Fracking: The Economics of Extinction

by Liona Fan-Chiang

At a time when half the United States is in drought, when 80% of the national food crop is threatened, and communities are faced with the prospect of turning on the faucet to see no water run, whatever temporary economic relief hydraulic-fractured natural gas is bringing to communities, the net effect of this boom is criminal, and coheres with the colonial freetrade policies that have brought us the drought and gutted our infrastructure. This is why Lyndon LaRouche and LaRouchePAC have been so adamant that we shut down the fracking boom. In fact, as you will see, the industry would not even exist, or would exist in a very different form, if the progress of nuclear power had not been halted many decades ago.

There are about half a million wells for hydraulic fracturing for natural gas, or fracking (or "unconventional gas drilling," or "shale gas extraction") in the United States. Each uses 1-8 million gallons of water per tap, and each is

tapped 1-20 times. After the water goes into the ground one mile down, only about 15% of it comes back up, which can be reused for more fracking. Half of these sites are in the drought-stricken areas of the United States, meaning people will be dying from lack of water and food, while this water-intense, so-called economical and clean process grows. To add insult to injury, much of this gas is being exported, rather than being used to develop the United States.¹

Existing arguments of both the opponents and proponents of fracking are equally shallow and short-sighted.

Many environmentalists have been up in arms about fracking because of the pollution and corruption involved. Much press exposure has been given to claims of contaminated groundwater resulting in water so saturated that it can be lit on fire, or is of a putrid color and



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Ask yourself: "What would I think about fracking, if we were building nuclear power plants instead?" Shown: a (Dick Cheney) Halliburton frack job in the Bakken formation, North Dakota.

smell. Meanwhile, Big Oil, including Dick Cheney's Halliburton, has its grubby hands all over the regulatory policies. The EPA and other government agencies have been criticized for turning a blind eye to, or even helping the oil companies get around regulations.

A Nov. 22, 2013 article posted on the Ring of Fire website,² lists the top ten Congressmen who have been bought off by the fracking industry. The proprietary nature of the slush of chemicals, like the secret ingredients in Worcestershire sauce, that are used make fracking almost impossible to regulate, such that investigators are partially telling the truth when they say that they cannot charge the companies for use of hazardous materials, for there is no documentation.

Earthquakes have also been reported in areas where fracking is done, that have never previously had them.

However, even if the fracking industry and the regula-

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^{1.} See the <u>LaRouchePAC video</u>, "Drought: The Time for NAWAPA Has Come."

[&]quot;Congress Being Fracked: Gas Industry Increases Contributions to Congress Members by 180 Percent."

tory agencies were able to resolve all of these issues, the fracking boom would still be extinction economics.

Arguments for fracking have largely grown out of opportunism rather than out of any real concern for the growth of the U.S. economy. That is why you will find many people who seem to know nothing about the subject arguing for it, including Members of Congress. Many people are getting some kind of dividend from this heist. For example, a landowner might get paid thousands of dollars per acre to lease land to the frackers, an amount that is likely a drop in the bucket

compared to the profit the companies make from the extraction of gas. Others are employed in making machines for the industry, etc. It's cheap, employs people, is driving some amount of innovation, and is making profit for America, so why not?

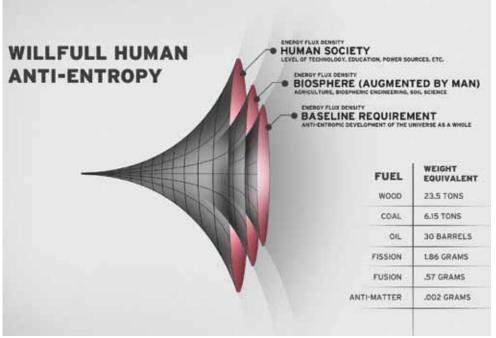
Economics 101

First, ask yourself, "What would I think about fracking, if we were building nuclear power plants instead?"

Then ask, "What do we not have because we are not going nuclear?" Where would all those resources be if we were on our way to a fusion economy? Humans will progress in any field. The question is: to what end? We have already seen that technology and employment involved in videogames, no matter how advanced, serves to deaden the minds of the next generation, therefore creating a net loss overall. If we were building fourthgeneration nuclear plants now, and had an intensive fusion R&D program, what types of innovations would flourish? More importantly, what types of new fundamental scientific principles would be discovered?

