of their holdings. But the U.S. is desperately dependent upon foreign creditors. In order to attract foreign creditors into the U.S. market with a weaker dollar, U.S. Treasury bill rates would need to be raised, which would then lead to an increase in interest rates. Because imports of foreign resources are also crucial to the U.S. economy, a weaker dollar will make these more expensive. The overall impact is therefore even higher inflation, perhaps hyperinflation, while the economy actually contracts.<sup>5</sup>

It is difficult in a panicky time to step back and ask questions about the greater purpose of what we are doing. One of the problems I have is balancing my current anxiety over the unraveling of systems that I depend on, with the knowledge that these systems are highly misguided and need radical change. As a people, we have become very poor at distinguishing between productive and unproductive debts. Not all debts are bad. We probably need to have lines of credit in order to install renewable energy systems, build low energy transportation systems, and develop local food systems. But too much of our debt does not generate future revenues and is simply wasteful, such as the military and much of the travel industry. And much of our debt is incurred building "assets" that will be seen as liabilities once oil declines and the oceans rise, such as NAFTA superhighways or sea-level ports for trade with Asia. My bigger worry is that current leadership will do anything to prop up what exists, such as feeble U.S. car manufacturers, rather than demand a shift in priorities.

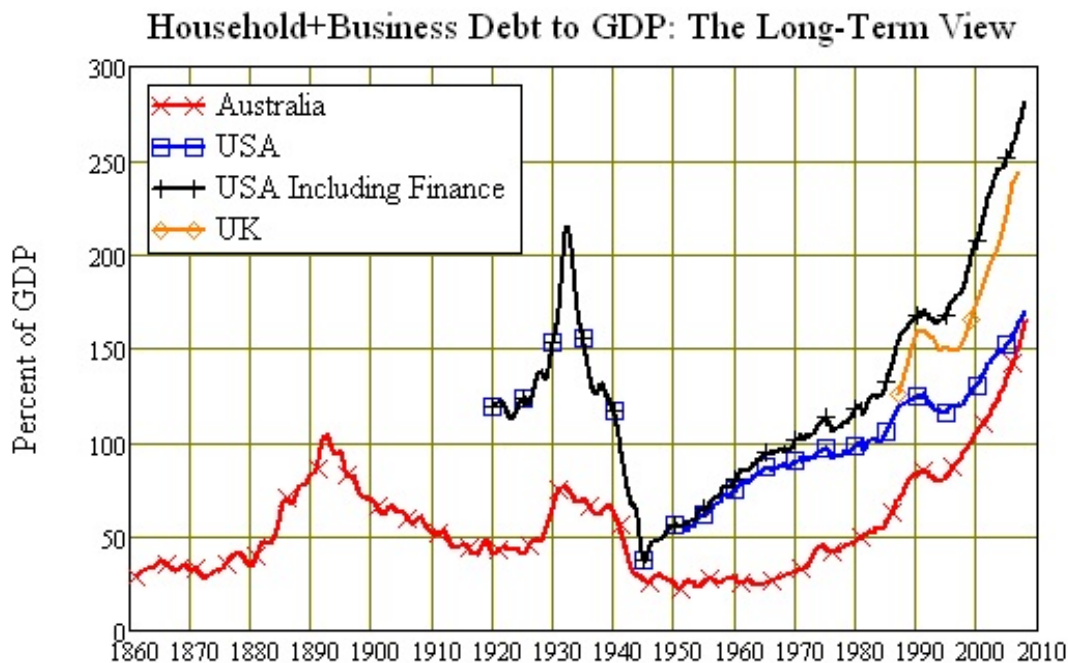


Fig. 4. Ever larger quantities of debt are now being required to produce the same amount of GDP.<sup>6</sup>

Our Borg-like monetary system is showing us how poorly it serves our needs. What *it* needs is growth—growth as measured in the "formal economy" in the form of monetary units, which is recorded in the ledger books of banks, businesses and governments. Because this formal economy is structurally dependent upon growth, it has worked to incorporate more and more of the

"informal economy," meaning the work done without monetary reward. Growth in the formal economy does not necessarily lead to our prosperity, and as the formal economy declines we will be back to more of the informal economy. There will likely be much fear and real pain in the short run, but in the long run a stronger informal economy and reprioritization of investments is what we need. And in typical human fashion, it looks like it takes a catastrophe for us to pay close enough attention to see something other than what we want to see.

## Notes

<sup>1</sup>Good on-line material that covers these points in greater detail can be found in Chris Martenson's Crash Course and associated materials. See: <http://www.chrismartenson.com/>

<sup>2</sup>Thanks to Sharon Astyk for describing this: <http://sharonastyk.com/2008/09/25/peeling-the-onion-whats-behind-the-fin...>

<sup>3</sup> I am using the scientific notation for naming species, i.e., Genus species Author, and the colorful terms of William Catton. See: <http://dieoff.org/page81.htm>

<sup>4</sup>Find image here: <http://whatsinmyipod.blogspot.com/2008/01/african-jazz-n-jive-authentic-...>

<sup>5</sup>I am only discussing one possible dynamic to illustrate the systemic risk and feedbacks. If the money supply can't be expanded fast enough, prices fall and cash is hoarded, which is deflation. Financial system catastrophe can go either way.

<sup>6</sup> Source of chart:  
[http://yellowroad.wallstreetexaminer.com/blogs/files/2008/06/img0009\\_209...](http://yellowroad.wallstreetexaminer.com/blogs/files/2008/06/img0009_209...) For a very nice U.S. only chart see:  
<http://www.buchananfs.com/files/23843/Total%20Cdt%20Mkt%20Dt%20thru%2020...>

*There have been a number of previous articles that have featured either Jason's writings or his radio interviews. This is a [link](#) to some of them.*



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