The real cost is clearer in hindsight, that is, from the standpoint of 50 years from now, looking back. Every energy platform is built on the prior one. Meaning, each new technology that leads to the next energy base, such as wood, charcoal, oil, or nuclear fuel, is discovered, tested, and built with the previous power source. Each

FIGURE 1



LaRouchePAC

new advance is also dependent on this continuity, in that each denser power source required the development of the prior, in order for it to be even potentially accessible (**Figure 1**). How many field hands does it take to build a nuclear rocket?

What this natural process implies, is that if the previous resource, which will eventually run out, is not used for the creation and development of the next, not only does this progress stop, but that once the current resource runs out, or is rare enough that wars start over gaining it, then that society no longer has the ability or the resources to achieve that next platform. The result is a decreasing ability to support the current population, and therefore war, disease and famine. Lyndon La-Rouche has termed this process, a decrease in potential relative population density.

What may be ironic to some, but not to people who deal with long-term investments (i.e., 10, 20, or 50 years), is that in order to progress, you have to use more and more of your current resource. To conserve is like the couch potato who refuses to go out to find a job because that would require him to use up resources from his already low supply. Eventually, even the potential disappears.

Finally, besides new technology, the discovery of a new fuel base means a new scientific principle has been discovered. The drive towards fusion power and a fu-

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sion-based economy will make that very apparent. This has two implications. First, were our workforce to be involved in the various aspects of building a nuclear and thermonuclear economy, whose energy base is fission and fusion, and whose control of materials, medicine, and chemistry in general is at the required level of precision, that workforce

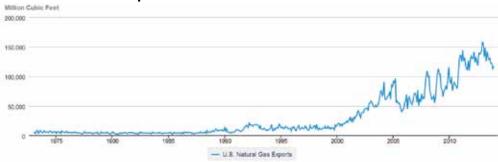
would be qualitatively different. With the implied access to space travel, utilization, and colonization, and many other frontiers we have not yet conceived, the average worker will be at a much higher skill level, and have much more constant input toward improvement.

The second implication of moving to a new, higher, more energy-dense fuel base, is that the previous fuel is revalued. For example, moving to nuclear and thermonuclear right now would put petroleum and natural gas primarily into the more useful, efficient unemployment that they are uniquely suited for, and thus overall more valuable, as feedstock for petrochemicals, plastics and other derivatives, and fertilizer, just to name a few, instead of burning them at 30% efficiency for electricity.

In general, the effects of a newly discovered and activated scientific principle redefine everything it its place. While technological advances will make each worker more productive; the same farmer, with the same skills and technology, becomes more valuable, as he begins to feed a society of people creating a new mankind, instead of one that is working for Wall Street or trying to turn the United States into a Saudi Arabia-style desert oil sheikhdom (which may amount to the same thing).

Therefore, step back and look again at the fracking and other fossil-fuel extraction policies. In terms of economic value, the current practice of employing engineers and others to contribute to creating a colonial raw-materials exporter out of the United States, actually amounts to a net loss. The argument that natural gas, especially aided by fracking, is cheaper than nuclear power, an argument which has been used against building new nuclear plants, is just wrong.³

FIGURE 2 U.S. Natural Gas Exports



Source: U.S. Energy Information Administration

Saudi Arabia

Look at the data. Since Barack Obama came in as President, he has promoted the natural gas business in many ways, claiming that it is a clean fuel, though, admittedly, not renewable. Total production has gone way up, and use of water-intense fracking has shot up. Although Obama was lobbied to impose more export restrictions, he has instead, relaxed them, opening the floodgates for exports (**Figure 2**).

In 2012, Obama boasted that the United States is becoming the Saudi Arabia of natural gas.⁴ If you are familiar with Saudi Arabia, you are probably insulted. If you are not familiar, briefly: Saudi Arabia is infamous for its wealth of oil, which, instead of investing in the development of its people, it exports to fund its many terrorist and irregular warfare operations around the world. In fact, while acting outraged at human rights violations in Syria and other places it has shipped weapons to, it boasts the most backward practices. Just one example, is that women still have no rights. They cannot drive, they cannot be elected to political office, and their big breakthrough is that in 2015, women will finally be able to vote for the first time.

In other words, you should be alarmed that Obama is declaring that the United States is striving to become like Saudi Arabia in any way.

If you are serious about energy self-sufficiency, jobs, a better standard of living, and non-extinction, first take Obama and imperialism out of the political picture, then let's talk.

Impact reports and the like from civil engineers trying to build a dam or anything else useful, while it has either turned a blind eye, or explicitly protected, the frackers.

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^{3.} Obama's feared EPA has done its part in creating a backward colonial society, by requiring extensive and expensive Environmental

 [&]quot;President Obama Discusses Energy in Colorado," the White House, Jan. 26, 2012.